

SENT VIA EMAIL

December 01, 2021

Notified Market Participant Corporate Legal Name Address Line 1. Address Line 2. City, Province, Postal Code.

Dear Notified Market Participant Primary Contact:

# Re: Planned Generating Facility Connection in the AESO's South Planning Region

The Alberta Electric System Operator (AESO) would like to advise you that TransCanada Energy Ltd. (TCE) has applied for transmission system access to connect its Saddlebrook Solar and Storage Project (planned Facility) to the Alberta interconnected electric system (AIES) in the AESO South Planning Region.

A copy of the AESO Need Overview document is attached for your information. The AESO Need Overview describes the AESO's proposed transmission development to connect the planned Facility to the AIES, and the AESO's next steps, which includes submitting a needs identification document (NID) application to the Alberta Utilities Commission (AUC) for approval.

The purpose of this letter is to advise you that the AESO has identified that, under credible worse case forecast conditions, the operation of the [Effective Generation Facility Name] ([Effective Generation Facility Asset ID]) may be affected following the connection of the planned Facility.<sup>1</sup>

# Connection Assessment Findings

An engineering connection assessment was carried out by the AESO to assess the transmission system performance following the connection of the planned Facility. The connection assessment identified the potential for thermal criteria violations following the connection of the planned Facility, under credible worse case forecast conditions, with all transmission facilities in service (Category A). Specifically, thermal criteria violations were observed on the 138 kV transmission lines 765L and 691L. The AESO will develop mitigation measures, which may include restoring the thermal ratings of 765L and 691L, to address the observed thermal criteria violations.

In addition, thermal criteria violations were also identified when a single transmission facility is out of service (Category B) following the connection of the planned Facility. To mitigate these potential system performance issues, planned remedial action schemes (RAS), and a new RAS may be used. The AESO may also make use of real-time operational measures to mitigate these potential system performance issues, in accordance with <u>Section 302.1 of the ISO rules</u>, <u>Real Time Transmission Constraint Management</u> (TCM Rule), which is in effect today. When applied, the TCM Rule could result in the AESO issuing directives for curtailment to source assets that are effective in managing a constraint.

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<sup>&</sup>lt;sup>1</sup> The studies were performed assuming the Rate STS, Supply Transmission Service, contract capacity of 109 MW.



The connection assessment identified source assets, including the **Effective Generation Facility Asset ID**], which are effective in mitigating the potential transmission constraints.

If the AESO determines that congestion will arise under Category A conditions, the AESO will make an application to the AUC to obtain approval for an "exception" under Section 15(2) of the *Transmission Regulation*. The AESO will notify market participants if and when the AESO determines it is necessary to apply to the AUC for approval of such an exception.

## For Further Information

The engineering connection assessment will be included in the AESO's Saddlebrook Solar and Storage Project Connection NID application. Following submission of the NID application to the AUC, the NID application will be posted on the AESO website at: https://www.aeso.ca/grid/projects/

If you have any questions or concerns, please contact the AESO at 1-888-866-2959 or stakeholder.relations@aeso.ca

## Attachments:

AESO Need Overview: Need for the Saddlebrook Solar and Storage Project Connection in the Town of High River area



# Need for the Saddlebrook Solar and Storage Project Connection in the Town of High River area

TransCanada Energy Ltd. (TCE) has applied to the Alberta Electric System Operator (AESO) for transmission system access to connect its proposed Saddlebrook Solar and Storage Project (Facility) in the Town of High River area. TCE's request can be met by the following solution:

#### PROPOSED SOLUTION

- Add one 138 kilovolt (kV) transmission line to connect the Facility to the existing 138 kV transmission line 727AL in a T-tap configuration.
- Add or modify associated equipment as required for the above transmission developments.

#### **NEXT STEPS**

- The AESO intends to apply to the Alberta Utilities Commission (AUC) for approval of the need in early-2022.
- The AESO's needs identification document (NID) application will be available on the AESO's website at www.aeso.ca/grid/projects at the time of its application to the AUC.

The following organizations have key roles and responsibilities in providing access to the transmission system:

## **THE AESO**

- Must plan the transmission system and enable access to it for generators and other qualified customers.
- Is regulated by the AUC and must apply to the AUC for approval of its NID.

# **ALTALINK**

- Is the transmission facility owner in the Town of High River area.
- Is responsible for detailed siting and routing, constructing, operating and maintaining the transmission facilities.
- Is regulated by the AUC and must apply to the AUC for approval of its transmission facilities applications.

## WHO IS THE AESO?

The Alberta Electric System Operator (AESO) plans and operates Alberta's electricity grid and wholesale electricity market safely, reliably and in the public interest of all Albertans. We are a not-for-profit organization with no financial interest or investment of any kind in the power industry.

We appreciate your views, both on the need for transmission system development and proposed transmission plans. If you have any questions or comments, please contact us directly.

# **CONTACT US**

## Alberta Electric System Operator

AESO Stakeholder Relations stakeholder.relations@aeso.ca 1-888-866-2959

2500, 330-5th Avenue SW Calgary, AB T2P 0L4 Phone: 403-539-2450

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