

# **Stakeholder Comments Template**

# **Subject: Regional Resource Adequacy Initiative**

Submitted by	Company	Date Submitted
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This template has been created for submission of stakeholder comments on the Third Revised Straw Proposal for the Regional Resource Adequacy ("RA") initiative that was posted on September 29, 2016. Upon completion of this template, please submit it to initiativecomments@caiso.com. Submissions are requested by close of business on October 27, 2016.

Please provide feedback on the Regional RA Third Revised Straw Proposal below.

The California Independent System Operator ("ISO") is especially interested in receiving feedback that indicates if your organization supports particular aspects of the proposal. Alternatively, if your organization does not support particular aspects of the proposal, please indicate why your organization does not support those aspects.

San Diego Gas & Electric ("SDG&E") appreciates the opportunity to comment on the latest straw proposal. The third revised straw proposal provided much of the necessary details to move the needle. Overall, SDG&E is supportive of the current ISO proposal. SDG&E recommends the following additions and clarifications for the next revision of the ISO proposal.

### Load Forecasting

SDG&E supports the ISO's proposal to aggregate all of the individual load forecasts. This allows individual Load Serving Entities ("LSEs") to use a forecasting methodology that is unique to the LSE's respective load profiles. However, SDG&E wishes the ISO to clarify the following issues.

*Timeline* – SDG&E requests that the ISO include a timeline for the RA process as to when the LSEs or agencies must submit the necessary documentation and data. As an example, the ISO



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starts its Local Capacity Technical Study process in October/November of 2016 in order to calculate the Local Capacity Area requirements for 2018. In this process, the ISO uses the latest California Energy Commission ("CEC") load forecast for 2018; this forecast may have been established in early 2016. The ISO also will develop a minute by minute load forecast on its own at the beginning of 2017 to calculate the Flexibility requirement for 2018. Given the existing load forecasting timelines, where does the ISO envision the individual load forecasts submittals fit?

Currently, SDG&E will submit its forecast to the CEC in March 2017 for the 2018 compliance year. If there are no revisions from SDG&E, the CEC will send the coincident peak forecast to the CPUC which will then issue final year-ahead RA requirements to SDG&E by mid-September 2017. Included in the RA requirements are also the ISO calculated Local and Flexible RA requirements that were submitted to the CPUC for adoption in late April 2017. SDG&E wants the ISO to clarify how the proposed process will work with the well-established schedule to ensure minimal disruption.

*Correlation to Local and Flexible forecasts* – As noted above, the ISO uses other data or develops its own forecast to establish RA requirements. Generally, the requirements are based on the Integrated Energy Policy Report ("IEPR") forecast developed by the CEC. After regionalization, how will the ISO ensure that the same load growth, weather and economic forecasts will be used across all requirements? For instance, it would not be consistent to have Local requirements be based on a forecast of 3% economic growth while the System requirements are based on a forecast of 2% economic growth.

*ISO Forecasting Methodology* – In addition to the ISO white paper on recommended methodologies, SDG&E requests the ISO publish the specific forecast methodology that would be used if a LSE elects to have the ISO forecast its load. This would ensure a transparent process.

*System Load Benchmark Check* – The ISO states that while the aggregation approach provides flexibility to all LSEs, the ISO proposes to perform its own region wide system load forecast to facilitate a benchmark check. ISO states that "if there is a big discrepancy, the ISO would like to make further investigation to find out the [reasons] and make the corresponding recommendations to the LSEs." SDG&E requests the ISO to clarify the following

- 1. When will the ISO calculate the coincident system peak forecast? Before or after the LSE submissions?
- 2. What magnitude of discrepancy would trigger an investigation?
- 3. What recommendations or outcomes might result from the investigation?
- 4. How will the ISO identify which LSE provided the incorrect forecast?

*Load Forecast Updates for Load Migration* – SDG&E supports the ability to update load forecasts intra-year due to load migration. SDG&E recommends that the ISO include additional details as to how it will monitor or ensure that all migrations will result in no overall changes to the original system forecast. Is the ISO proposing to allow load migration forecast updates only for System RA requirements or will it also be applicable for Local and Flexible requirements?



## **Reliability Assessment**

*Probabilistic Loss of Load study approach* – SDG&E supports the ISO's proposal to conduct a probabilistic study to determine a default system-wide planning reserve margin ("PRM"). SDG&E generally supports a minimum time for which the PRM would be set in stone. However, given the changes to the resource mix in the future, the ISO may consider studying the PRM when a significant change to the resource mix occurs within the ISO balancing authority area ("BAA") as well. Finally, if several Participating Transmission Owners ("PTOs") join the ISO consecutively year after year, the ISO should consider studying but not adopting the new PRM value if it's within a threshold in order to give market participants the predictability the ISO intends.

*Local Reliability Area ("LRA") specific PRM* – SDG&E believes the ISO should acknowledge LRA specific PRMs and that those LRAs have authority to set minimum PRMs for their respective LSEs. A LSE's RA requirements should be the same for compliance at both the LRA as well as the ISO. If there is a deficiency, the ISO has Capacity Procurement Mechanism ("CPM") authority to procure backstop capacity and allocate costs based on the ISO's PRM values. Mismatched requirements will create confusion and complexity in the RA process.

*Role of Western States Committee* ("WSC") – Setting the PRM level ultimately affects reliable operations of the grid. SDG&E does not believe the WSC should have authority over setting the PRM level. SDG&E believes it would preferable that the WSC be an advisory committee with regards to the resource adequacy program.

*Uniform Counting Rules* – SDG&E understands that much of the stated counting rules reflect current methodology. However, SDG&E would like the ISO to clarify the following comments for uniform counting rules:

- 1. The existing process for any thermal generator, particularly new ones, is to have a Pmax value established in order to advance with other processes such as Masterfile and NQC. This Pmax test is a 15 minute self-guided test performed at any time of the day.
  - a. Is the ISO proposing to change the 15 minute self-guided test to a 60 minute self-guided test?
  - b. The ISO stated that the purpose of RA is to ensure sufficient capacity is available to meet peak load. The ISO has suggested that the peak load times are during the availability assessment hours published within the BPM. For purposes of establishing capacity values for the RA program, is the ISO proposing to limit Pmax test hours to those that align with the BPM? The ISO assesses availability due to ambient temperatures as well as allow scheduling coordinators to reduce the NQC value for the resource to account for this. Therefore, SDG&E does not believe the ISO should limit the Pmax test hours to the availability assessment hours.
  - c. If the ISO does intend to limit the testing hours, would there be additional exceptional dispatches in order for the ISO to access capacity above the NQC for the non-peak hours because the Pmax is not affected by ambient temperatures in those hours?



- 2. SDG&E supports the idea of the ISO to conducting an Effective Load-Carrying Capability ("ELCC") methodology for variable energy resources. SDG&E requests the ISO to provide a date certain as to when the ELCC initiative will start. SDG&E requests the ISO to include the following principles into the next proposal regarding ELCC:
  - a. ELCC methodology shall be calculated on a TAC area specific basis
  - b. ELCC methodology shall be calculated for a monthly granularity
  - c. ELCC methodology shall be calculated on a technology specific basis (i.e., solar thermal, solar PV)
  - d. ELCC methodology shall not be calculated based on the vintage of the resource
- 3. SDG&E does not agree that the ISO should default to the exceedance methodology if there is insufficient time to calculate new ELCC values for new participants. Given the timeline in which a new participant must announce joining the ISO, SDG&E calculates there is at a minimum 12 months lead time due to the load forecasting process. The ISO should ensure that any current LSEs are not impacted if the decision is made after such a deadline. SDG&E believes the 12 months lead time provides the ISO with sufficient time to calculate new ELCC values for all renewables resources.
- 4. The ISO proposes two testing methods for the capacity values of proxy demand response ("PDRs") and reliability demand response resources ("RDRRs"). SDG&E notes that in the first method, the ISO has the ability to partially dispatch a resource below the committed RA value for the month. Therefore, it is highly possible that the bid in capacity may not equal to the actual dispatch.
- 5. The second method allows the ISO to actually test the resource by initiating a test. SDG&E recommends the ISO create two seasons rather than three for testing a resource's registered capacity value. The two seasons is more consistent with the seasons established for the availability assessment hours.
- 6. Since registered capacity values for resources may vary monthly, SDG&E does not believe the ISO should permit the failure of a test in a given month to impact the RA availability for the remainder of a season. Rather, SDG&E would recommend that the unavailability of the resource should only be applied for the trade month.
- 7. Certainly, this questions whether the ISO is applying RAAIM based on the founding principles. The Resource Adequacy Availability Incentive Mechanism ("RAAIM") was created, as a replacement for a standard capacity product ("SCP"), to monitor bidding behavior or capacity availability, not actual output. There already exists an uninstructed energy deviation charge for energy which "penalizes" resources for not meeting a particular energy award. If the ISO's goal is to establish a more structured methodology for PDR and RDRR without inappropriately applying RAAIM to such resources, SDG&E would support this effort. Given the ISO's own system limitations towards PDRs and RDRRs, such as the inability to enter partial derates or bid in partial availability based on time of day, having this additional testing measure seems overtly punitive.
- 8. While the ISO provided a deadline for posting uniform capacity values, SDG&E notes that the Effective Flexible Capacity values list was not included in the timeline. SDG&E understands that while the Flexible RA framework is being reevaluated at the ISO; completely ignoring Flexible RA from the regional RA initiative presents an incomplete picture to all stakeholders.



# **Backstop Procurement Decision and Cost Allocation Process**

SDG&E supports the ISO's proposal to issue CPM backstop based on the ISO established system-wide PRM value when there is a system deficiency. SDG&E also supports the cost allocation proposal which allocates costs to LSEs which did not provide sufficient capacity to meet the LSE's forecast plus the ISO's system-wide PRM. SDG&E reiterates that the ISO should acknowledge the LRA established PRM first prior to calculating a deficiency for an individual LSE before using the ISO system-wide PRM for total system capacity deficiency.

# Maximum Import Capability ("MIC")

*Non-simultaneous MIC calculation* – SDG&E understands that different regions of the expanded ISO may peak at different times and may therefore result in different constraints as compared to when the areas simultaneously peak. SDG&E supports the proposed change to conduct a separate study to review whether the MIC is lower during non-simultaneous peaks for the affected branch groups. SDG&E requests the ISO provide the peak load data that will be used for the MIC calculation prior to the start of the MIC process to inform all market participants of any unexpected changes. It would be especially useful to market participants to have transparency of the data that the ISO utilizes to establish the MIC annually. This is currently not shared with market participants.

*Historic and forecast MIC calculation methodology* – SDG&E recommends that the ISO consider changing the historic MIC calculation methodology to a forward-looking study-based methodology. The ISO proposes to use a forecast based methodology for future shared transmission projects. SDG&E believes this would create a highly complex system of tracking and validating the incremental benefits of the branch groups. The ISO proposes to switch from a forecast methodology to a historic methodology after a certain time passes. Again, SDG&E believes this does not offer market participants with any market certainty for future contracting. A study based method could resolve these concerns.

*MIC Allocation* – SDG&E disagrees with the ISO's proposed allocation mechanism. SDG&E believes LSEs should be allowed to nominate at all intertie points. The existing and future transmission network benefits all LSEs and not only those that has load within the area. As the network is upgraded to allow additional transfers between regions, two areas receive benefits which cannot be captured in the MIC. SDG&E recommends that the ISO revisit the nomination and allocation methodology.

### **RA Import Requirements**

SDG&E does not support the ISO's proposal to require physical energy contracts to be secured prior to the T-45 showing for non-resource specific resources.

*DMM's concerns* – The ISO states that the Department of Market Monitoring ("DMM") indicated that current ISO Tariff provisions should be clarified to be more enforceable and provide proper guidance to market participants on the RA import requirements. Specifically, SDG&E does not believe the ISO's proposal resolves DMM's concerns. DMM notes that

Non-dynamic non-resource specific imports do not have the same must offer obligation as internal resources, under current RA regulations. Non-



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dynamic non-resource specific resource adequacy resources are not required to bid in all hours of the day-ahead IFM....Non-resource specific resource adequacy imports used to meet resource adequacy obligations are required to bid in the day-ahead market, but are not subject to any limits on bid price and do not have any must-offer obligation in real-time if not accepted in the day-ahead market.

Although, this is true, procuring the physical energy contracts at T-45 still would not require the physical energy to be bid in all hours of the day-ahead integrated forward market ("IFM") or real-time market ("RTM") or place any limits on the bid price. DMM also notes

RAAIM penalties are based on bidding behavior alone; these penalties do not take tagging into account. An import RA resource with a cleared bid may choose to tag a portion of a cleared bid, or none at all. The scheduling coordinator of an import that fails to tag can be subject to the intertie schedules decline charge (charge code 6645), a monthly penalty, but will not be subject to RAAIM

The ISO is not proposing to change RAAIM to resolve DMM's concern. It seems that the only method to resolve DMM's concerns would be to require only self-scheduling of non-dynamic non-resource specific RA resources into both the DAM and IFM. SDG&E would not support such a solution.

Finally, DMM noted that internal resources can be exceptional dispatched but non-resource specific resources cannot. This is based on the fact that ISO has no control over external resources. SDG&E notes that DMM does not offer any proposed solutions on how the ISO may address these concerns and that the ISO's proposal still does not resolve any of DMM's concerns. The ISO's proposal to require contract identifiers in the showings only validates the RA and supply plans. It does not validate the physical energy contract.

SDG&E recommends that the ISO or DMM provide the historic data on how many MWs of nondynamic non-resource specific resource adequacy resources fall under the concerns that were raised by DMM to identify the magnitude of the problem. This would help stakeholders understand whether this is a true risk for reliability. The potential for capacity to become unavailable to the DAM and RTMs always exists, but it does not mean the energy will definitely not be available.

SDG&E is concerned that the ISO's proposal is overly prescriptive and creates a situation that does not allow suppliers to provide subset-of-hours contracts as allowed by the Tariff. Specifically, subset-of-hours contracts allow non-resource specific resource adequacy resources to provide RA capacity on certain days of the month and not the entire month. When this happens, the supplier has a must offer obligation to bid into the DAM. SDG&E believes the intent by the supplier is to supply the energy when awarded. However the physical energy market may not have the product until closer to the delivery day or week. SDG&E does not believe the ISO should create a situation where one section of the Tariff allows the usage of subset-of-hours contracts and another section of the Tariff requiring energy contracting when the energy market is unable to comply at T-45. This would potentially cause suppliers that offer subset-of-hours contracts to automatically violate the ISO Tariff when the intention is to provide the ISO market with capacity and energy.



SDG&E believes the ISO should consider other solutions to resolve DMM's concerns. Would creating a real-time market must offer obligation, price limits, and adjusting RAAIM calculation methodology for interties ease such concerns?

#### **External Resource Substitution for Internal Resources**

SDG&E believes the ISO should consider allowing external resource substitution for internal resources for planned outages to simplify the scope of the process. The ISO already has a system to transfer and track MIC allocations as part of the 13-steps.

#### Allocating RA Requirements to LRAs and LSEs

SDG&E believes the ISO should respect the requirements and allocation methodologies of LRAs. The ISO should have authority to ensure all LSEs meet the total Local, System and Flexible requirements. If a LRA wishes for the ISO to allocate requirements to the LRA's LSEs, the ISO should respect the LRA's allocation methodology and not the ISO's default allocation methodology. If a cumulative deficiency occurs, the ISO has the authority to procure backstop capacity to meet the system-wide PRM.

#### **Monitoring Locational RA Needs and Procurement**

SDG&E proposes that the ISO should make the zonal procurement data publically available for all market participants to review. The Market Performance and Planning forum may be a good venue for discussing such data.

#### **Updating ISO Tariff Language to be More Generic**

SDG&E supports updating language to reference LRA jurisdiction more generically.