

Stakeholder Comments Template

Submitted by	Company	Date Submitted
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Please use this template to provide your written comments on the ESDER Phase 3 stakeholder initiative workshop, held on November 6, 2017.

Submit comments to initiativecomments@CAISO.com

Comments are due November 20, 2017 by 5:00pm Pacific

The CAISO held a stakeholder workshop to find consensus on the issues and identify additional topics for ESDER 3. The presentation and all supporting documents can be found on the [ESDER3](#) webpage. **Additionally, the CAISO is considering a December 7, 2017 workshop, if needed.** Please save the date and look out for all relevant market notices.

Important: As mentioned at the November 6, 2017 workshop, the CAISO requests that stakeholders take into consideration their top priority for ESDER 3 when writing in support for a topic.

Olivine is pleased to provide further comments on ESDER phase 3. Comments on the “top priority” request are at the bottom of this document. Olivine has labeled these items “High/Medium/Low” along with a priority number.

1. Demand Response

The CAISO requests stakeholders’ rank and provide their justification for the following topics:

- **Demand response modeling limitations** - Establish a methodology that could be used to develop acceptable commitment costs.

- **Demand response modeling limitations** - Evaluate current resource constraint options and propose solutions utilizing current or establishing new model options (including min/max run time) to appropriately represent resource capabilities and resolve issue leading to infeasible 5-minute dispatches when committed in RUC.
- **Demand response modeling limitations** - Explore development of an option similar to Intertie bidding, introduced at the October 4 Joint ISO and CPUC workshop

Addressing DR modeling limitations: High. Priority: 1.

These three items are somewhat interrelated, particularly because the “Intertie bidding” concept could resolve many issues around RA-related issues for DA-bidding modelling limitations.

Modelling improvements should be at the front of the list as they are informed by current DR participation in the CAISO markets and may dovetail (and provide solutions) with RA issues being discussed in the transmission planning “slow response.”

- **Weather sensitive demand response** - Explore bidding/model options (similar to VERS) that could be utilized to reflect weather sensitive DR. Include changes needed in NQC valuation, MOO and RAAIM.

Weather sensitive demand response: Medium. Priority: 7.

- **Removing the single LSE requirement/ DLA discussion** - Remove the requirement of a single LSE for DR and modify use of default load adjustment (DLA)

Single LSE requirement: High. Priority: 2.

Olivine agrees that the requirement that LSEs cannot be commingled within a PDR or RDRR resource is an unnecessary barrier and we support the removal of this limitation, noting that LSE validation as a part of the customer registration is a critical oversight right of the LSE and is a fully independent matter.

DLA requirement:

Olivine is indifferent to the elimination of the DLA in its own right; however, Olivine supports elimination of the DLA if that is necessary to eliminate the single LSE requirement. Note the Single LSE requirement is a result of information technology driving policy, not a necessary result of the existence of the DLA.

- **RDRR economic buy-back of day-ahead awards for Hybrid RDRRs** - ISO prefers to pursue capabilities available with PDR outside of ESDER3.

RDRR buy-back: Low. Priority: 9.

Considering that RDRRs providing RA today cannot participate in DA bidding due to RUC implications, it is not clear what impact such changes would have on actual RDRRs in the market. As such, Olivine puts this at a low priority for resolution.

- **Recognition of a behind the meter resource in load curtailment** - Extend the meter generator output (MGO) model to EVSEs and evaluate its applicability to other devices.

Sub-metering: Medium, Priority 6

Olivine has been a proponent of sub-metering since inception with the earliest CAISO DR pilots indicating its value in the commercial and industrial space.

Olivine continues to be puzzled that the proposal on the table is for EVSEs only, noting that the EVSE providers do not appear to support the limitation. Olivine requests that the CAISO does not artificially limit this scope and to apply this to general sub-metering, or provide analysis to defend a position that relegates this to EVSEs.

- **Load shift product** - Develop a load shift capability for behind the meter storage. (Currently an ESDER3 priority)
- **Load shift product** - Evaluate all applicable load for extension of the use of a load shift product.

Shifting: Medium, Priority 5

Olivine strongly supports that bi-directional PDR be included in ESDER 3, as this topic has been in the CAISO Stakeholder Catalog since at least 2014 (i.e., as the Combined Demand Response Product) and was also included in ESDER 2.

As stated in the November 6 workshop, Olivine is supportive of solutions that will motivate providers to shift behavior to take up excess renewables. The ideas presented at the workshop are worth further discussion, while acknowledging that there are many details to be resolved. For example:

- What technologies are suitable? Presumably this would go beyond battery storage to any type of shift-able process.

- Can MGO be applied to load? Or would this actually just rely on sub-metering as for the other related item?
- Must the technology imply shifting must occur or does the shift itself need to be measured with the latter appearing to be a requirement for EVSE?

It is also worth noting – based on the comments of the IOUs – that even a “simple” CAISO-driven shifting solution may be challenging to resolve without CPUC resolution. Considering that and the coming Load Shift Working Group ordered in D.17-10-017, it is Olivine’s view that this ESDER 3 item will need to be evaluated within that greater process.

- **Additional topics** - Outside of the topics listed above, please include additional topics for consideration.

Comments:

[Insert comments here]

2. Multiple-Use Applications

- **Relaxation of the 24x7 settlement requirement of DERs** - Create option for NGRs to opt out of ISO market participation and settlement in some intervals in order to provide services to other entities.

Relaxation of 24x7 settlement: High, Priority 3

This would resolve one of the major issues that effectively blocks NGRs from being feasible in the behind-the-meter applications. In addition, it makes it challenging for a resource to provide distribution value and wholesale market participation.

- **Continued discussion on use-cases for MUA** - Determining participation models for new technologies such as micro-grids through use-case scenarios.

Support for MUA: High, Priority 4

Whereas 24 x 7 confronts the time dimension, MUA solutions could resolve the “stacking” problem at an instance in time. This is an important issue that needs to be worked on at the CAISO.

- **Additional topics** - Outside of the topics listed above, please include additional topics for consideration.

Comments:

[Insert comments here]

3. Non-Generator Resource

- **Use-limitation status for NGRs** Explore option to allow NGRs to qualify as a use-limited resource.
- **Establishing throughput limitations** - Create bidding options to manage excessive cycling of NGRs.
- **Management of State of Charge (SOC)** - Considering options for the management of SOC such as a multi-stacked ancillary service bid.
- **Additional topics** - *Outside of the topics listed above, please include additional topics for consideration.*

Comments:

From the conversation at the November 6 workshop, it appears that the highest priority issue is managing non-REM NGRs delivering RT energy while also being AGC. Specifically, that the market deadline for bidding RT energy are too early to ensure a resource can meet its dispatches and be responsive to AGC. Olivine supports that being included in ESDER 3 as Medium, Priority 8.

4. Other comments

Please provide any additional comments not associated with the topics above.

Comments:

As noted in the November 6 workshop, Olivine believes that the CAISO can tackle more items in ESDER 3 than it might be otherwise inclined. In addition, because stakeholders have little insight into CAISO effort to evaluate and resolve items, it is difficult to identify an appropriate quantity of “top priority” items.

In addition, some items have been covered deeply in other stakeholder groups and therefore should require very little further policy development by the CAISO and the IT impacts should already be known. For example, the “single LSE issue” has been covered extensively in other reports and stakeholder processes. For example, the Olivine / CAISO DER Integration Challenges and Barriers Report of 2014 and the Supply DR CAISO Integration Working Groups of 2014. It is our opinion that this issue should be resolved, and also should not require further discussion in the stakeholder group, noting of course that if the DLA is removed that that is a separate issue to be resolved with the CPUC, IOUs, LSEs, and potentially DRPs. Arguably that discussion does not belong in ESDER as the ESPs are not broadly represented there.