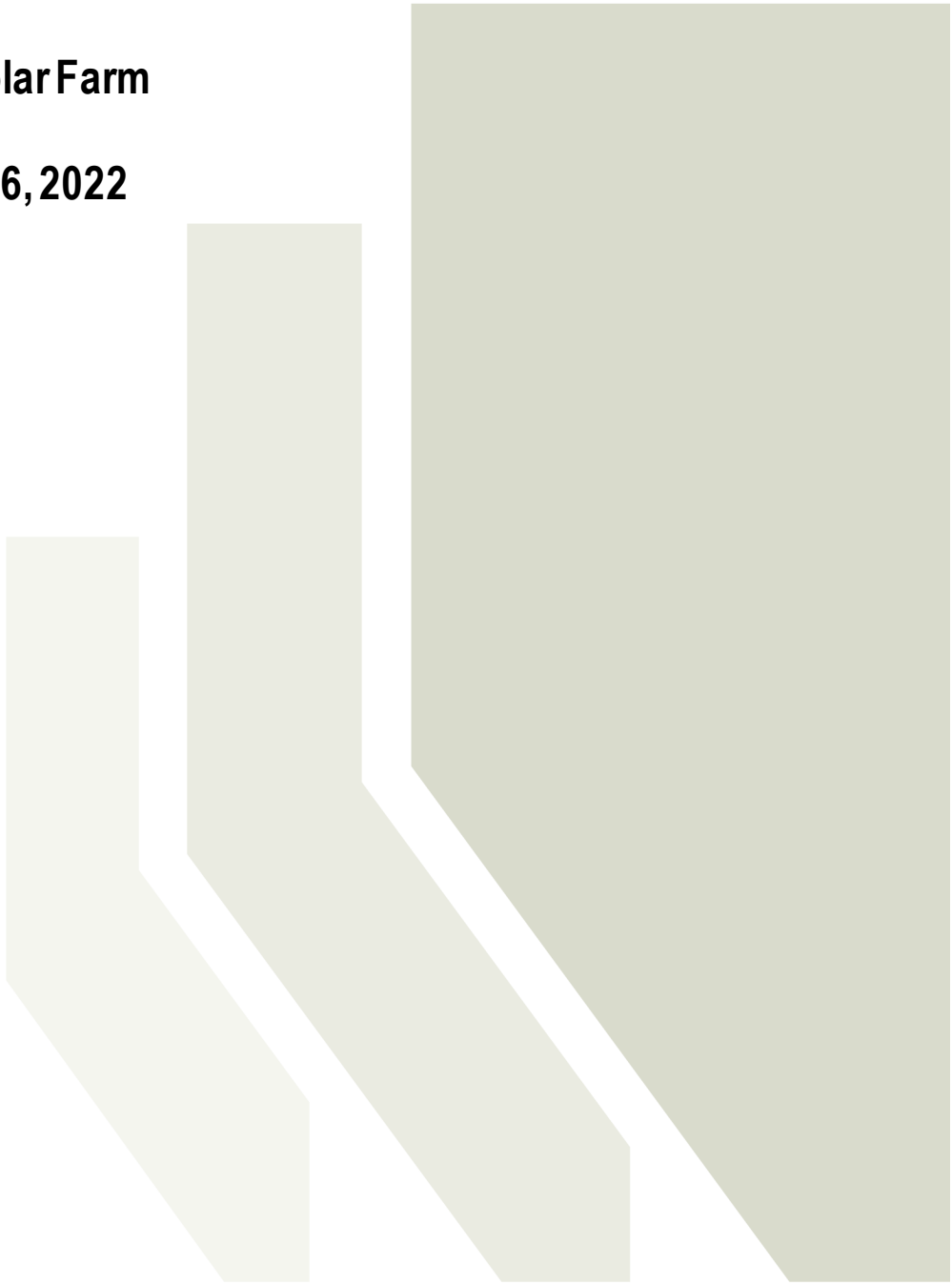




Solar Krafte Utilities Inc.

Vauxhall Solar Farm

December 16, 2022



Alberta Utilities Commission

Decision 27077-D01-2022

Solar Krafte Utilities Inc.

Vauxhall Solar Farm

Proceeding 27077

Applications 27077-A001 and 27077-A002

December 16, 2022

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1 Decision summary

1. In this decision, the Alberta Utilities Commission approves applications from Solar Krafte Utilities Inc. to construct and operate a 60-megawatt solar power plant, designated as the Vauxhall Solar Farm, and the associated Solstice 549S Substation, located approximately three kilometres northwest of the town of Vauxhall.

2 Applications

2. Solar Krafte filed applications with the Commission for approval to construct and operate a 60-megawatt (MW) solar power plant and associated Solstice 549S Substation, together designated as the Vauxhall Solar Farm (the project). The solar power plant will consist of 198,666 LONGi Solar LH4-72HBD 455M crystalline solar photovoltaic panels with a nominal rating of 455 watts, eighteen Sungrow SG3600UD-MV transformer and inverter stations, and underground collector lines that will connect to the proposed Solstice 549S Substation. The proposed Solstice 549S Substation will consist of one 138/34.5-kilovolt (kV), 50/67/83-megavolt-ampere transformer, one 138-kV circuit breaker, and one 34.5-kV switchgear building. Solar Krafte stated that it planned to finalize the equipment selection for the solar panels, transformers and inverters for the project within 60 days of receipt of project approvals.¹

3. The project is located on approximately 194 hectares of private land in the municipal District of Taber, as shown in Figure 1 below. The project will cover the following sections of land:^{2,3}

Section	Township	Range	Meridian
NW17, W20, SE20, E30, SE31	13	16	4

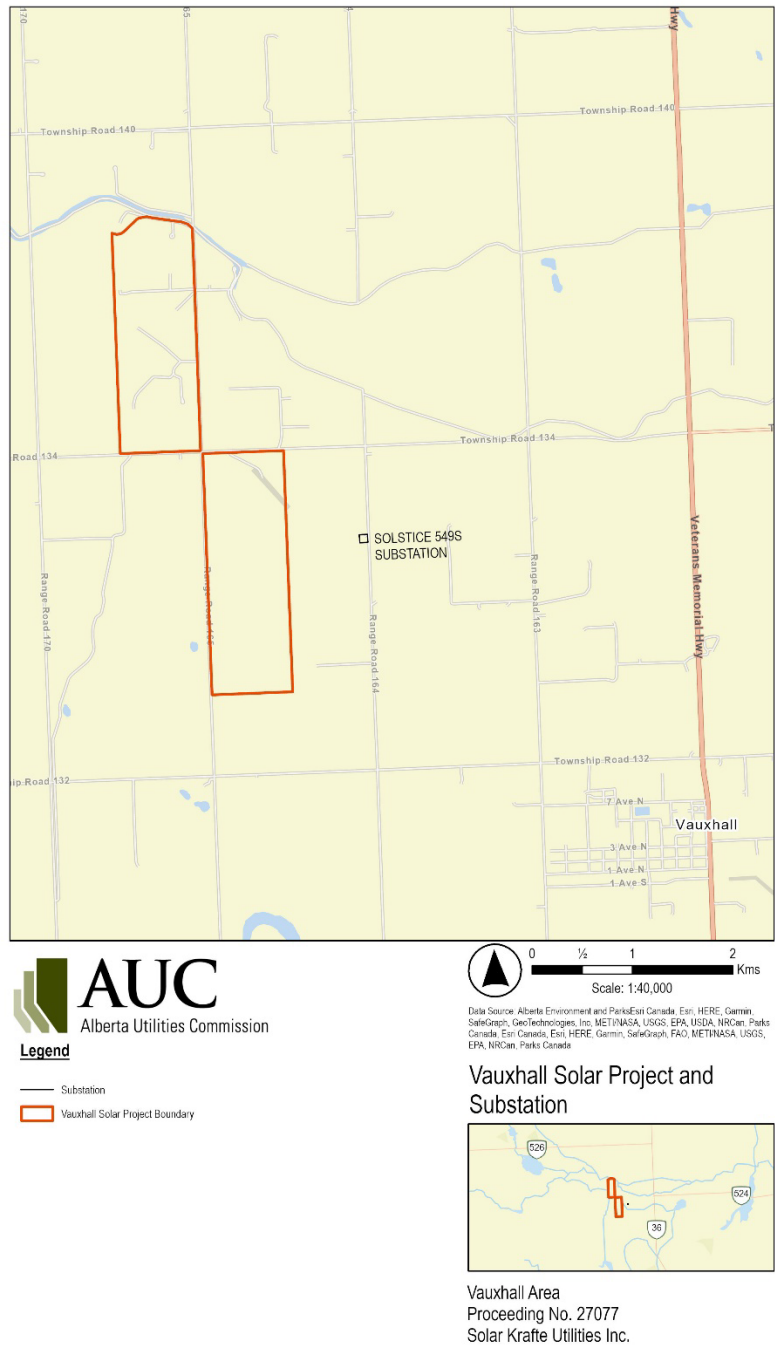
4. The Solstice 549S Substation is located in the southeast quarter of Section 20, Township 13, Range 16, west of the Fourth Meridian.

¹ Exhibit 27077-X0065, 07-14-2022-Response to Information Request - Brown Group, PDF page 11.

² Exhibit 27077-X0066, Attachment [1] 2022-07-11 Vauxhall Design.

³ Exhibit 27077-X0096, 07 25 2022 Letter to AUC re Project Update.

Figure 1. Proposed Vauxhall Solar Farm location



5. Separate applications will be submitted for approval to construct transmission infrastructure to connect the project to the Alberta Interconnected Electric System.

6. Solar Krafte's applications included:
- A participant involvement program summary, which details consultation with stakeholders within 800 metres of the project and notification to stakeholders within 2,000 metres of the project.⁴
 - An environmental evaluation, prepared by Stantec Consulting Ltd., which concluded that the overall residual effects of the project will not be significant.⁵
 - An environmental protection plan, prepared by Stantec, which summarized the mitigation measures and monitoring activities Solar Krafte committed to implement during construction and operation.⁶
 - An initial conservation and reclamation plan, prepared by Stantec.⁷
 - An Alberta Environment and Parks Fish and Wildlife Stewardship (AEP)⁸ renewable energy referral report, dated April 21, 2021, which ranked the project an overall moderate risk to wildlife and wildlife habitat.⁹
 - A draft site-specific emergency response plan for the construction and operation of the project that was provided to local responders and authorities.¹⁰
 - A solar glare hazard analysis report, prepared by Green Cat Renewables Canada Corporation, which predicted that glare from the project is not likely to have the potential to create hazardous glare conditions for nearby dwellings or transportation routes.¹¹
 - A noise impact assessment (NIA), completed by Green Cat, which confirmed that the project will comply with Rule 012: *Noise Control*.¹²
 - A *Historical Resources Act* approval dated March 27, 2020.¹³
7. In addition, Solar Krafte filed:
- Development Permit No. 25-22, issued by the Municipal District of Taber (M.D. of Taber), dated September 22, 2022 (Development Permit).¹⁴

⁴ Exhibit 27077-X0005, Attachment 4 – Participant Involvement Program (PIP) Report.

⁵ Exhibit 27077-X0008, Attachment 6 – Environmental Evaluation.

⁶ Exhibit 27077-X0012, Attachment 10 – Environmental Protection Plan.

⁷ Exhibit 27077-X0013, Attachment 11 – REOC&R Plan.

⁸ On October 24, 2022, the Ministry of Environment and Parks was renamed the Ministry of Environment and Protected Areas. Any references to AEP in Rule 033: *Post-approval monitoring requirements for wind and solar power plants* and elsewhere that relate to forward-looking obligations or commitments between the applicant and AEP should be interpreted as meaning Alberta Environment and Protected Areas.

⁹ Exhibit 27077-X0015, Attachment 13 – AEP Renewable Energy Referral Report.

¹⁰ Exhibit 27077-X0010, Attachment 8 – Site-Specific Emergency Response Plan (Draft).

¹¹ Exhibit 27077-X0011, Attachment 9 – Solar Glare Hazard Analysis Report.

¹² Exhibit 27077-X0014, Attachment 12 – Noise Impact Assessment.

¹³ Exhibit 27077-X0016, Attachment 14 – *Historical Resources Act* Clearance.

¹⁴ Exhibit 27077-X0118, Attachment – M.D. of Taber Development Permit.

- An environmental memo from Stantec to AEP describing the 2022 wildlife survey results and project amendment.¹⁵
- An updated solar glare hazard analysis report, prepared by Green Cat, which concluded that the project is not likely to create hazardous glare conditions on roads within 800 metres of the project, and is not expected to have an adverse effect on residential amenities.¹⁶
- An updated NIA summary letter concluding that the project will continue to operate in compliance with Rule 012.¹⁷
- An updated decommissioning and reclamation plan.¹⁸

8. Solar Krafte expected construction to begin in October 2022, with an expected in-service date of August 1, 2023. Solar Krafte requested a construction completion date of September 30, 2023.

2.1 Project changes

9. Solar Krafte stated that the original proposed project was 150 MW and that earlier documentation, including stakeholder engagement and the AEP referral report reflect this. Prior to submitting its applications to the Commission, Solar Krafte reduced the size of the project from 150 MW to 60 MW. Solar Krafte explained that the project would largely continue to occupy the same footprint, but with modifications to the solar panel array layout and fenceline to reduce overall impacts. Solar Krafte noted that the modifications resulting from the reduction in project size resulted in the new design fully respecting the M.D. of Taber's 300-metre setback of all dwellings that did not consent to an encroachment, the removal of an encroachment within a raptor nest setback, and avoidance of certain wetland clusters.¹⁹

10. In July 2022, Solar Krafte further revised the project layout by removing approximately 230 acres of project area, and relocating the project substation and inverter/transformer stations.²⁰ As part of its update, Solar Krafte removed all pivot-serviced irrigable land from the project area, avoided all active ferruginous hawk nests, and avoided native grasslands.²¹

2.2 Notice and intervention

11. The Commission issued a notice of applications on January 12, 2022, and February 24, 2022, and received statements of intent to participate from the Brown Group and the M.D. of Taber. The Brown Group consisted of 27 sets of interveners located within 2,000 metres of the project, and the Copperfield Hutterian Colony. The Brown Group described a number of concerns with the project and asked to participate in a public hearing. The M.D. of Taber submitted that, while it was not opposed to renewable energy projects, it recognized that such projects would create lasting and significant impacts, and asked the Commission take a

¹⁵ Exhibit 27077-X0098, Vauxhall_2022_Update memo.

¹⁶ Exhibit 27077-X0011, Attachment 9 – Solar Glare Hazard Analysis Report.

¹⁷ Exhibit 27077-X0068, Attachment [3] - Noise Impact Assessment Update Summary.

¹⁸ Exhibit 27077-X0088, Attachment [MD-4] – Decommissioning & Reclamation Plan.

¹⁹ Exhibit 27077-X0029, Information Response (Round 1), PDF page 4.

²⁰ Exhibit 27077-X0096, 07 25 2022 Letter to AUC re Project Update.

²¹ Exhibit 27077-X0098, Vauxhall_2022_Update memo, PDF page 1.

number of comments and concerns into consideration, to be further discussed in the findings section.

12. The Commission granted standing to members of the Brown Group but found that the M.D. of Taber did not meet the standing test. However, the Commission determined that the M.D. of Taber had information that would assist in its understanding of the local land use requirements relating to the project, and granted the M.D. of Taber a limited scope of involvement in the proceeding specific to the project's compliance with the Municipal Development Plan and land use bylaws.

13. The M.D. of Taber subsequently filed a motion asking the Commission to grant it standing in this proceeding and eligibility for the recovery of costs. The Commission denied the request and found that the M.D. of Taber did not provide sufficient information to demonstrate that it holds legal rights that may be directly and adversely affected by the Commission's decision in this proceeding.²²

14. Upon granting standing to members of the Brown Group, the Commission set out a process to consider the applications, which included an oral hearing. The Brown Group and its members subsequently withdrew their statement of intent to participate and all concerns with the project.²³

15. The Commission cancelled the oral hearing for the project but allowed the M.D. of Taber the opportunity to file a final written statement to address its outstanding concerns.²⁴

3 Discussion and findings

16. For the reasons outlined below, the Commission finds that approval of the project is in the public interest having regard to the social, economic, and other effects of the project, including its effect on the environment.

3.1 Environment

17. The Commission is satisfied that the environmental impacts of the project can be adequately mitigated.

18. AEP issued a renewable energy referral report for the project on April 21, 2021. The report was issued before the project was reduced in size, from 150 MW to 60 MW, and ranked the project a moderate risk to wildlife and wildlife habitat. Moderate risk was assessed based on the loss and disturbance of high quality wildlife habitat, including native grassland, disturbance to wildlife features and commitments made by Solar Krafte to mitigate and monitor wildlife impacts. AEP also rated the project as high risk to birds based on avian use in the area and disturbance and loss of higher quality habitat for grassland breeding birds; a moderate risk to wetlands and potential sensitive amphibian breeding sites due to the infringement of five wetland

²² Exhibit 27077-X0063, AUC ruling on motion to reconsider standing ruling.

²³ Exhibit 27077-X0099, To AUC re withdrawal of Statement of Concern of Brown Group (03947166xA253).

²⁴ Exhibit 27077-X0108, AUC ruling on motion to cancel hearing and rescind the Municipal District of Taber's participation privileges.

setbacks; and a moderate risk to wildlife features as the project would infringe upon the setbacks of three nesting raptors including a ferruginous hawk.

19. Solar Krafte initially submitted that there would be a total of 7.3 hectares of native grassland within the fenceline of the project: 1.4 hectares of this area would be disturbed by the permanent project footprint and 0.3 hectares would be temporarily disturbed during construction.²⁵ Solar Krafte later revised the project layout to avoid all native grassland. The Commission is satisfied that Solar Krafte has sufficiently reduced the impacts to native grassland by altering the project layout to avoid native grassland entirely.

20. Solar Krafte submitted that, in planning the project, all wetlands and dugouts were avoided. However, five wetland setbacks will be impacted by permanent project infrastructure. The Commission is satisfied that the mitigation measures committed to by Solar Krafte are adequate to reduce the risk to wetland habitat and sensitive amphibians. Mitigation measures include the use of timber mats within wetland setbacks, best management practices to minimize the risks of water contamination (i.e. silt fencing, spill response plans), and fencing to deter the movement of amphibians into construction zones.

21. The project, as originally submitted to the Commission, would infringe upon the 1,000-metre setback for an active ferruginous hawk nest, located approximately 214 metres from the original project footprint. During wildlife surveys in 2022, Stantec discovered a second active ferruginous hawk nest approximately 11 metres from the project footprint. Solar Krafte has since revised the project layout to avoid infringing upon both setbacks for ferruginous hawk nests. For the other infringements to wildlife features, the Commission accepts AEP's determination that Solar Krafte has provided adequate alternative mitigation for these infringements.

22. Solar Krafte applied for an amendment to its renewable energy referral report. However, AEP determined that, because no new wildlife feature was discovered for which standard mitigation could not be met, it did not plan to issue an amended report unless directed by the Commission.²⁶ Since an overall reduction in surficial impacts has been proposed by the amendments, including the avoidance of all native grassland and removal of infringements to the setbacks of two ferruginous hawk nests, the Commission determined that an updated referral report was not required.

23. Given the updated project layout and implementation of mitigation measures, the Commission accepts Stantec's conclusion that the overall residual effects of the project will not be significant.

24. Rule 033: *Post-approval Monitoring Requirements for Wind and Solar Power Plants* requires approval holders to submit annual post-construction monitoring survey reports to AEP and the Commission. Therefore, the Commission imposes the following condition of approval:

- a. Solar Krafte shall submit a post-construction monitoring survey report to Alberta Environment and Protected Areas – Fish and Wildlife Stewardship and the Commission no later than January 31 of the year following the mortality monitoring period, and on or before the same date every subsequent year for which

²⁵ Exhibit 27077-X0029, Information Response (Round 1), PDF page 6.

²⁶ Exhibit 27077-X0100, 08 15 2022 Letter to AUC re Project Update-AEP Response.

Alberta Environment and Protected Areas requires surveys pursuant to subsection 3(3) of Rule 033: *Post-approval Monitoring Requirements for Wind and Solar Power Plants*.

3.2 Noise

25. The Commission accepts the conclusion in the project's updated NIA that noise from the project will comply with Rule 012. The Commission imposes a condition of approval directing Solar Krafte to conduct a post-construction comprehensive sound level (CSL) survey to verify project compliance with Rule 012 when the project commences operation.

26. In the NIA for the original project layout, Green Cat identified 18 receptors within 1.5 kilometres of the project boundary, and established permissible sound levels (PSLs) to be 40 A-weighted decibels (dBA) nighttime and 50 dBA daytime at all receptors. Green Cat also checked the area for third-party energy facilities that had the potential to influence sound levels at receptors (i.e., baseline case facilities), and identified the Vauxhall 158S Substation, the Solar Krafte Prairie Sunlight III Solar Project, and a number of oil and gas facilities regulated by Alberta Energy Regulator as baseline case facilities. Green Cat modelled 18 inverter/transformer stations for the project power plant and an 83-megavolt-ampere high voltage transformer at the project substation as major sound sources of the project.

27. The original NIA predicted that cumulative sound levels would be less than or equal to the nighttime PSL at all receptors and therefore noise from the project will comply with Rule 012. The original NIA identified receptors R5 and R10 to be the most affected receptors. Cumulative sound levels at these receptors were predicted to be 40 dBA, which is equal to the nighttime PSL.

28. Following the second project layout update, Green Cat submitted an updated NIA summary letter concluding that the project will remain compliant with Rule 012.²⁷ The results showed an increase in cumulative sound levels for eight of the 18 receptors, but unchanged or decreased cumulative sound levels at the remaining receptors. The updated NIA indicated that the two most impacted receptors for the original project layout, R5 and R10, both showed reduced cumulative sound levels as a result of the updates to the project, but Receptor R5 remains the most affected receptor and the predicted cumulative sound level at Receptor R5 is 39.7 dBA.

29. Solar Krafte submitted that, in the event of non-compliance with the PSL, several mitigation measures could be implemented including selectively orienting the inverters to face away from the nearest receptors, constructing sound attenuating walls around contributing inverter/transformer units, and shutting down most dominant inverter/transformer units during nighttime hours.²⁸ Solar Krafte explained that it is unlikely such mitigation will be required for the project as the noise model used a number of conservative assumptions such as a conservative ground attenuation factor of 0.5, the assumption that all noise-producing project elements and all third-party facilities will operate at full load at all times, and the lack of consideration for the effect of physical obstructions in reducing the potential noise impacts at nearby receptors, such as the solar panels themselves.

²⁷ Exhibit 27077-X0068, Attachment [3] - Noise Impact Assessment Update Summary.

²⁸ Exhibit 27077-X0029, Information Response (Round 1), PDF page 9.

30. Given the conservative assumptions used in the noise model, the potential mitigations described by Solar Krafte, and the predicted results in the updated NIA, the Commission is satisfied with Green Cat's conclusion that the project will comply with Rule 012.

31. Given that the nighttime cumulative sound level at Receptor R5 is predicted to be very close to the nighttime PSL (i.e., 0.3 dBA lower than the nighttime PSL), Receptor R5 is adjacent to the project, and the project will be a major sound source at this receptor, the Commission will require Solar Krafte to complete a post-construction CSL survey at Receptor R5 to verify compliance with Rule 012 once the project commences operation. Therefore, The Commission imposes the following condition of approval.

- b. Solar Krafte shall conduct a post-construction comprehensive sound level (CSL) survey, including an evaluation of low frequency noise, at Receptor R5. The post-construction CSL survey must be conducted under representative conditions and in accordance with Rule 012: *Noise Control*. The valid CSL data shall be collected when sound sources of the project are operating under representative conditions and must not be an average of the entire nighttime or daytime period. Within one year after the project commences operations, Solar Krafte shall file a report with the Commission presenting measurements and summarizing the results of the post-construction CSL survey.

3.3 Glare

32. The Commission accepts the conclusion in the updated glare assessment that the project is not likely to create hazardous glare conditions for any receptors nearby. The Commission imposes three conditions of approval: a condition requiring Solar Krafte to use a resting angle greater than or equal to three degrees for the project solar panels during backtracking periods; a condition requiring Solar Krafte to use anti-reflective coating on the project solar panels; and a condition requiring Solar Krafte to promptly address concerns or complaints regarding solar glare from the project.

33. In the glare assessment for the original project layout, Green Cat identified 13 dwellings within or close to 800 metres from the project boundary, Highway 524 and six local roads (range roads 163, 164, 165, 170, and township roads 134 and 140) within 800 metres from the project boundary as receptors. The assessment indicated that the project solar panels would be mounted on a single-axis tracking system with a maximum tracking angle of 50 degrees, and the racking system would have a backtracking function for periods near sunrise or sunset when the sun is so low in the sky that the it is beyond the maximum tracking angle of the panels. The original assessment modelled these resting angles for the backtracking periods: 5, 15, 25 and 50 degrees. The original assessment predicted that none of these receptors would experience any level of glare from the original project layout.

34. Green Cat later submitted an updated glare assessment following the revision of the project layout.²⁹ All of the original receptors were re-modelled with the new project boundary for consistency. The updated assessment modelled these resting angles for the backtracking periods: 0, 2, 3, 5, 6, 7, 8, 9 and 10 degrees.

²⁹ Exhibit 27077-X0080, Attachment [15]- Solar Glare Hazard Analysis Update Summary.

35. The updated assessment predicted that:

- When the project solar panels use a resting angle less than three degrees during the backtracking periods, Township Road 134 and a number of dwellings will experience green and yellow glare from the project.³⁰ In particular, when the project solar panels use a resting angle of 0 degrees, the levels of yellow glare present at township roads near the project ranged from 1,383 to 2,578 minutes per year; dwellings near the project will receive up to 3,118 minutes per year of yellow glare from the project.
- When the project solar panels use a resting angle greater than or equal to three degrees during the backtracking periods, receptors will receive green glare but will not receive yellow glare.
- When the project solar panels use a resting angle greater than or equal to 10 degrees during the backtracking periods, receptors will receive no glare of any level.
- Neither Highway 524, range roads 163, 164, 165, 170, nor Township Road 140 will receive glare of any level, regardless of which resting angle is used for the project solar panels.

36. Green Cat noted that differences in the predicted results between the original and updated glare report likely stemmed from a combination of updates in the glare modelling software (GlareGauge), changes in the project layout, and different receptor heights.

37. Green Cat explained that the glare predicted at some dwellings will originate from the same general direction as the sun. This is an example of sun-masking, where the glare impact is likely to be eclipsed by the direct effects of the sun when both are present to the observer. Green Cat also explained that the model used was conservative as it did not account for weather or cloud cover that could reduce the likelihood of glare, nor did it account for any existing infrastructure or obstructions such as vegetation that could further reduce glare.

38. Green Cat concluded that the project is not likely to have the potential to create hazardous glare conditions on roads within 800 metres of the project, nor is it expected to have an adverse effect on residences nearby.

39. Given that when the project solar panels use a resting angle greater than or equal to three degrees during the backtracking periods, receptors are predicted to receive zero yellow glare from the project, the Commission requires Solar Krafte to use a resting angle greater than or equal to three degrees to eliminate potential yellow glare from the project and therefore imposes the following condition of approval:

- c. Solar Krafte shall use a resting angle greater than or equal to three degrees for the project solar panels during backtracking periods.

³⁰ The solar glare assessment used colour codes to categorize effects of glare to a person's eyes. Green glare: glare with low potential for temporary after-image; Yellow glare: glare with potential for temporary after-image; Red glare: glare with potential for permanent eye damage.

40. The predictions and associated conclusions in the solar glare assessment were premised upon the use of an anti-reflective coating. Accordingly, the Commission imposes the following condition of approval:

- d. Solar Krafte shall use anti-reflective coating on the project solar panels.

41. The Commission assesses glare impacts on a case-by-case basis. In the current circumstances, the Commission notes that the glare impacts from the project are unlikely to create hazardous glare conditions for receptors. However, the Commission requires that any glare issues associated with the project that may arise must be addressed by Solar Krafte in a timely manner. Accordingly, the Commission imposes the following condition of approval:

- e. Solar Krafte shall file a report with the Commission detailing any complaints or concerns it receives or is made aware of regarding solar glare from the project during its first year of operation, as well as its response to the complaints or concerns. Solar Krafte shall file this report no later than 13 months after the project becomes operational.

3.4 Reclamation and municipally enacted laws

42. The M.D. of Taber submitted that the application should be denied due to the lack of reclamation security, or alternatively that Solar Kraft should be required to post reclamation security (in the form of a bond, or irrevocable letter of credit) in an amount not exceeding \$10,000,000.00 as a condition of project approval, to be held in trust for the hosting landowners.³¹ The basis of this position, was that: (1) the issuance of such security was required by the public interest; and (2) the M.D. of Taber's Land Use Bylaw³² (the Bylaw) required Solar Krafte to issue security in respect of its reclamation obligations.

43. Solar Krafte stated it would continue to work with the M.D. of Taber in accordance with the development permit process, but submitted: (1) the Bylaw does not require security to be posted in respect of the project; and (2) the issuance of such security is not required by the public interest, because, among other reasons, AEP has chosen not to exercise its authority to designate the construction and operation of renewable power generation facilities as activities requiring security to be posted.³³

44. The Commission finds that Solar Krafte is not required to issue security in respect of its reclamation obligations. This is because, as further explained below:

- a. The project is in the public interest, without any conditions requiring reclamation security to be posted.
- b. Pursuant to the Bylaw, and the exercise of the Development Authority's discretion under the Bylaw, there are no municipal laws requiring security to be provided in this case.

³¹ Exhibit 27077-X0110, Final Submission of MD of Taber, paragraph 86.

³² Exhibit 27077-X0113, MD of Taber Land Use Bylaw.

³³ Exhibit 27077-X0114, 09-16-2022 SK Response to Submissions of MD Taber, paragraphs 1-10.

3.4.1 Decommissioning and reclamation: the public interest

45. The M.D. of Taber argued that reclamation security should be required to ensure the project is in the public interest, primarily because: (1) in the event Solar Krafte becomes insolvent, and has insufficient funds to discharge its regulatory reclamation obligations, without security it is unclear who will pay for these liabilities; (2) the Supreme Court of Canada has endorsed the polluter pay principle, which is binding on the Commission when deciding applications to approve solar generation facilities, and requires reclamation security in this case.³⁴

46. Solar Krafte responded that: (1) the Commission has previously declined to require reclamation security in respect of renewable projects on the grounds that under the regulatory regime, it could be designated as mandatory (as it has been in relation to other facilities) but it has not been so designated;³⁵ (2) cases decided regarding reclamation liabilities in the oil and gas context, and the concerns they deal with, do not apply to the solar generation context because of lower environmental risks associated with solar generation, the longer lifespan of solar facilities, and the greater upfront investment required for solar facilities;³⁶ and (3) the M.D. of Taber provided no authority for the proposition it could be liable for reclamation of the project, and it will not be. Solar Krafte submitted that these regulatory obligations fall on Solar Krafte, and the landowner, and are allocated between them contractually. It argued that the M.D. of Taber has attempted to insert itself in the contractual arrangements between Solar Krafte and the landowner, as evidenced by the fact it proposes the reclamation security it seeks should be held in trust for the landowner.

47. Solar Krafte filed a conservation and reclamation plan in its application.³⁷ In response to an information request from the M.D. of Taber, Solar Krafte filed an updated plan to reflect changes it made to the project layout.³⁸ Solar Krafte stated that the expected life of the project, with equipment replacement and repowering, is 50 years and beyond, and there is an extremely low risk of a decommissioning event occurring within the first 15-20 years. For this reason, Solar Krafte stated it would conduct a cost estimate for abandonment and reclamation of the project site in year 15 of its operations, at which time it expected a higher salvage value for its equipment. Solar Krafte further submitted that since solar projects require a high initial capital investment, with stable revenues and lower ongoing operating expenditures, any financial issues it encounters will result in a dispute as to who is entitled to continue operating the project (and to receive the corresponding revenues), and not the abandonment of the project.³⁹

48. The Commission finds these filings satisfy the requirements of Rule 007: *Applications for Power Plants, Substations, Transmission Lines, Industrial System Designations, Hydro Developments and Gas Utility Pipelines*, Section 4.3.2, WP18 and WP19.

49. The M.D. of Taber filed a document that purported to estimate the processes and costs associated with decommissioning a typical 500-kilowatt ground mounted solar panel in the M.D. of Taber.⁴⁰ This document was not prepared specifically in relation to the project. Little

³⁴ Exhibit 27077-X0110, Final Submission of MD of Taber, paragraphs 19-31.

³⁵ Exhibit 27077-X0114, 09-16-2022 SK Response to Submissions of MD Taber, paragraphs 30-31.

³⁶ Exhibit 27077-X0114, 09-16-2022 SK Response to Submissions of MD Taber, paragraphs 28-29.

³⁷ Exhibit 27077-X0013, Attachment 11 – REOC & R Plan.

³⁸ Exhibit 27077-X0088, Attachment [MD-4] - Decommissioning & Reclamation Plan (Vauxhall Solar Farm).

³⁹ Exhibit 27077-X0001, Rule 007 Application (Vauxhall Solar Farm & Substation), PDF pages 10-11.

⁴⁰ Exhibit 27077-X0111.

explanation was provided with respect to who prepared the document, the author's knowledge or experience in respect of the technical reclamation processes the document addressed, and for what uses the document was prepared.⁴¹ Solar Krafte submitted this evidence was speculative, unreliable, and overstated, and does not constitute admissible evidence in this hearing.⁴² Regardless of admissibility, the Commission affords no weight to this document based on the issues identified by Solar Krafte.

50. The M.D. of Taber argued that the polluter pay principle requires the Commission to impose a reclamation security condition, and cited associated caselaw.⁴³ This is not the case. This broad principle has been recognized as tenant of Canadian environmental law, and is also recognized by the *Environmental Protection and Enhancement Act*,⁴⁴ but does not dictate the use of specific regulatory tools, such as reclamation security, when an existing regulatory scheme is already in place in relation to reclamation obligations.

51. In previous decisions, the Commission has been satisfied that compliance with existing reclamation requirements, in the form of the *Environmental Protection and Enhancement Act*, the *Conservation and Reclamation Regulation*, and the *Conservation and Reclamation Directive for Renewable Energy Operations* was satisfactory to address reclamation concerns.⁴⁵ The Commission has previously declined to require reclamation security in respect of solar projects, since the legislature has provided the Minister of Environment and Protected Areas⁴⁶ with the authority to designate the construction and operation of renewable power generation facilities as activities requiring security to be posted,⁴⁷ and authority over the remediation of reclamation of power generation facilities,⁴⁸ and it has not used this authority to impose reclamation security as a requirement in respect of solar facilities.⁴⁹

52. The Commission finds this reasoning is equally applicable here. The legislature created a statutory scheme that governs environmental reclamation obligations in respect of solar electricity generating projects in Alberta, including the delegation of authority in respect of reclamation security obligations. Under this scheme, and unlike some other kinds of facilities, solar generation projects do not require security in respect of reclamation obligations. The Commission is satisfied that the existing reclamation obligations under this scheme that apply to the project are sufficiently stringent, such that no further conditions are required.

3.4.2 Does the M.D. of Taber's Land Use Bylaw require security?

53. The Commission finds that the M.D. of Taber, pursuant to the Bylaw, delegated the discretion to impose conditions on development permits to its Development Authority. Even if this discretion included the ability to impose security obligations on Solar Krafte in respect of the project – and it is not clear that it does – in this case the Development Authority has not done so.

⁴¹ Exhibit 27077-X0110.

⁴² Exhibit 27077-X0114, paragraph 28(b).

⁴³ The M.D. of Taber cites *Orphan Well Association v Grant Thornton Ltd*, 2019 SCC 5.

⁴⁴ *Environmental Protection and Enhancement Act*, Section 2(i).

⁴⁵ Decision 26435-D01-2022, Solar Krafte Utilities Inc., Brooks Solar Farm, May 18, 2022, paragraphs 150-152.

⁴⁶ Ministry previously known as Alberta Environment and Parks.

⁴⁷ *Conservation and Reclamation Regulation*, Section 17.

⁴⁸ *Environmental Protection and Enhancement Act*, RSA 2000, c E-12 and associated regulations.

⁴⁹ Decision 26435-D01-2022, Solar Krafte Utilities Inc., Brooks Solar Farm, May 18, 2022, paragraphs 150-152; see also Decision 26214-D01-2022, Buffalo Plains Wind Farm Inc., Buffalo Plains Wind Farm, February 10, 2022.

54. Enactments “are to be read in their entire context and in their grammatical and ordinary sense harmoniously with the scheme of the Act, the object of the Act, and the intention of Parliament.”⁵⁰ These principles apply equally to municipal bylaws.⁵¹ Section 617 of the *Municipal Government Act* provides the purposes of Part 17, Planning and Development, and the bylaws enacted under it, are to achieve the orderly, economical, and beneficial development of land, and to maintain and improve the quality of the physical environment, without infringing on the rights of individuals for any public interest except to the extent necessary to achieve the overall greater public interest.⁵² A land use bylaw must include provisions for the conditions that must be attached, or that the development authority may attach, to a development permit.⁵³ A development authority may, in its discretion, approve a development permit for a discretionary use, with or without conditions.⁵⁴

55. The M.D. of Taber’s Bylaw provides that no person shall commence development, without a development permit.⁵⁵ The project is located in a Rural Agricultural Land Use District.⁵⁶ Solar energy system Class C, such as the project,⁵⁷ are discretionary uses in this Land Use District.⁵⁸

56. The M.D. of Taber’s Bylaw provides that with respect to permitted uses, the Development Authority: “may place” certain conditions on a development permit, including the “provision of security to ensure the terms of the permit approval are carried out.”⁵⁹ Beneath that provision, the Bylaw provides that with respect to discretionary uses:

“[t]he Development Authority **may place** any of the above conditions on a development permit for a discretionary use in any land use district in addition to any other reasonable conditions to ensure the quality of a development and its compatibility with other existing and approved uses in the area”⁶⁰ [emphasis added].

57. As noted above, the *Municipal Government Act* provides that a land use bylaw may impose mandatory conditions on a development permit, *or* leave such conditions within the discretion of the Development Authority.⁶¹ The word “may,” in the context in which it is used in the Bylaw, indicates that the legislator intended the Development Authority to have the discretion to make the decision as to any such condition.⁶² Therefore, to the extent there is any requirement to post security in the Bylaw in respect of the project, this requirement only arises if it is imposed by the Development Authority under the Bylaw.

⁵⁰ *Rizzo & Rizzo Shoes Ltd (Re)*, [1998] 1 SCR 27 at paragraph 21.

⁵¹ *Thomas v Edmonton (City)*, 2016 ABCA 57 at paragraphs 18-22.

⁵² *Municipal Government Act*, Section 617.

⁵³ *Municipal Government Act*, Section 640(1)(c)(iv).

⁵⁴ *Municipal Government Act*, Sections 640(2)(b)(ii), 642(1).

⁵⁵ Exhibit 27077-X0113, MD of Taber Land Use Bylaw, PDF page 17, Section 12.

⁵⁶ Exhibit 27077-X0118, Attachment – M.D. of Taber Development Permit.

⁵⁷ Solar Krafte has proposed to construct and operate a 60-megawatt solar power plant and the associated Solstice 549S Substation, together designated as the Vauxhall Solar Farm.

⁵⁸ Exhibit 27077-X0113, MD of Taber Land Use Bylaw, PDF page 33, schedule 2, Section 1.

⁵⁹ Exhibit 27077-X0113, MD of Taber Land Use Bylaw, PDF page 20, Section 17(a).

⁶⁰ Exhibit 27077-X0113, MD of Taber Land Use Bylaw, PDF page 20, Section 17(b).

⁶¹ *Municipal Government Act*, Section 640(1)(c)(iv).

⁶² This is the ordinary and grammatical meaning of the word, which is consistent with the definition in the *Interpretation Act*: ““may” shall be construed as permissive and empowering.” (Section 28(1)).

58. On September 20, 2022, Solar Krafte filed Development Permit No. 25-22.⁶³ Solar Krafte's cover letter stated "[w]e attach hereto Municipal District of Taber Development Permit No. 25-22 for the Project."⁶⁴ The Development Permit is effective as of October 14, 2022. The permit does not include the condition that the applicant provide a letter of credit, post a reclamation bond, or provide any other security in respect of reclamation.⁶⁵ Accordingly, reclamation security is not a requirement of the project in this case under the applicable municipally enacted laws.

3.5 Other issues

59. The Commission finds that Solar Krafte's participant involvement program has satisfied the requirements of Rule 007. Solar Krafte notified stakeholders within 2,000 metres of the project and consulted with stakeholders within 800 metres of the project. Notification included two mail outs of a project newsletter, creation of a project website, and advertisement of the project in local newspapers. Consultation was completed one-on-one in person, by videoconference, by phone or by email. Solar Krafte also held a community open house for the project on November 26, 2019, and decided to maintain the original notification boundaries after Rule 007 was amended with updated notification and consultation radii for solar projects. The Brown Group, the sole intervener group granted standing to participate in the proceeding, withdrew its statement of intent to participate.

60. The Commission is satisfied that Solar Krafte has in place a draft site-specific emergency response plan for the construction and operation of the project. The plan was provided to local responders and authorities and specified protocol relating to crisis management, fire prevention, severe weather, and hazardous materials. Solar Krafte also provided site plans, site access maps, and site-specific safety plans.

61. Solar Krafte stated that final equipment selection will be made at a later date and the Commission imposes the following condition to ensure the final equipment does not result in impacts greater than those considered in the applications:

- f. Once Solar Krafte has finalized its equipment selection for the photovoltaic power plant, it must file a final project update with the Commission to confirm that the project has stayed within the final project update specified allowances for solar power plants. The final project update must be filed at least 90 days prior to the start of construction.

62. The Commission has reviewed the applications and has determined that the information requirements specified in Rule 007 have been met. Additionally, the Commission finds that Solar Krafte's participant involvement program satisfied the requirements of Rule 007.

63. The Commission considers the applications to be in the public interest in accordance with Section 17 of the *Alberta Utilities Commission Act*.

⁶³ Exhibit 27077-X0118, Attachment – M.D. of Taber Development Permit.

⁶⁴ Exhibit 27077-X0117, Solar Krafte Cover Letter (M.D. of Taber Development Permit).

⁶⁵ Exhibit 27077-X0118, Attachment – M.D. of Taber Development Permit, PDF page 1, condition 10.

4 Decision

64. Pursuant to Section 11 of the *Hydro and Electric Energy Act*, the Commission approves Application 27077-A001 and grants Solar Krafte Utilities Inc. the approval set out in Appendix 1 – Power Plant Approval 27077-D02-2022, to construct and operate the Vauxhall Solar Farm.

65. Pursuant to sections 14 and 15 of the *Hydro and Electric Energy Act*, the Commission approves Application 27077-A002 and grants Solar Krafte Utilities Inc. the permit and licence set out in Appendix 2 – Substation Permit and Licence 27077-D03-2022, to construct and operate the Solstice 549S Substation.

66. The appendices will be distributed separately.

Dated on December 16, 2022.

Alberta Utilities Commission

(original signed by)

Douglas A. Larder, KC
Vice-Chair

(original signed by)

Matthew Oliver, CD
Commission Member

Appendix A – Summary of Commission conditions of approval in the decision

This section is intended to provide a summary of all conditions of approval specified in the decision for the convenience of readers. Conditions that require subsequent filings with the Commission will be tracked as directions in the AUC's eFiling System. In the event of any difference between the conditions in this section and those in the main body of the decision, the wording in the main body of the decision shall prevail.

The following are conditions of Decision 27077-D01-2022 that requires subsequent filings with the Commission and will be included as conditions of Power Plant Approval 27077-D02-2022:

- a. Solar Krafte shall submit a post-construction monitoring survey report to Alberta Environment and Protected Areas – Fish and Wildlife Stewardship and the Commission no later than January 31 of the year following the mortality monitoring period, and on or before the same date every subsequent year for which Alberta Environment and Protected Areas requires surveys pursuant to subsection 3(3) of Rule 033: *Post-approval Monitoring Requirements for Wind and Solar Power Plants*.
- b. Solar Krafte shall conduct a post-construction comprehensive sound level (CSL) survey, including an evaluation of low frequency noise, at Receptor R5. The post-construction CSL survey must be conducted under representative conditions and in accordance with Rule 012: *Noise Control*. The valid CSL data shall be collected when sound sources of the project are operating under representative conditions and must not be an average of the entire nighttime or daytime period. Within one year after the project commences operations, Solar Krafte shall file a report with the Commission presenting measurements and summarizing the results of the post-construction CSL survey.
- f. Once Solar Krafte has finalized its equipment selection for the photovoltaic power plant, it must file a final project update to the Commission to confirm that the project has stayed within the final project update specified allowances for solar power plants. The final project update must be filed at least 90 days prior to the start of construction.

The following are conditions of Decision 27077-D01-2022 that may not or do not require a subsequent filing with the Commission:

- c. Solar Krafte shall use a resting angle greater than or equal to three degrees for the project solar panels during backtracking periods.
- d. Solar Krafte shall use anti-reflective coating on the project solar panels.
- e. Solar Krafte shall file a report with the Commission detailing any complaints or concerns it receives or is made aware of regarding solar glare from the project during its first year of operation, as well as its response to the complaints or concerns. Solar Krafte shall file this report no later than 13 months after the project becomes operational.