



October 30, 2008

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Dear Rob:

**Re: 2009 Loss Factor Models**

TransCanada Energy (“TransCanada”) has been working with the AESO and other stakeholders to review the calculation of the 2009 loss factors. TransCanada has reviewed the AESO’s “2009 Loss Factors” dated October 20, 2008 and the loss factor models provided by the AESO on October 17, 2008.

**Recalculation of 2009 Loss Factors**

TransCanada recommends that the 2009 loss factors be reviewed and potentially recalculated to recognize the following:

1. TransCanada is concerned about the increase in losses for the Sheerness generator between 2008 and 2009. The AESO has provided an explanation for the increase in loss factor in the October 20 letter on 2009 loss factors;

*Sheerness and Battle River generation are higher and area loads are lower in most of the 2009 base cases and resulting in higher loss factors.*

In the generation stacking order provided by the AESO, the Sheerness generation has increased by an average of 4% while the Battle River generation decreased by 2%. TransCanada expects that the loss factor for Sheerness would not change materially in 2009 given the modest change in generator output levels. TransCanada cannot see a strong trend in reduced loads either. TransCanada requests a review of the load and generation assumptions in the Sheerness area and to provide a more complete explanation for the increase in loss factors.

2. TransCanada understands that the MATL transmission line will not be in service until 2010. TransCanada understands the change in the in-service date will be made shortly through formal channels. TransCanada had not provided any input on this matter when the draft GSO was provided on July 17 as the MATL import generator was not included in the draft stacking order. It was only recently that the assumption on the MATL in-service date was made available to stakeholders.

Therefore, TransCanada requests that the MATL Transmission line, modeled as an import generator, be removed from the loss factor models for 2009.

3. Given that the Ft. McMurray forecast for increase generation relative to load is contrary to other representations from AESO planning representatives (at least for the five year outlook), TransCanada requests more details on the forecast loads and generation in this key area of Alberta. Our overall impression is that load growth has at least to some extent offset generation growth and the magnitude of the increase in losses doesn't appear to be justified.

### Future AESO Work in 2009

For the AESO's 2009 loss analysis work plan, TransCanada requests a clear commitment and timeline to complete the AESO review of comparing previous forecasts of losses using forecast inputs with loss factor calculations based on actual data. We understand that loss factor calculations based on actual data would use actual generation, load, import and export levels and the actual system configuration.

Another area of concern is that system loss forecasts in aggregate appear to be consistently greater than actual losses at an aggregate level. TransCanada has raised this issue repeatedly over several years. The improved accuracy of loss forecasts is recognized and appreciated. However, an unbiased forecast should, over time, have actual losses that are sometimes higher and sometimes lower than forecast. The calibration factor reflects a refund for the last eight quarters with the largest one occurring in the last quarter. TransCanada requests a review of this issue to identify why these over-forecasts continue to occur. TransCanada is not persuaded these over-forecasts are a result of understated load forecasts. It may be just as likely that refunds of losses from meter errors may be contributing to overstated load forecasts.

For estimating the shift factor, TransCanada supports the request made at the October 27 meeting for confirmation that the artificial neural network places appropriate weight on more recent information including transmission upgrades such as the KEG upgrade. Use of historical trends has limited value when a major system upgrade like the KEG conversion has occurred. Rather, more weight should be placed on historical data since the KEG conversion came into service.

TransCanada requests confirmation that deferral account adjustments arising from various factors such as meter errors have been included in the data used to forecast losses. This confirmation should include recent adjustments such as the TAA PFAM adjustment and other adjustments that the AESO has become aware of recently. The \$31.8 million adjustment relating to a meter error impacting 2001 to 2004 losses should also be reviewed but has been known for some time.

TransCanada offers a final comment on the level of AESO resources devoted to loss factor analysis. If the 2007 loss forecast percentage of 4.76% is over by even 10% (i.e. 0.476%), this translates into an overpayment of losses of about \$20 million. Even small changes in loss factors and aggregate losses can

have a large financial impact on STS customers. TransCanada supports the AESO using reasonable levels of resources to conduct reviews of loss factor calculations.

If you have any questions, please contact me at 920-2087 or call Dan Levson or Larry Sibbald.

Yours truly,

**TRANSCANADA ENERGY**

A handwritten signature in black ink, appearing to read 'Jim Paton', written in a cursive style.

Jim Paton  
Market Services  
TransCanada Energy

CC: Larry Sibbald – TransCanada  
Dan Levson – TransCanada



November 3, 2008

Dan Levson  
TransCanada Pipelines Limited  
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Dear Mr. Levson:

Re: TransCanada Letter on 2009 Loss Factors, October 30 2008

Thank you for taking the time to provide comments on the 2009 Loss Factors. The AESO's response appears in the order you asked them. We have posted your pdf letter on our web site as a reference to our responses below.

**Question 1:** Increase in loss factors at Sheerness and Battle River.

**Answer 1:** The Sheerness and Battle River loss factors are dependent on the net flows of the area in question (and adjacent areas), as is with all areas. In the case of Sheerness and Battle River, the Empress area has significant impact on Sheerness and Battle River in addition to its own area net flows. The Empress area load is lower in 2009 than in the 2008 base cases. In addition, import from SaskPower is also added in the 2009 base cases (as directed per the 2007 Transmission Regulation) as opposed to zero inter-tie flows in the 2008 base cases. In summary, the net of area generation and load has increased – the increase is primarily responsible for higher loss factors in those areas. These increases are also borne out in the information contained within the base cases posted on the AESO web site.

**Question 2:** Project data.

**Answer 2:** All projects included in the 2009 base cases were confirmed following consultation with the project proponents and internal project managers at the AESO for transmission related projects. All information in the base cases and generic stacking order was based on the most current

data available and applied as per our Rules process on Loss Factors. As you may recall, the AESO included all stakeholders in the development of the Rule (in 2005 and 2007) so as to best represent how to arrive at a meaningful project list. The AESO understands project data are updated regularly. It is not feasible to update project information in the base cases and calculate loss factors every month, hence the extensive collaborative Rule with stakeholders on how to choose the best way to incorporate project data on an annual basis. The AESO has continued to adhere to the Rule process to ensure the delivery of a consistent loss factor product. Of course, in case of changes/updates regarding new projects, the AESO always completes a high level assessment of the loss factors to check the impact of changes. In the very specific case of the Montana to Alberta Tie Line, removal of this project was assessed to have a small threshold change that is lower than the 0.25% discretionary amount prescribed in the Rule. Therefore, the recalculation of the overall loss factors due to this single project restatement of details would not be in line with the Rule and agreed upon process established with stakeholders. The AESO continues to balance the acquisition of updated project data early in the calculation process while keeping in mind the delivery dates required for the loss factors.

In addition, the status of imports in the GSO (Saskatchewan, BC, and MATL) was not included in the draft list as 2009 is the first year imports were to be included [as per the 2007 Transmission Regulation] and the AESO wished to consult with stakeholders first to assess the best location for imports in the stacking order. This inclusion of imports was therefore discussed in the July 23 2008 stakeholder meeting and imports were subsequently reflected in the GSO published in August 27 2008.

**Question 3:** Specific area information regarding loss factors.

**Answer 3:** The next year loss factor determination is based on attributes such as new projects energization, new transmission facilities, and decommissioning of facilities. The fifth year loss factors are based on five year project and topology change information. The 2012 loss factor result reflects the planning scenarios based on the information available at the time. The AESO notes the 'next year' information tends to be more accurate as the projects have been likely approved by the Regulator and hence have a high probability of being connected as described. The AESO does not find any contradiction between the loss factor base cases and the planning projections on load and generation scenarios, as suggested. It should also be noted the Ft McMurray area does tend to attract more transmission system activity due to the growth potential and hence has a more uncertain future.

Regarding your comments on future work, the AESO offers the following:

- Previous commitments on forecast comparisons. The AESO has undertaken to provide a comparison of 2006 forecast and 2006 actual values. The additional annual and fifth year calculations requested of

AESO by stakeholders in the past 24 months has caused a backlog in opportunity requests being completed, such as the forecast comparisons. The AESO still intends completing the comparison. Actual commitments to the loss factor Rule will be performed first with additional opportunity work being carried out secondly.

- Forecasting Accuracy. The AESO has reviewed the 2006 and 2007 loss forecasts and finds them to be within 3%. The AESO requests TCE to outline what constitutes an acceptable forecast error and the AESO can review the request in this context. Regarding the issue of over forecasting, the AESO has offered the ever increasing load forecast as one reason as to why the loss forecast may be "catching up". The TAA adjustments also have skewed results prior to being tried in 2008. As an opportunity assessment, the AESO can attempt to undertake a review. Again, the base work of providing the obligations under the Rule will take precedent. To make the endeavor meaningful, a scope will be set up, at stakeholder's approval, to ensure the core of the issue is being examined.
- Forecasting of Losses. The AESO confirms more recent data is used in our forecasting data with more weight. At least five years of data is used in our determinations.
- Regarding the use of adjusted data, the AESO confirms the data used in loss factor work is current.

The AESO will be providing specific loss factor assessments in the final loss factor letter to be posted on November 7 2008. Again, thanks for taking the time to provide input.

Yours truly,

Robert Baker, P.Eng.  
Forecasting, AESO

cc:  
Doyle Sullivan, P.Eng  
Ashikur Bhuiya, P.Eng