



October 2, 2007

Alberta Electric System Operator
2500, 330 – 5th Avenue S.W.
Calgary AB T2P 0L4

Attention: Doug Simpson
Director, Market Operations

Dear Mr. Simpson:

Re: AESO Recommendation Paper Congestion Management Plan (“the CM Paper”)

EPCOR welcomes the opportunity to provide comments on the CM paper. EPCOR is gratified that the Alberta Electric System Operator (“AESO”) is taking the initiative to proactively develop a plan to address congestion management, particularly in light of the delays to the regulatory approvals for the 500 kV north-south transmission line between the Edmonton and Calgary areas. EPCOR also supports the abandonment of the “trigger participant” concept to manage transmission congestion. However, EPCOR does have a number of concerns with the CM Plan advanced by the AESO under cover of its letter of August 30, 2007.

In summary, EPCOR believes that, in the short term, a pro rata curtailment of all “effective” generators in a congested area is a better solution than that proposed by the AESO. Over the longer term, EPCOR believes that payments, outside of the merit order, should be offered on a competitive basis to generators who are constrained down as a result of congestion, to those who are required to provide RAS service in congested areas, and to those who are dispatched up to provide TMR service in uncongested areas of the Province. EPCOR’s concerns are summarized below and described in detail subsequently in this letter.

Summary of EPCOR’s Concerns

1. The process for determining “effective generation and load” is unclear to us and should be the subject of further discussion.
2. Neither the Transmission Development Policy (“TDP”) nor the Transmission Regulation recognize a lag between construction of generation and transmission as “abnormal operating conditions” which would merit the use of RMO to manage congestion.
3. The use of a “reverse merit order” (“RMO”) to manage transmission congestion is inconsistent with the Electric Utilities Act, S. A. c. E-5.1 (“EUA”).
4. EPCOR believes that the AESO is a common carrier and accordingly should manage capacity constraints by allocating available capacity *pro rata* among all of their customers within a certain class.
5. EPCOR is concerned that use of an RMO to manage congestion will have unforeseen Pool Price impacts, particularly in the absence of Pool Price analysis by the AESO.
6. EPCOR is of the view that out of merit payments to generators who are providing assistance in addressing congestion on the AIES should be considered by the AESO in the longer term, as this is likely to result in the least impact to Pool Price.

Discussion:

1. *Process for determining “effective generation and load”*

The AESO has indicated that its first step in managing congestion is to determine “effective generation and load” able to relieve the constraint in an area. The CM Paper does not set out in any detail what methodology will be used by the AESO to determine what constitutes “effective generation and load” in an area. EPCOR would appreciate knowing what mechanisms the AESO will use in making this determination. Hopefully this will be the subject of further consultation.

2. *“Abnormal operating conditions” definition*

In the Executive Summary of the CM Paper, the AESO states, “*The DOE does recognize, however, that congestion may occur under abnormal operating conditions, when there is a lag between transmission build and generation development or in local load pockets*”. In EPCOR’s view, this statement is not supported in either the TDP or in the Transmission Regulation. The Transmission Regulation¹ defines “abnormal operating conditions” as follows:

“abnormal operating conditions” includes conditions where transmission facilities are out of service, emergency conditions exist, construction or commissioning of transmission facilities occurs or transmission facility maintenance cannot be coordinated with generating unit outages;”

In EPCOR’s view, the circumstances which constitute “abnormal operating conditions” are short-term and ephemeral in nature, not the situation where there is a significant lag between transmission build and generation development. The TDP also discussed the circumstances where congestion could occur as being “*planned maintenance, forced outages of transmission facilities and/or some critical generation facilities*”.² A lag between transmission build and generation development is not one of the circumstances contemplated in the TDP as constituting “abnormal operating conditions”. In addition, in a growing economy, transmission constraints are very likely to become more, rather less common, and can hardly be characterized as “abnormal”.

3. *Inconsistency between “reverse merit order” (“RMO”) and the Electric Utilities Act (“EUA”)*

One of the duties imposed on the Independent System Operator by the EUA is “*to determine, according to relative economic merit, the order of dispatch of electric energy and ancillary services in Alberta . . .*”.³ This is the legislative basis for the “merit order” used by the AESO to dispatch electric energy in Alberta. The AESO dispatches energy according to an ascending “merit order” of offer prices until the intersection of supply and demand is reached, and the price point in the merit order of that offer block is used to set the Pool Price for the applicable period.

In EPCOR’s view, the EUA only contemplates the use of two potential merit orders, one for energy and one for ancillary services. It does not contemplate the use of additional merit orders to manage transmission constraints or for any other purpose. Furthermore, the use of RMO results in in-merit generators being dispatched off, and otherwise out-of-merit generators being dispatched on, contrary to the requirement to dispatch energy according to economic merit. Although the TDP did contemplate the use of RMO to dispatch down generators in congested areas, this was not enshrined in the Transmission Regulation, which merely required the AESO to “*make rules and establish practices respecting . . . the management of transmission constraints that may occur from time to time.*”⁴

4. *Common carrier obligation to allocate scarce available capacity pro rata*

EPCOR believes that the AESO is a “common carrier”, in that it is required to provide system access to all market participants wishing to exchange electric energy.⁵ The general rule for common carriers is that, in the circumstance where there is insufficient capacity to serve all customers, all customers of a particular class of

¹ AR 86/2007

² TDP, Page 8.

³ S. 17(c), EUA

⁴ S. 17, Transmission Regulation AR 86/2007

⁵ s. 29, EUA

service, (e.g. STS) are curtailed pro rata.⁶ In EPCOR's view, all generators who subscribe for STS service are members of a common class of customers and are required to be treated similarly and without discrimination.

The AESO is also proposing to require new entrants into a congested area to provide RAS service. EPCOR acknowledges that it has been a long-standing practice in Alberta to require RAS schemes for short-standing circumstances when new generators come onto the system. However, these schemes are inappropriate for more than a few months, and EPCOR believes that the AESO should have in place a protocol to compensate new generating units, which are required to provide RAS services for more than a short time (i.e. one or two months).

The AESO states that "*there is no practical way of procuring this service competitively and . . . such schemes are unit specific by nature*"; this seems contrary to the AESO's obligation to offer system access service equally to all who request service. EPCOR believes that the requirement for new generators in congested areas to provide RAS service is likewise contrary to common carrier obligations, and suggests that incumbent generators do indeed have some transmission rights. Use of RAS to manage congestion may be appropriate provided that those providing the service are properly compensated for providing what is essentially a transmission service. The AESO should attempt to contract for this service, notwithstanding their inability to successfully contract in the past. At a minimum, the AESO should be required to pay for RAS in a manner that fully compensates the market participant who provides the service, including fixed costs and lost income from participating in the energy market when the participant is directed to provide RAS.

5. *Pool Price Impacts*

The TDP indicates that congestion or constraints should not alter or distort market prices.⁷ The CM Paper acknowledges this view and provides the view that the RMO approach "*in most cases, causes the least distortion to pool price while sending correct price signals to most market participants*". However, the CM Paper provides no analysis on the likely impacts on Pool Price as a result of implementing the RMO protocol to address congestion. In addition, the AESO contemplates the use of TMR to balance the system, and is likely to increasingly rely on the use of Article 11 of its Tariff to direct on generation in areas of the Province where it is needed. The TDP proposed a methodology for compensating out of merit generators outside of the merit order, which has not been incorporated into the CM Paper.⁸

There is a likelihood that there will be Pool Price distortions as a result of the use of RMO and subsequent use of TMR to dispatch up generators in uncongested areas. There are two possible scenarios. In congested areas, in order to avoid being dispatched down altogether, generators may bid zero, with a resultant downward pressure on Pool prices. Alternatively, in the absence of adequate contracted TMR, generators in the uncongested part of the system who are needed to run to balance the system, will increase their bids. While this is reflective of supply and demand in a congested system, these unconstrained bids may increase the overall Pool Price received by all generators. Neither of these scenarios is reflective of an approach which "causes the least distortion to pool price".

6. *Dispatch down payments to generators in congested areas*

Ideally, generators should bid to be dispatched down and receive payments outside of the merit order, while generators who are to be dispatched on to provide TMR service should bid on and receive payments for this service outside of the merit order. Both of these can be properly characterized as services being offered outside of the merit order, as they are being provided to supplement the inadequate transmission system that has occurred as a result in delay of building transmission. This treatment of these services is likely to have the least impact on the Pool Price. The inadequate transmission is not "abnormal operation conditions" as contemplated by the Transmission Regulation. The cost to load for these services is likely less than they would have had to pay had the necessary transmission been built in time. These services are a type of ancillary services, which the AESO may at some point require even in the absence of contracts. The AESO may wish to develop appropriate

⁶ E.g. NEB Compendium of Terms "Common Carrier. A pipeline company that is obligated to ship all product offered to it for transmission, without contract and usually by monthly nominations. In the event that capacity is not available to meet all requests, services are prorated amongst users."

⁷ "*In our market model, it is critical in the relatively few cases where transmission constraints are not removed, real time congestion arrangements should not set or distort market prices.*" (Page 8, TDP)

⁸ Section 6.2 "Real Time Congestion Management" pages 14 – 15, TDP.

tariff terms for these services, to be used only in emergency situations where they have been unable to contract for the service. Generators in these circumstances must be compensated appropriately for providing the service.

Summary

In summary, EPCOR believes that the AESO's CM Paper proposes a congestion management plan that is flawed both in terms of consistency with the Electric Utilities Act and in terms of accomplishing congestion management without distorting the Pool Price. EPCOR believes that a better solution is for the AESO to procure the services needed to manage congestion, both dispatch down of generators in congested areas and dispatch up of generators in uncongested areas, through a competitive process, outside of the merit order.

I would be more than happy to discuss these comments with you at your convenience. I can be reached by telephone at (403) 717-8943 or by e-mail at lmeyer@epcor.ca.

Yours truly,

EPCOR Utilities Inc.

<Original signed by>

K. Lynn Meyer
Director, Regulatory Policy