

Follow up to Comments on the Contingency Modeling Enhancements – Draft Final Proposal and Draft Final Proposal Addendum

Department of Market Monitoring September 13, 2017

In comments on the ISO's Draft Final Proposal and Addendum submitted by the Department of Market Monitoring (DMM) on August 31, 2017, DMM stated that it “is still considering whether or not it supports the ISO requesting the tariff authority to implement CME for system operating limits with greater than 30 minute corrective timeframes.”¹ At that time, DMM had not had sufficient time to thoroughly consider new information provided by the ISO in the Addendum posted on August 30. After consideration of the proposed changes, DMM does not support the ISO seeking the tariff authority to implement CME for corrective time frames greater than 30 minutes.

In mid to late August, significant changes to the policy that had been discussed throughout the multi-year stakeholder process were made in the Draft Final Proposal and the stakeholder call explaining the Draft Final Proposal. In particular, the ISO proposed to apply the CME design to CME constraints with corrective time frames greater than 30 minutes and up to 4 hours. A modeling enhancement that could optimally dispatch resources to prepare for constraints with 4 hour corrective time frames would be a valuable addition to CAISO markets. However, the current CME design does not support corrective time frames much greater than 30 minutes. Therefore, DMM does not support the ISO seeking the authority to apply the CME design to constraints with corrective time frames greater than 30 minutes. DMM recommends that the ISO work with stakeholders on developing an appropriate design for these constraints and seek Board approval of that design after the design is complete.

The CME market design does not account for changes in load. In previous ISO proposals, the ISO only proposed modeling CME constraints with 30-minute corrective time frames. Constraints with 30-minute corrective time frames are constraints on which flows must be reduced to the post-contingency limit within 30 minutes. The estimation error from not accounting for load changes is not as large a concern for 30-minute corrective time frames as it is for longer corrective time frames.² The ISO changed the policy in the Draft Final Proposal relative to prior proposals. The ISO proposed for the first time to apply the CME design to constraints with corrective time frames greater than 30 minutes and as long as 4 hours.

¹ Department of Market Monitoring *Comments on the Contingency Modeling Enhancements – Draft Final Proposal and Draft Final Proposal Addendum*, August 31, 2017:

<http://www.caiso.com/Documents/DMMComments-ContingencyModelingEnhancementsDraftFinalProposal.pdf>

² Also, the corrective capacity for 30-minute constraints has to be deliverable within 20 minutes.

CME is not designed to accurately consider 4-hour corrective time frames. Load can change significantly over 4 hours.³ Large changes in load would change flows on the corrective constraint. Not accounting for these flow changes means the incorrect amount of corrective capacity is likely to be procured. Either too much capacity will be procured and paid for, or too little capacity will be procured and the reliability needs would not be met by the CME design.

Unfortunately there does not appear to be a simple design change that would allow the ISO to account for the change in load. If the ISO alters the CME design to account for expected load changes over 4 hours it would fundamentally alter the nature of the corrective capacity product. Corrective capacity would not be the product described in the scope of the CME initiative or discussed throughout the CME stakeholder process.

The day before comments on the Draft Final Proposal were due, the ISO released an addendum to the Draft Final Proposal. In this Addendum, the ISO explained that it would initially only implement CME constraints with 30-minute corrective time frames. Before implementing CME constraints on limits with corrective times greater than 30 minutes the ISO now plans to “...provide a study and comment period through existing stakeholder forums.”⁴ The policy for modeling CME constraints with corrective time frames greater than 30 minutes is not complete. Key design elements are left to be developed after Board approval.

DMM does not support the ISO seeking Board approval for an incomplete policy in which key elements of the design will be determined after Board approval. As explained above, the potential choices for how to implement the corrective constraints with time frames greater than 30 minutes can affect the efficacy of the policy or change the product from what is presented in the Draft Final Proposal. DMM recommends that the ISO return to the Board to obtain approval for any additional proposals to apply the CME design to constraints with corrective time frames greater than 30 minutes.

DMM also questions the benefits of implementing CME relative to other initiatives and implementation needs. The ISO’s CME technical analysis does not show significant effects or benefits from implementing CME. Implementing the changes needed for corrective capacity settlements, CRR settlements, and market power mitigation procedures will require significant additional resources. The largest benefit seems to be that the ISO would fulfill its obligation to implement CME under its November 28, 2014 settlement agreement with FERC and NERC.⁵

The expected benefits from implementing CME in terms of reduced market costs are likely to be low relative to other market enhancements that will be delayed or canceled in order to complete the CME implementation. If the ISO believes implementing CME is the best way to

³ Other factors not discussed here can also change significantly over 4 hours.

⁴ *Contingency Modeling Enhancements Draft Final Proposal Addendum* August 29, 2017 pp. 36:
<http://www.aiso.com/Documents/AddendumDraftFinalProposal-ContingencyModelingEnhancements.pdf>

⁵ IN14-10: <https://www.ferc.gov/enforcement/civil-penalties/actions/2014/IN14-10-000.pdf>

fulfill its obligations under the FERC/NERC settlement, then implementing a completed CME design for the constraints with 30 minute corrective time frames listed in proposals prior to the Draft Final Proposal may be justified.