



**COMMENTS OF NV ENERGY
DAY-AHEAD MARKET ENHANCEMENTS
PHASE 2 WORKING GROUP
DATED NOVEMBER 30, 2018
CAISO STAKEHOLDER PROCESS**

December 14, 2018

NV Energy appreciates the opportunity to comment on the CAISO's Day-Ahead Market Phase 2 Working Group held on November 30, 2018. NV Energy understands that the previous proposal to combine the Integrated Forward Market (IFM) and Residual Unit Commitment (RUC) has been eliminated because the combination resulted in significant uplift costs. Therefore, CAISO has proposed two proposals for stakeholders to consider.

NV Energy is supportive of the first proposal as long as this option includes a RUC de-commitment run. At this time, NV Energy cannot provide an opinion on the second proposal to change the market sequence, because there is not enough detail to understand the potential impacts. Additionally, NV Energy is not supportive of the Day Ahead Flexible Ramping Product because this would add a new *capacity product* that has not been proven to be necessary. This new product could reduce market prices and increase uplift costs. Moreover, EIM Balancing Authority Areas would be forced to procure this capacity in the market above and beyond any state requirement.

I. Proposal 1: Keep DAM Market Run Sequence

The first proposal would retain the Day-Ahead market like it is today with the IFM market run prior to the RUC market optimization without a RUC de-commitment run. Virtual supply and demand bids would continue to converge the IFM and fifteen minute market. The flexible ramping up and down awards would be determined and awarded from the IFM market run. NV Energy requests more information about the amount of IFM Flexible Ramp that will be procured and determined in the IFM market. Furthermore, NV Energy would like to know if the demand curve would be used for clearing this capacity.

In the Day-Ahead Market Draft Technical Description, CAISO stated that "the current Day-Ahead Market structure results in a suboptimal (higher cost) unit commitment solution because it is achieved in two stages with different objectives."¹ This statement refers to the need to combine the IFM and RUC optimization runs. If CAISO is still seeking a solution for a more optimal unit commitment, then CAISO should consider a RUC de-commitment run. NV Energy would like to know why CAISO has determined that the RUC de-commitment run is not necessary. From previous stakeholder meetings, CAISO has stated that the RUC de-commitment is necessary to avoid over-generation. NV Energy is concerned that the lack of a RUC de-commitment will



result in excess procured Flexible Ramping Product capacity beyond what is necessary. This would not be the most efficient and economic method to optimize the grid.

There are still many outstanding questions about the CAISO's proposed Day-Ahead Flexible Ramping Product i.e. *capacity product*. Therefore, NV Energy requests that CAISO provide more information about this product. This stakeholder process should determine whether or not resources will be committed to meet the calculated capacity obligation. If the intention of the product is to commit resources for capacity requirement, then the solution would result in a suboptimal solution with potentially significant uplift costs. Additionally, this capacity could reduce market prices because there might be a surplus of energy available to the market. This would result in more bid cost recovery payments to generators that did not recover their costs within the market. Therefore, CAISO should perform market analysis of this product with all other day ahead market proposed changes to determine the impact to the Day-Ahead and Real-Time Markets and the Bid Cost Recovery.

Imbalances occur between the Day-Ahead and Real-Time Markets due to the timing and the very nature of these markets. The 15-minute granularity changes should reduce the magnitude of these imbalances. A Day-Ahead Flexible Ramping Product would not reduce these imbalances, but would reserve capacity to meet imbalances. NV Energy does not agree that there has been a demonstrated need to add additional capacity to handle imbalances in the market, when other solutions are moving forward to solve this same issue. CAISO is pursuing the 15-minute Day-Ahead granularity, changes to its Flexible Resource Adequacy procurement, Intertie Settlement Deviation improvements, and extending the Day-Ahead Market into the EIM footprint. CAISO has not demonstrated that there is a lack of economic bids in the Real-Time Market to handle the imbalances that occur between the Day-Ahead and Real-Time Market. Without this demonstration, NV Energy cannot support the Day-Ahead Flexible Ramping Product. Additionally, this product would be included as part of the Extended Day-Ahead Market which would procure additional capacity for Balancing Authority Areas in this new market. Therefore, it is very important to determine whether this market product is needed.

II. Proposal 2: Change DAM Market Run Sequence

CAISO proposed a second option that would change the sequence of the Day-Ahead market. The RUC market optimization run would occur before the IFM market run in this option and virtual supply and demand would converge the IFM to the RUC market. This very different from the current role virtuals have in the Day-Ahead market, because the virtual market was designed to converge the Day-Ahead to the Real-Time market. Therefore, the second option would significantly change the purpose of the virtual bids. Additionally, the Ancillary Services and Flexible Ramping product would be procured in the RUC market. This also seems troublesome, because a resource could be awarded for an Ancillary Service and Flexible Ramping capacity award before it is really awarded energy in the IFM. Additionally, this proposal would commit a resources to meet the CAISO forecast, Ancillary Services, and capacity for the Flexible Ramping Product. This may result in the same outcome as the combined RUC/IFM market option that



CAISO has eliminated due to significant uplift costs. Given the complexity of this option, additional details and examples are needed to consider the concepts and impacts to the Day-Ahead and Real Time market before NV Energy can really weigh in on this proposal.

¹Appendix C – Day Ahead Market Enhancement Draft Technical Description.
<http://www.caiso.com/Documents/RevisedAppendixC-Day-AheadMarketEnhancementsDraftTechnicalDescription.pdf>