

Stakeholder Comments  
Commitment Cost Enhancements  
Phase3 (CCE3)  
Comments on PDR NGR Issues Matrix  
August 11, 2016

Submitted by	Company	Date Submitted
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The California Large Energy Consumers Association (CLECA) attended the August 27, 2016 stakeholder meeting that addressed several issues related to use-limited status for PDR, RDRR, and NGR. These included:

1. Registration of PDR, RDRR, and NGR as use-limited resources.
2. The proxy cost methodology for commitment costs
3. The Commitment Cost enhancement 3 (CCE 3) methodology for opportunity costs as might be applied to PDR, RDRR, and NGR.
4. Use-limited reached outage cards.

CLECA understands that registration of NGR for use-limited status will be addressed in the Energy Storage and Distributed Energy Resources 2 (ESDER 2) stakeholder process. However, issues related to NGR did come up at the meeting, so we have included references to NGR where appropriate.

**Issues matrix – in progress**

#	Source Issue statement	CAISO clarification	CLECA recommendation
1	<p>CLECA</p> <p>If the RAAIM and obligation for replacement is in the tariff, the current exemption should be in the tariff as well.</p>	<p>The Board approved motion provides for an interim period, during which the RAAIM treatment as provided under RSI 1 will be extended until a predetermined date in 2018. CAISO clarifies that with RAAIM exemption during the interim period, there is no obligation to provide additional RA capacity once the resource has been exhausted.</p> <p>Need specific date (based on full bifurcation). Stakeholders to comment on this date, including deadlines to provide information to CPUC.</p>	<p>RAAIM exemption for PDR and RDRR should be put into the CAISO tariff. Any date for eliminating the exemption should fall after the CPUC has been able to address the implications of loss of use-limited status for PDR and RDRR in policy, tariffs, and contracts so that appropriate treatment of new risks can be addressed. This would most likely occur when the Commission approves a new set of DR programs after the current years of bridge funding. While the Commission had set a target date of early 2018, this is likely to slip due to delays in the completion of the DR Potential Study, leading to delays in CPUC provision of guidance to utilities for future DR programs. Once guidance is provided, the utilities generally have 6 months to file applications, which are followed by party testimony, hearings, and a CPUC decision. Additionally, CAISO implementation of the new DRRS, initially planned for 2015, has been delayed. Based on a CAISO staff statement at the August 9, 2016 Demand Response Auction Mechanism Working Group meeting at the CPUC, CLECA understands that the DRRS may not be implemented until the end of 2016 or early 2017. This is one of several integration pre-requisites that must be met by CAISO prior to bifurcation. Given these delays, at this time, we would not expect a final decision on new utility programs to occur until sometime between mid-2018 and mid- 2019.</p> <p>Removal of any RAAIM exemption by tariff amendment should only apply to annual use limitations, not fatigue breaks or monthly limitations associated with MOO.</p> <p>Thus, this exemption should also not be removed by a tariff amendment until provisions are made in the CAISO tariff for outage cards to be used for both registered use-limited PDR and non-registered use-limited PDR for fatigue breaks and once monthly use limitations are reached.</p>

#	Source Issue statement	CAISO clarification	CLECA recommendation:
2	<p>CLECA, CPUC Program/Tariff/Contract which defines the “resource” could limit it to one event per day. How does this align with CCE3 policy which provides an exception to the minimum of two starts per day if the design capability value is one per day?</p>	<p>CAISO agrees that reflecting one start because that is the program limitation is aligned with CCE3 policy.</p> <p>Stakeholders to provide comments on the documentation that can be provided to the ISO showing the program limitation(s).</p>	<p>CLECA supports allowing one start per day for PDR and RDRR supported by CPUC-approved policy, tariffs, and contracts. Documentation of CPUC policy, tariffs, and contracts should be straightforward. However, to the extent that the PDR or RDRR start limitation is contained in a non-public document like a contract between a DRP or LSE and an end-use customer, DRPs or LSEs should suggest what type of documentation they can provide that would not violate customer privacy concerns. For DRAM contracts, a one start per day limitation can be included in DRAM contracts for 2018 and beyond.</p>
3	<p>CLECA PDR and RDRR should continue to be exempt from bid insertion and bid mitigation.</p>	<p>This is existing policy and continues under CCE3.</p>	<p>CLECA supports continuation of this exemption.</p>

5	<p>SCE</p> <p>Can DR Resources apply for, and receive ULR status? What criteria would CAISO use?</p>	<p>Yes, can apply for use-limited status per CCE3 policy. See Agenda item #1</p>	<p>CLECA supports the ability of PDR and RDRR to apply for and receive ULR status. However, CLECA thinks that there are major challenges in applying the opportunity cost methodology from CCE 3 to PDR and RDRR. CLECA's concerns are related to quantifying start-up and minimum load costs for PDR. Start-up and minimum load costs for individual customers participating within a PDR can vary. A DRP would have to develop a methodology to summarize these into start-up and minimum load costs for the PDR into which they may be aggregated.</p> <p>We are also unsure how to reflect what are essentially customer opportunity costs from disrupted operations as well as the cost of wasted product (for manufacturers) and time to restart operations after a load shed into start-up and minimum load costs for the DRP. It is not at all clear what type of documentation the CAISO would require from customers in a PDR (or more likely from the DRP based on customer input) to justify the PDR's start-up and minimum load costs, nor is it clear that end-use customers would choose to share that information, which is probably considered proprietary.</p> <p>CLECA also points out that while RDRR cannot have commitment costs, RDRR resources can participate in the DAM as PDR and, for this purpose, should be allowed to have commitment costs.</p>
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#	Source Issue statement	CAISO clarification	CLECA recommendation:
6	<p>SCE</p> <p>DR resources generally have limited number of calls (not MWh), hence the opportunity cost is a per call/hour (not per MWh) cost.</p> <p>How would the CAISO calculate the opportunity costs for DR ULRs? What is the methodology the CAISO would use? (Or would it defer to the SC?)</p> <p>How would the CAISO track the resource use?</p>	<p>The PDR model currently allows for a 3 part bid: energy (\$/MWh), start (\$/start), and minimum load (\$/MWh). For DR, a “call” may be the same as a start.</p> <p>Determining the methodology to be used, or deferring to the SC, is open Agenda item #3.</p> <p>Resource usage (availability, must offer obligations) are tracked via use plans per RSI policy. See #5</p>	See response to issue 5.

#	Source Issue statement	CAISO clarification	CLECA recommendation:
7	<p>SCE and CPUC</p> <p>How will the ISO optimize or allocate the use of these resources with limitations through new market design?</p> <p>How will the CAISO market optimize the use of storage resources?</p>	<p>Reflecting opportunity costs in commitment cost bids for PDR resources, including storage participating as PDR, will enable the market to optimally allocate the limitations over the limitations horizon (e.g, year). See Agenda item #3</p> <p>Optimizing storage resources that participate as NGR is a continued effort under ESDER initiatives.</p>	<p>See CLECA answer to issue 5. Also, since PDR and RDRR bids are not mitigated, DRPs should be able to submit bids that allow them to best offer these resources into the market and the CAISO to optimize their use subject to the offer prices received.</p>

#	Source Issue statement	CAISO clarification	CLECA recommendation:
9	<p>CPUC</p> <p>If RRAIM penalties are stayed for the interim period, are there other problems that could arise with bidding in storage resources under PDR between now and 2018?</p>	<p>Stakeholders to specifically identify any issues for bidding in storage during the interim period due to CCE3.</p>	<p>The CPUC has identified existing utility multi-year utility contracts with storage providers that were not entered into assuming the applicability of RRAIM or replacement RA. No solution has yet been proposed. Could such contracts be grandfathered? CLECA recommends this as a potential solution.</p>
10	<p>CPUC</p> <p>What would the contractual remedy be if a resource is dispatched more hours or started more times than what is provided for in the contract between the IOU and generator?</p>	<p>Contractual remedies are outside the business functions of the ISO.</p> <p>When a resource reaches the limitation, a use-limited reached outage card can be submitted and not be dispatched beyond the start and/or run hour limitation(s). Note that CCE3 will provide DR resources access to similar outage cards if no longer use-limited.</p>	<p>CLECA submits that there must be the ability to limit PDR and RDRR dispatches consistent with fatigue and monthly MOO limitations. It is our understanding that once the definition of use-limited resources changes, short term use-limited reached and monthly use-limited reach outage cards would continue to be available to resources that are not registered as use-limited but which have use limits under their MOO obligations (e.g. 24 hours of dispatch per month for PDR) per RSI 1. We believe that this interpretation is consistent with slide 39 in the July 27 presentation. However, the availability of these outage cards for such use-limited resources that are not registered as ULR must be clearly spelled out in any tariff language. We recognize that after the transition period, once an annual limitation is reached, the following month there would be a RRAIM or replacement obligation.</p>

#	Source Issue statement	CAISO clarification	CLECA recommendation:
11	<p>CPUC How will storage resources with existing PDR contracts (that go beyond 2018) ensure that they will not face significant RAAIM penalties after 2018 from the expectation that they are always available (inconsistent with their contracts)?</p> <p>Can ISO estimate how many hours of availability per month are generally expected?</p>	<p>To avoid RAAIM penalties after 2018, substitute capacity should be provided when the storage resource is no longer available, and the storage resource should no longer be shown on subsequent monthly RA showings.</p> <p>Stakeholders to elaborate on the analysis request.</p>	<p>Replacement appears to be a better option than incurring RAAIM penalties. Clarification is required as to who is responsible for replacement of storage resources under existing PDR contracts that extend beyond 2018 and who would be faced with the RAAIM penalties, i.e. the utility or the storage resource. This appears to be a CPUC issue, rather than a CAISO issue, unless the limited number of existing contracts may be grandfathered.</p>



#	Source Issue statement	CAISO clarification	CLECA recommendation:
14	CPUC and CESA How to address RA replacement risk under CCE3	<p>Post interim period, reflecting an opportunity cost in commitment cost bids will enable optimal use of the resource. See agenda item #3.</p> <p>If the resource has been exhausted, it submits a use- limited reached outage card. At that point, additional RA capacity must be provided before the first day of the following month, or be assessed under RAAIM.</p>	Replacement risk can be addressed for future utility DR tariffs and future DRAM and storage contracts, but may not be possible for development of the 2018 DRAM contract, which is to be submitted to the CPUC by September 1, 2016, and not for existing multi-year storage contracts.
17	CESA Should resources have the ability to represent cycling limitations if they so choose?	ISO seeks clarification if this issue is specific to NGR or both NGR and PDR.	If ULS for storage participation in CAISO markets as PDR is to be addressed in CCE 3, this stakeholder process should address how cycling limitations should be factored into the development of commitment and opportunity costs.

#	Source Issue statement	CAISO clarification	CLECA recommendation:
18	<p>CESA Do Path A (opp cost) and Path B (outage cards) yield same ability for a resource to manage over-cycling and other use-limits.</p>	<p>Path A is the optimal solution to managing limitations of a resource. Path B would be a sub-optimal use of the resource as the SC would determine the most valued time for the resource to participate as opposed to the market determining optimal use.</p> <p>See Agenda items #3 and #4.</p>	<p>It is still an open question as to whether commitment and opportunity costs can work for PDR for DR or for storage. While the CAISO might prefer to use its opportunity cost methodology, once developed, to determine when resources should be used, any final decision must await demonstration that the final methodology can be used successfully for such resources. While we understand that CAISO would prefer for the market to determine optimal use, rather than SCs, unless commitment costs can be properly defined for PDR, the end-use load underlying DR may not respond well to the market's solution. This may or may not be an issue for storage.</p>
20	<p>CESA If LSE is Scheduling Coordinator for PDR/NGR, is RAAIM penalty exposure to the resource avoided?</p>	<p>No. RAAIM is assessed on a resource level. The SC of the resource is then responsible for the penalty to the CAISO.</p>	
21	<p>CESA Can NGRs and PDRs manage commitment and opportunity costs?</p>	<p>Discussions for NGR are taking place under ESDER initiatives.</p> <p>See agenda item #3 for PDRs.</p>	

#	Source Issue statement	CAISO clarification	CLECA recommendation:
22	SDGE Consideration of modeling PDR resources as VERs.	The ISO appreciates the continued discussion of how to appropriate model PDR resources. The ISO would need to better understand how the VER model would work for PDR. However, at this point, this topic is not directly related to issues due to CCE3.	CLECA finds this proposal intriguing, especially for temperature-sensitive PDR. While understanding that this is not a CCE 3 issue, it should be addressed in ESDER during a future phase.
23	SDGE Reactivation of maximum run hour resource characteristic.	The ISO will continue to evaluate the need to reactivate the maximum run hour resource characteristic field as we continue discussions on opportunity cost methodologies.	

#	Source Issue statement	CAISO clarification	CLECA recommendation:
24	Several stakeholders requested clarification on the use-limitation registration process for PDR resources.	<p>The use-limited registration process was evaluated, and most recently enhanced, under RSI1. The ISO has posted draft BPM language providing clarification on the registration process.</p> <p>See PR 887 for the most recent information on the registration process.</p>	Since PRR 887 has been suspended, CLECA is not sure that the registration process has been finalized and requests additional information about this process.
25	Several stakeholders requested clarification on how PDR resources use the Use-limited reached nature of work attributes.	<p>The use-limited reached nature of work attributes for generation outages were developed under RSI1.</p> <p>CCE3 is modifying the RAAIM treatment associated with the outages, not the outages themselves.</p>	CLECA found the discussion of outage cards at the July 27 workshop to be informative and strongly urges BPM language that clarifies the ability to use such outage cards to address fatigue and monthly limit issues, particularly for PDR that does not have ULS.

