

Friday, 2 September 2016

Clare Greenwood
Forecasting, AEMO
Via email

Dear Ms Greenwood,

RE: Energy Conversion Model Stage 2 Consultation, Draft Determination Submission

The Clean Energy Council (CEC) is the peak body for the clean energy industry in Australia. We represent and work with hundreds of leading businesses operating in solar, wind, energy efficiency, hydro, bioenergy, energy storage, geothermal and marine along with more than 4,000 solar installers. We are committed to accelerating the transformation of Australia's energy system to one that is smarter and cleaner.

The CEC's members have raised significant concerns about the draft decision not to proceed with incorporating the "Possible Power" setting as originally proposed. They also see the need to expeditiously make changes to permit the use of local SCADA signals for semi-scheduled generation to support Frequency Control Ancillary Services (FCAS).

There appears to be inconsistencies exist between the draft decision in Possible Power and AEMO's clear expectation¹ that semi-scheduled generators should participate in FCAS in the near future. There are two major issues of concern.

Firstly, the AWEFS 'measure-model' system is currently the only mechanism through which semi-scheduled generators appear in the NEM dispatch engine (NEMDE). The proposed avoidance of 'possible power' data removes the ability for semi-scheduled generators to provide more certain data to the market based on dynamic plant operation and on-site information. Including this information would enable these market participants to better manage their risk with regards to FCAS causer-pays factors, reduce dispatch error and assist in optimising market outcomes, consistently with the dynamic efficiency principles of the National Electricity Objective (NEO).

Semi-scheduled generators should also be provided with the opportunity to provide a ramp rate along with possible power so that their potential capability can be fully considered in NEMDE and in providing FCAS services.

¹ As made evident through discussions with AEMO and the creation a scarce market for regulation FCAS in South Australia when Heywood is operating on a single contingency basis.

In addition, AEMO should be aware that the right for participants to override modelled generation was built into the design of AWEFS from the initial stages of its implementation². CEC members assume this was created because generator operators can prepare more accurate dynamic information about their plant than AWEFS can produce.

Secondly, for some time AEMO has undertaken a practice of managing dispatch of semi-scheduled generators through the Market Management Systems (MMS), rather than the SCADA system. The MMS system interfaces with operator control centres via public telecommunications infrastructure. This system was not designed for the real time operation, or even operate with confidence in the five minute dispatch timeframe (a likely reason for overrides being limited to 30 minute periods), which is expected for participation in the FCAS market. Allowing semi-scheduled generators to access the SCADA system for dispatch would again allow these participants to participate in the ancillary services market, manage their risk and assist in optimising dispatch as expected by the NEO.

The CEC reiterates our concern on omitting Possible Power as this is likely to lead to sub-optimal market design in the near and long term. In addition, the deferred consideration of SCADA for dispatch will delay the potential participation of semi-scheduled generation in FCAS. These measures appear to be counterproductive to the NEO.

We also note that (due to transmission outages) AEMO has invoked a constraint that will require 35 MW of regulation raise and lower FCAS to be procured from within South Australia on a number of days in the coming months. Thus far this constraint has imposed cost in excess of \$30 million for the South Australian market. We encourage AEMO to take proactive steps towards identifying and addressing inefficiencies in this market by reconsidering the draft decisions made in relation to these matters.

Please contact the undersigned for any queries regarding this submission.

Sincerely,



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² AEMO, *Wind Forecast Override Participant Guide*, 2009, Version 1.0