



Stakeholder Comments Template

Day-Ahead Market Enhancements (DAME) Initiative

This template has been created for submission of stakeholder comments on the revised straw proposal that was published on June 8, 2020. Materials related to this initiative can be found on the ISO website at: <http://www.caiso.com/StakeholderProcesses/Day-ahead-market-enhancements>.

Upon completion of this template, please submit it to initiativecomments@caiso.com. Submissions are requested by close of business on July 6, 2020.

Submitted by	Organization	Date Submitted
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Please provide your organization's overall position on the DAME revised straw proposal:

Please provide written comments on each of the revised straw proposal topics listed below:

1. Updated market formulation:

SDG&E generally supports the CAISO's proposal to create four new products: imbalance reserve up/down (IRU/IRD) and reliability capacity up/down (RCU/RCD). While complex, SDG&E believes the proposed market formulation is an improvement over the existing Residual Unit Commitment (RUC) process (where the effects of the CAISO's net load forecast are completely de-coupled from the day-ahead market), adds rigor to the determination of the amount of flexible generation that will be needed to address real-time imbalances (through use of historically-based confidence intervals), improves price signals for generation that can be dispatched in real-time (by creating day-ahead clearing prices for flexible generation), and should decrease the need for out-of-market actions.

SDG&E supports the eligibility requirements for resources to be able to offer the imbalance reserve products. If resources cannot respond to 15-minute dispatch

orders (i.e., are unable to participate in the 15-minute market), then they would only be allowed to offer the reliability capacity products.

Several aspects of the CAISO's proposal are unclear or present issues that the CAISO should address.

First, the current RUC process requires Resource Adequacy (RA) resources to offer at \$0/MWh for capacity, while non-RA resources can offer at non-zero amounts. This is because RA resources are already paid by LSEs to submit offers into the CAISO's energy markets. Under the new construct, the RA must offer obligation is not changing, but it appears RA resources would be able to bid non-zero offers and receive additional compensation for providing the same product. SDG&E requests the CAISO to consider whether RA resources should be required to submit \$0/MWh capacity offers for the four new products to ensure the benefits of the existing RA construct can be maintained without increasing costs to ratepayers. SDG&E believes the CAISO could revisit this constraint when the Extended Day Ahead Market is implemented.

Second, the CAISO has proposed a real time must offer obligation for RA imports in the RA Enhancements initiative. RA import resources will be obligated to bid or self-schedule up to the RA amount shown in the monthly supply plan.¹ It would appear, under the CAISO's DAME proposal, that any RA resource that offers its capacity in the day-ahead market but is not selected would be relieved of any further obligation in real time. Is the RA import must offer obligation being revised in this initiative to limit the RT MOO to the quantity awarded in the day ahead market rather than the full RA quantity shown?

Third, if the resource's real-time RA MOO is limited to the energy + imbalance reserve award, which is different than the resource's day-ahead RA MOO quantity, how would this affect a resource's RA availability incentive mechanism ("RAAIM") calculations when DAME is implemented and RAAIM has not be deactivated as proposed in RA enhancements initiative?

Lastly, SDG&E would appreciate a description of how corrective capacity products will work in concert with imbalance reserve requirements in the day ahead market. Do these product types overlap with each other? The proposal lacks details of how the day ahead market would be impacted by these other products.

2. Accounting for energy offer cost in upward capacity procurement:

The CAISO's DAME initiative introduces a Real Time Energy Offer Cap ("RTEOC") and indicates that market participants will be able to modify their capacity offers based on the energy cap.

¹ RA Enhancements Fourth Revised Straw Proposal, p. 24

SDG&E requests that the CAISO provide additional detail as to the purpose of RTEOC, the mechanics of how it the RTEOC will be calculated each hour and when the RTEOC will be published in order for the day-ahead market offer submission to work. SDG&E understands that once the RTEOC is published, Scheduling Coordinators (SCs) would be allowed to submit day-ahead energy offers that are at or below the RTEOC and, if necessary, include energy costs that exceed the RTEOC in the SC's day-ahead capacity offer for the IRU and/or RCU products (subject to the proposed IRU and RCU cap of \$247/MWh). If the SC believes the combination of the RTEOC and the capacity offer cap is too low to cover their costs, then the SC may elect to not offer capacity products and only offer energy into the day ahead market. In this case, the \$1,000/MWh energy price cap would be applicable to such offers.

If the RTEOCs are set at levels that are below resources' variable energy costs, and some portion of variable energy costs are then included in both the IRU and RCU capacity offers, there may be price distortions in both the energy and capacity markets.

If a resource is only awarded energy with no capacity even though it offered capacity, would it then be allowed to offer above the RTEOC in real time, or would it be limited to the RTEOC in the real time?

3. Variable energy resources:

SDG&E has no comments at this time.

4. Market power mitigation for reliability capacity and imbalance reserves:

SDG&E is supportive of developing market power mitigation tools for the CAISO markets. SDG&E would like the CAISO to provide some additional discussion of how its current Local Market Power Mitigation and proposed System Market Power Mitigation would work in conjunction with the market power mitigation for the capacity products proposed here.

It is unclear to SDG&E whether historical spinning reserve prices provide an accurate measurement of a resource's real time availability cost. SDG&E believes a discussion on resource specific availability costs may be beneficial. The CAISO may wish to consider concepts raised in other initiatives such as capacity procurement mechanism and reliability must run replacement initiatives.

5. Please include additional comments including considerations for other possible solutions or concerns to any of the above topics:

SDG&E is interested in accommodating the ability of storage and hybrid resources to provide imbalance reserve and reliability capacity products in the day ahead

market. So far, the Energy Storage and Distributed Energy Resource (ESDER) Phase 4 initiative has not discussed or developed rules for storage resources to provide the new products contemplated by the DAME initiative. ESDER 4 is at the Draft Final Proposal stage and is expected to develop Tariff modifications in July without further discussion of the new products envisioned in the DAME initiative. Does the CAISO expect to extend the ESDER 4 initiative to discuss how such resources would participate in the new day-ahead market or would the CAISO include such discussions in the DAME initiative?

SDG&E would like to further explore the relationship of bid cost recovery, RTEOC and market power mitigation for reliability capacity and imbalance reserves. Because of the RTEOC, SCs may have to shift some of their energy costs into the capacity offers. For example, assume a SCs variable energy cost is \$200/MWh and availability cost is \$40/MWh. If the RTEOC is calculated to be \$150/MWh, the SC's day-ahead energy offer will be limited to \$150/MWh and the SC must adjust its capacity offer to \$90/MWh $[(200 - 150) + 40]$ to ensure all of its costs are covered.

Assuming the CAISO's default energy offer is \$200/MWh, SDG&E understands that the CAISO would not mitigate the energy offer because at the \$150/MWh RTEOC, the energy offer is already below the \$200/MWh default energy offer. However, the CAISO would mitigate the \$90/MWh capacity offer to \$80/MWh $(200 - 150 + 30)$ based on the CAISO's market power mitigation formula. SDG&E understands that the CAISO would calculate bid cost recovery payments based on the RTEOC-limited \$150/MWh energy offer, and \$80/MWh mitigated capacity offer (\$230/MWh total) even if the SC's actual costs are \$240/MWh (\$200/MWh variable energy cost + \$40/MWh availability cost). If this occurs, the resource would be operating below cost and not receive appropriate bid cost recovery.

	Resource Cost	RTEOC	Day Ahead Offer	Mitigated Bid
Energy	\$ 200	\$ 150	\$ 150	\$ 150
Capacity	\$ 40	-	\$ 90	\$ 80