

Notice of Technical Meeting

Amendments to three wind energy projects in the Pincher Creek area proposed by Welsch Wind Power Inc., Windy Point Wind Park Ltd. and NextEra Canada Development & Acquisitions, Inc. (Proceedings 21483, 23377, 22579)

The Alberta Utilities Commission, the independent utilities regulator, has received amendment applications from Welsch Wind Power Inc. (Welsch), Windy Point Wind Park Ltd. (Windy Point) and NextEra Canada Development & Acquisitions, Inc. (NextEra) for the following wind energy projects which were previously approved by the Commission and are located in the Pincher Creek area.

- The Welsch Wind Power Plant was first approved in Approval U2012-34,¹ which granted approval to construct and operate a 69-megawatt (MW) wind power plant consisting of 17 3-MW and nine 2-MW wind turbines. On December 15, 2016, Welsch filed an amendment application in which it proposed to maintain the same total capability but would consist of 11 4.2-MW turbines, five 3.5-MW turbines, one 3-MW turbine and one 2.5-MW turbine. This application has been on hold since March 10, 2017, when Welsch stated that it would provide additional information including an updated noise impact assessment and a wildlife renewable energy referral report and sign-off letter. (Application 21483-A001, Proceeding 21483)
- The Windy Point Wind Park Power Plant was first approved in Approval U2012-368,² which granted approval to construct and operate a 63-MW wind power plant consisting of 21 3-MW turbines. On March 2, 2018, Windy Point filed an amendment application in which it proposed that the power plant consist of 12 4.2-MW turbines with a total capability of 50.4 MW. (Application 23377-A001, Proceeding 23377)
- The Heritage Wind Farm Power Plant was first approved in Approval U2011-210,³ which granted approval to construct and operate a 291-MW wind power plant consisting of 97 3-MW turbines. On March 30, 2018, NextEra filed an amendment application in which it proposed that the power plant consist of 28 3.63-MW turbines with a total capability of 102 MW. Although NextEra applied for 32 turbine locations, it stated it would only construct 28 turbines. (Application 22579-A001, Proceeding 22579)

The project areas of the three projects overlap. Further, as a result of the amendments proposed, each project is considerably different from that which was previously approved. In order to consider these issues, the Commission has decided to hold a technical meeting commencing at **9 a.m. on May 29, 2018 in the AUC hearing room on the 14th floor of 600 Third Avenue S.W., Calgary, Alberta.**

¹ Power Plant Approval U2012-34, Proceeding 738, Application 1606376, February 6, 2012.

² Power Plant Approval U2012-368, Proceeding 1371, Application 1607515, July 31, 2012.

³ Power Plant Approval U2011-210, Proceeding 276, Application 1480111, June 2, 2011.

The purpose of the technical meeting is to establish a process for the review and consideration of the three amended wind power projects that is fair and effective for all parties. **The Commission will not be considering the merits of any of the applications at the technical meeting.**

Topics for discussion at the technical meeting include the following:

- Should these projects be considered as amendments or as new projects?
- How should the Commission consider the cumulative impacts from the three wind projects?
- Whether the noise impact assessments should employ common modelling parameters, common dwelling labels and common reporting formatting.
- Should the noise impact assessment prepared for each amended project be based on the noise priority established by the original project or should noise priority be based on when each amendment application is deemed complete?
- How should noise be mitigated if cumulative sound levels at any noise receptors are predicted to exceed permissible sound levels?
- The need for environmental impact reporting that takes into account the impact of all three projects.
- Determination on final turbine locations and turbine models, including adequate spacing for migratory birds and bats between the turbines of different projects.
- Environmental mitigation plans if cumulative wildlife impacts, including bat and or bird mortality, exceed certain levels.
- Timelines for finalized applications.

The Commission considers that the technical meeting will be most efficient if the three applicants, either separately or jointly, pre-file written submissions on the above issues, and any other issues they would like the Commission to consider. The Commission directs the applicants to file these submissions by no later than May 23, 2018.

The Commission recently undertook a similar process and issued a ruling on further process in relation to wind projects in the County of Forty Mile.⁴ The ruling is attached as Appendix A. The Commission encourages parties to read this ruling but wishes to emphasize that because the Pincher Creek area includes existing and approved but not yet constructed wind farms, it may require a different solution than that which was proposed in the Forty Mile area.

The Commission will webcast the technical meeting and transcripts of the technical meeting will be available on the Commission's eFiling System in all three proceedings following the meeting.

⁴ Exhibit 22966-X0098, AUC Ruling on further process, March 6, 2018.

Please contact Trevor Richards at trevor.richards@auc.ab.ca or 403-592-4469 or Taylor McCusker at taylor.mccusker@auc.ab.ca or 403-592-4370 if you have any questions or concerns.

Issued on April 26, 2018.

Alberta Utilities Commission
Douglas A. Larder, QC, General Counsel

Appendix A – Ruling on further process



23049_X0077_Rulingr
eTechnicalMeeting_00

(consists of 9 pages)

March 6, 2018

To: Parties currently registered on Proceedings 22966, 23030, and 23049

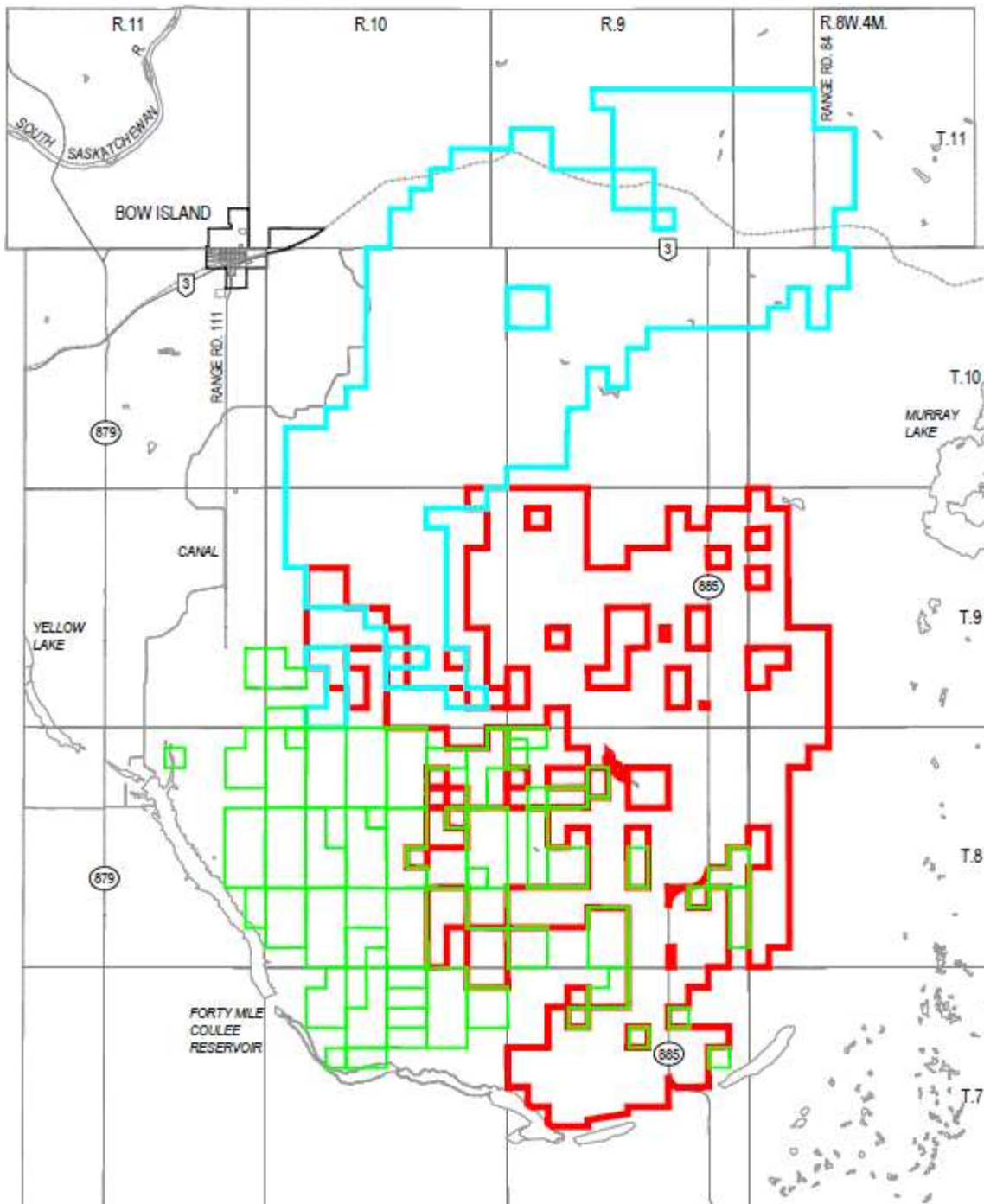
**Three wind energy projects in the County of Forty Mile proposed by Renewable Energy Systems Canada Inc., Suncor Energy Inc. and Capital Power Whitla LP
Proceedings 22966, 23030, and 23049
Applications 22966-A001, 23030-A001 to 23030-A005, and 23049-A001 to 23049-A002**

Ruling on further process

1. The Commission received applications from Renewable Energy Systems Canada Inc., (RES) Suncor Energy Inc. (Suncor) and Capital Power Whitla LP (Capital Power) for the following wind energy projects located in the County of Forty Mile:

- RES's 398.48-megawatt (MW) Forty Mile Wind Power Project;
- Suncor's 400-MW Forty Mile Wind Power Project; and
- Capital Power's 298.8-MW Whitla Wind Project.

2. As shown in the map on the following page, the three projects are adjacent to each other and, in some cases, overlap.



- Proceeding 22966 - Forty Mile Wind Project, Berkshire Hathway Energy Company and Renewable Energy Systems Alberta Limited Partnership
- Proceeding 23030 - Forty Mile Wind Project, Suncor Energy Inc.
- Proceeding 23049 - Whitta Wind Project, Capital Power Corporation

3. Given the large scale of the projects and their overlapping nature, the Commission decided to hold a technical meeting and requested pre-filed written submissions from the three applicants. Due to scheduling conflicts the Commission substituted a written process for the technical meeting.

4. In its notice of technical meeting, the Commission requested that the parties address the following topics in their submissions:

- How the Commission should consider the cumulative impacts from the three wind projects.
- The need for representative noise impact assessments (NIAs) that take into account all three proposed projects.
- Whether the NIAs should employ common modelling parameters, common dwelling labels and common reporting formatting.
- Noise mitigation plans if cumulative sound levels at any noise receptors are predicted to exceed permissible sound levels.
- The need for environmental impact reporting that takes into account the impact of all three projects.
- Whether the environmental studies can use consistent and similar techniques, equipment and personnel for surveys of the three projects, particularly for the pre-construction acoustic bat activity surveys and for the post-construction bird and bat mortality surveys.
- Determination on final turbine locations and turbine models, including adequate spacing for migratory birds and bats between the turbines of different projects.
- Transmission proliferation and the potential for sharing transmission interconnections.
- Potential to combine the three proceedings.
- Timing for finalized applications.

5. RES, Suncor and Capital Power each provided written submissions on the above topics in early January.¹ All three applicants subsequently responded to a round of information requests (IRs) issued by the Commission and filed written reply submissions.²

¹ Exhibit [22966-X0073](#), BHE RES AUC Technical meeting submissions (January 5, 2018); Exhibit [23030-X0069](#), Suncor letter to AUC regarding pre-filing materials in advance of technical meeting (January 5, 2018); Exhibit [23049-X0063](#), Written submissions of Capital Power (Whitla) LP re technical meeting (January 5, 2018).

² Exhibit [22966-X0091](#), BHEC-RES reply submission (February 2, 2018); Exhibit [23030-X0078](#), Suncor - 40 Mile - AUC IR response reply (February 2, 2018); Exhibit [23049-X0075](#), Reply argument of Capital Power – AUC technical session (February 2, 2018).

6. The goal of this preliminary technical meeting process was to establish a fair and effective schedule and process for the review and consideration of the three projects having regard to the following: (i) the three applications were filed within weeks of each other,³ (ii) the proposed projects are located in the same area and overlap, and (iii) each project is relatively large, between 300 and 400 MW. The Commission considers this factual situation to be unique, and as such sought input from parties on whether a specific process tailored to these circumstances is required.

7. The Commission has considered the process that it will follow to review these three projects in this instance, and has authorized me to communicate its decision as set out below.

Separate proceedings for the applications

8. In its notice of technical meeting, the Commission requested submissions on the potential to combine the three proceedings, as well as the timing for finalized applications. Capital Power and RES submitted that a single hearing would be procedurally unfair to the applicants. Suncor submitted that the parties should enter into negotiations for the purpose of resolving issues surrounding cumulative noise impacts, which would likely render a combined proceeding unnecessary. However Suncor submitted that if that process failed, the Commission may have to implement a combined process specifically to determine noise-related matters.

9. The Commission recognizes that the advantages of a combined proceeding could include the ability for interveners affected by all three projects to streamline their intervention, and the potential benefits of assessing the projects' cumulative effects.

10. However, there may be significant disadvantages to a combined proceeding. The three projects have been proposed by separate entities and are not at the same stage of the application process, nor do they necessarily share significant common factual or legal issues. Although there may be some interveners common to all three projects, there may also be interveners and objections specific to each proceeding. In a combined process, one applicant's decisions, such as changing its final turbine layout or amending the project, could have a significant impact on another applicant's project. As a result, the regulatory process for all three projects could be unduly delayed as a result of the actions of only one project proponent, thereby prejudicing the other applicants.

11. The Commission has consequently determined that the potential benefits of a combined proceeding are outweighed by the potential prejudice posed by such a process, and that it will not combine the three applications into a single proceeding. Each project will be assessed in a separate process. The Commission will consider the potential cumulative effects of the three projects, including cumulative noise and environmental effects, in the manner set out below.

Assessment of cumulative noise impacts: when applications are "deemed complete"

12. The purpose of the Commission's Rule 012: *Noise Control* is to ensure that the noise from a facility, measured cumulatively with noise from other energy-related facilities, does not exceed the permissible sound level (PSL) calculated in accordance with the rule. Measured

³ The applications were registered on the Commission's eFiling System as follows: (i) RES on September 22, 2017; (ii) Suncor on October 22, 2017; and (iii) Capital Power on October 26, 2017.

independently of each other, the NIAs submitted for the three proposed projects each appear to individually meet the PSL for the receptors (dwellings) identified, as stipulated in Rule 012. However, because the three NIA's do not take into account noise from the other projects proposed for the area, it is possible that the PSL at some receptors may, and likely will, be exceeded if more than one of the projects is approved.

13. The Commission's Rule 007: *Applications for Power Plants, Substations, Transmission Lines, Industrial System Designations and Hydro Developments* does not currently contain requirements facilitating the consideration of cumulative impacts for projects located in proximity to each other and applied for within a similar timeframe. Rule 007 therefore does not provide additional guidance for the process to be followed in these circumstances.

14. Rule 012 is designed to consider cumulative noise impacts by requiring new facilities to take into account existing noise in the area when determining compliance with the rule. The cumulative sound level as defined in Rule 012 includes: (i) the comprehensive sound level;⁴ (ii) noise from "proposed facilities"; (iii) noise from energy-related facilities that have been approved but not yet constructed; and (iv) the predicted noise from the applicant's proposed facility. Rule 012 defines a proposed facility as "a facility for which an application has been deemed complete by the Commission, but is not yet approved or for which an approval has been issued, but is not yet constructed." The current approach under Rule 012 therefore requires applicants to include noise impacts from other applied-for projects only once those applications are "deemed complete".

15. In the present circumstances, three applications for overlapping wind projects were submitted to the Commission within weeks of each other. Although there is an ongoing consultation process with respect to potential revisions to Rule 012,⁵ and future amendments to that rule may or may not include criteria for when an application is "deemed complete", there is currently no definition in Rule 012 that addresses the present situation.

16. In light of the unique facts before it, the Commission will apply a specific definition of "deemed complete" to the three wind projects proposed in proceedings 22966, 23030, and 23049 for the purposes of assessing noise impacts under Rule 012. For these three proceedings, an application will be "deemed complete" when: (i) a final turbine layout has been submitted; and (ii) the Commission is satisfied that the applicant has provided all of the information required by Rule 007 for a wind power plant.

- i. **Final layout:** notwithstanding that Rule 007 does not expressly require a final turbine layout, the Commission considers that, in these singular circumstances, a finalized layout is necessary to allow the Commission to assess whether persons may be directly and adversely affected by the applications. This includes that there are no remaining alternative turbine locations. More particularly, the Commission considers that in order to assess the potential impacts of the projects in these circumstances, it requires NIAs that are based on final turbine locations.

⁴ The comprehensive sound level includes ambient sound level, noise from existing facilities and energy-related facilities and should exclude abnormal noise events.

⁵ [Bulletin 2017-11](#), AUC Rule 012: Noise Control – Consultation on noise issues, December 13, 2017.

- ii. **Rule 007 completeness:** this means that the Commission is satisfied that all of the information requirements of Rule 007 have been met. For further clarity, the Commission’s IR process does not necessarily have to be concluded for an application to have met the information requirements in Rule 007. The Commission may, after an application is deemed complete, ask IRs requesting information that is in addition to Rule 007 requirements, or for the purpose of clarifying or testing the information provided. However, until all of the answers to the Commission’s IRs seeking information necessary to meet Rule 007 requirements have been provided, the application cannot be “deemed complete”. This would include, for example, the signoff required under Rule 007, Section 3.2, PP10 from Alberta Environment and Parks (AEP) for new wind project applications, any Commission IRs related to that signoff, and the noise impact assessment required under Rule 007, Section 3.2, PP27.

17. Once an application is deemed complete, the Commission will issue a notice. In these circumstances, the notice will specify the date when the application was deemed complete. Any applications deemed complete after that point must take into account the preceding projects (those for which notice of application has been issued) for the purpose of calculating the cumulative sound level in Rule 012, and incorporate “proposed facilities” into NIAs and any applicable noise mitigation plans.

Assessment of cumulative noise impacts: common NIA elements

18. In the notice of technical meeting, the Commission also asked the applicants whether the NIAs should employ common modelling parameters, common dwelling labels and common reporting formatting. The applicants provided a collaborative response on common modelling parameters and turbine labels for their respective NIAs to facilitate the Commission’s comparison and review.⁶ The applicants did not agree on the use of common receptor/dwelling labels and all submitted that the use of common reporting formatting was not necessary.

19. The Commission finds that the common modelling parameters agreed to by the applicants and set out in the table below are reasonable and will facilitate its review of the projects’ respective NIAs.

Proposed NIA common modelling parameter	Proposed NIA common input value
Ground Absorption	0.50
Max Radius of Influence (Search radius)	5 kilometres
Terrain	The CanVEC database produced by Natural Resources Canada (NRCan) with standard 8 metre terrain intervals.
Receptor Height	One-storey dwellings will be modelled using receptors at 1.5 metres above ground level. Two-storey dwellings will be modelled using receptors at 4.5 metres above ground level.
Third Party Facilities (TPFs)	Five (5) TPFs have been identified and parties have agreed to use the same noise emission values for

⁶ [23049-X0071](#), Capital Power Responses to AUC Joint Technical Meeting IRs, Attachment 2, PDF page 14; [22966-X0089](#), BHE RES AUC IR response, Appendix 1, PDF page 15; [23030-X0074](#), Suncor cover letter joint IR responses, PDF pages 1-2.

	these TPFs. All projects will use the following agreed upon noise emissions from these TPFs: <ul style="list-style-type: none"> • Pine Cliff Energy Ltd. 16-2-7-9- W4 Compressor Station (RWDI Measured) • Encana Corporation 15- 19-7-9-W4 Compressor Station (RWDI Measured) • AltaLink substation 13- 33-7-9-W4 Substation (RWDI Measured) • Craft Oil Ltd 15-13-8-10-W4M Compressor Station (Stantec Measured) • Bellatrix Exploration Compressor Station (Golder Measured)
Relative Humidity	70 %
Temperature	10° C
Model Version (CADNA A)	2017

20. The parties agreed on the following common labelling system for individual wind turbines: (i) RES turbines will start with “B” (B-1, B-2, etc.); (ii) Suncor turbines will start with “S” (S-1, S-1, etc.); and (iii) Capital Power turbines start with “C” (C-1, C-2, etc.).

21. The parties appeared to agree in principle with the use of common labelling for dwellings/receptors, but did not agree to provide a unique identifier for each receptor affected by the three projects using a number and letter identifying the project causing the effect. Suncor submitted that consensus must first be reached on an approach to determine which projects affect which receptors. Capital Power submitted that any project design changes could create an unworkable and cumbersome process. RES proposed a concordance table process in each NIA rather than a negotiated common receptor list, as the parties discussed consistent labelling and UTM coordinates for receptors but could not reach final agreement on those values.

22. Since they filed their submissions to the Commission, Capital Power and RES have submitted updated NIAs⁷ that use all of the agreed-upon common modelling parameters in the table above, as well as the common labelling system for individual wind turbines. Suncor has submitted an updated NIA⁸ which uses most of the agreed-upon common modelling parameters, except ground absorption, terrain parameters, and search radius. All of the applicants have not used a consistent dwelling/receptor labelling system, but in some cases have identified where receptors are common to multiple projects.⁹

23. The Commission considers that identifying receptors at the same locations for multiple projects would be useful to facilitate its assessment of the projects and that the most efficient method of achieving this goal is for all three applicants to provide a table of concordance identifying any receptors which are the same as those identified in another project’s NIA. The Commission directs the parties to file this concordance by March 20, 2018. Further, as Suncor has not updated its NIA to include all of the agreed-upon common modelling parameters, the Commission directs Suncor to provide an updated NIA as of the date that it has eliminated its alternate turbine locations thus finalizing its turbine layout.

⁷ Exhibit 23049-X0076, Responses to AUC Round 2 IRs; Exhibit 22966-X0093, BHEC-RES Forty Mile NIA Update.

⁸ Exhibit 23030-X0003.01, Attachment 11 – Noise Impact Assessment.

⁹ E.g. Exhibit 23049-X0076, Responses to AUC Round 2 IRs, PDF page 32, Table 1, Receptor IDs 68, 69, and 71 are identified as common with the RES project. Receptor R35 is identified as receptor 72 from the RES project.

24. Finally, the Commission does not find it necessary for the applicants to use a common reporting format in their respective NIAs. The Commission considers that such a direction would not yield additional information and would create an added administrative burden without a significant corresponding benefit.

Assessment of cumulative environmental impacts

25. The Commission also requested submissions on the need for environmental impact reporting that takes into account the impact of all three projects, and whether the environmental studies can use similar techniques, equipment and personnel.

26. All three applicants submitted that the current regulatory requirements in place are sufficient to address the environmental impacts for each project. RES and Capital Power both noted the Rule 007 requirement for AEP signoff of each project's environmental evaluation for the purpose of ensuring compliance with AEP requirements. AEP assesses each project to ensure compliance with the *Wildlife Directive for Alberta Wind Energy Projects*, and this process provides a sufficient understanding of the projects' environmental effects, both individually and collectively, such that adequate monitoring and mitigation measures can be developed and implemented. Suncor submitted that the environmental evaluation of each project was completed in accordance with the current regulatory regime and that a cumulative assessment of these projects should not be required. The applicants all submitted that the environmental studies for all three projects already use consistent techniques where necessary, and that any further similarities in techniques, equipment or personnel are either unnecessary or impractical, particularly with respect to the potential for conflicts of interest and other issues surrounding the use of common personnel.

27. The Commission finds that it would not be useful for the applicants to redo their environmental evaluations for the purpose of using common techniques, equipment and/or personnel, because it would not provide additional information to assist in its determination of the environmental effects of the projects. Given the work already performed in accordance with current regulatory requirements, it is not necessary for the applicants to conduct a single, cumulative environmental assessment in order to consider the environmental effects of the projects.

28. By way of separate letter, the Commission will instead request that AEP provide comments and recommendations on the potential cumulative effects of the projects and mitigation measures that may be considered to address those effects.

Transmission proliferation

29. Finally, the Commission requested comments on transmission proliferation and the potential for sharing transmission interconnections. Capital Power and Suncor commented that there are limited opportunities to mitigate transmission proliferation in the area by sharing interconnection infrastructure. All three applicants submitted that interconnection matters are generally left to the transmission facility owner, in consultation with market participants and the Alberta Electric System Operator (AESO), and are therefore outside the scope of the present applications.

30. The Commission recognizes that there is a specific process for the development of transmission facilities to connect generation facilities to the Alberta interconnected electric system. That said, Section 2 of the *Hydro and Electric Energy Act* (HEEA) provides that one of its purposes is to provide for the “economic, orderly and efficient” generation and transmission of electric energy in Alberta. In considering an application for a power plant under Section 11 of the HEEA, the Commission must consider whether the construction or operation of the proposed power plants is in the public interest, having regard to its social, economic, and environmental effects. The public interest test in Section 11 must be considered in light of HEEA’s stated purpose to provide for the efficient generation and transmission of electric energy in the province. In certain circumstances, this may include consideration of whether proposed projects will contribute to the duplication of transmission infrastructure.

31. Notwithstanding that the Commission has not yet received applications for the transmission facilities required to connect the three projects to the Alberta interconnected electric system, the Commission strongly encourages the applicants to continue to explore the possibility of shared transmission facilities with the transmission facility owner(s) and the AESO.

32. Please contact me at 403-592-4385 or at Kim.Macnab@auc.ab.ca if you have any questions about the matters addressed in this ruling.

Regards,

Kim Macnab
Commission Counsel