Instructions

Please use this template to rank your top five discretionary market design initiatives.

- 1. Select five market design initiatives¹ from the November 5, 2013 version of the Stakeholder Initiatives Catalog.
- 2. Provide the name of the initiative.
- 3. In the "High Level Prioritization Criteria Matrix" provide a score of 0, 3, 7, or 10 for each of the four criteria in green boxes.
- 4. Provide a total tally of your score for each initiative.
- 5. Below the matrix, provide detailed explanations for each criterion using as much space as you need. Providing a rationale for the ranking and considering these initiatives over others is critical to this ranking process. Since dollar and resource estimates are understandably approximate at this level, the qualitative discussion will be given more emphasis. Similarly, the numerical rankings are informative and may help to organize discussion but the qualitative information will be critical for the ISO as we compare initiatives.

¹ Infrastructure and planning initiatives will not be ranked as they are considered separately and there are only two discretionary initiatives.

Initiative: 8.4 & 8.5 Convergence Bidding Uplift Allocation (these two initiatives can be combined)

High Level Prioritization Criteria Matrix

			HIGH	MEDIUM	LOW	NONE	Your Score
		Criteria	10	7	3	0	Use 0, 3, 7, or 10
A		Grid Reliability	Significant Improvement	Moderate Improvement	Minimal Improvement	No Improvement	3
В	Benefit	Improving Overall Market Efficiency	Significant improvement	Moderate improvement	Minimal improvement	No impact	10
С	Be	Desired by Stakeholders	Universally desired by stakeholders	Desired by majority of stakeholders	Desired by a small subset of stakeholders	No apparent desire	
D	Feasibility	Market Participant Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	10
E	Fea	ISO Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	7
			Total	30			

Grid Reliability (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

To the extent virtual bids crowd-out physical bids in the day-ahead market, those physical resources are not available real-time. If bets against the ISO are removed, then there is no longer an incentive to submit those virtual bids which crowd out physical bids.

Improving Overall Market Efficiency (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

Currently, when bets are made against the ISO model, there is no counter party to fund the bet, so it is allocated to load as uplift. This results in economic inefficiency as it is a poor transfer of dollars from load to financial players without any load receiving any benefit.

Market Participant Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

Changes to the allocation of uplift would have no, or very minimal impact, on participant's settlement review systems.

ISO Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

The ISO would have to make changes to the current settlement system process, so the changes are minimal. For example, some of the changes for virtual bid uplift are already being made for the EIM proposal.

Initiative: 12.12 Protocol(s) for Simulation and Testing of New Models, Design Changes, or Products

			HIGH	MEDIUM	LOW	NONE	Your Score
		Criteria	10	7	3	0	Use 0, 3, 7, or 10
Α		Grid Reliability	Significant Improvement	Moderate Improvement	Minimal Improvement	No Improvement	10
В	Benefit	Improving Overall Market Efficiency	Significant improvement	Moderate improvement	Minimal improvement	No impact	10
С	Be	Desired by Stakeholders	Universally desired by stakeholders	Desired by majority of stakeholders	Desired by a small subset of stakeholders	No apparent desire	\times
D	easibility	Market Participant Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	7
E	Fea	ISO Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	3
			Total	30			

Grid Reliability (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

Improved testing of various CAISO proposed new ideas/theories will identify problems and allow for those problems to be resolved before go-live which will improve grid reliability. In addition, with more analysis and more transparency of the process, stakeholders can understand better potential implications of the CAISO proposals, which will also significantly improve their systems and also identify issues for resolution.

Improving Overall Market Efficiency (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

Improved testing of various CAISO proposed new ideas/theories will identify problems and allow for those problems to be revealed for healthy stakeholder discussions. Not only the

software/communication systems need to be tested, more importantly, potential market impacts of various CAISO new proposals need to be fully studied. This will allow problems to be fixed before implementation. This will increase market efficiency by minimizing potential negative impacts to the market through simulation and full study of CAISO proposals.

Market Participant Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

Unclear how this would impact market participants, anticipated it would be minimal.

ISO Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

As this involves ISO system and staff, the impact could be moderate if it requires more work. If it is simply providing more transparency, then the impact would be minimal.

Initiative: 4.10 Flexible Ramping Product

High Level Prioritization Criteria Matrix

			HIGH	MEDIUM	LOW	NONE	Your Score
		Criteria	10	7	3	0	Use 0, 3, 7, or 10
A		Grid Reliability	Significant Improvement	Moderate Improvement	Minimal Improvement	No Improvement	7
В	Benefit	Improving Overall Market Efficiency	Significant improvement	Moderate improvement	Minimal improvement	No impact	7
С	Be	Desired by Stakeholders	Universally desired by stakeholders	Desired by majority of stakeholders	Desired by a small subset of stakeholders	No apparent desire	\times
D	Feasibility	Market Participant Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	7
E	Fea	ISO Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	3
			Total	24			

Grid Reliability (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

The establishment of a flexibility product has the potential to solve the operational ramping needs as seen by the ISO which should contribute to a more reliable system.

Improving Overall Market Efficiency (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

Having parties that cause the need for flexibility pay for their impacts improves market efficiency as those that value the product, pay for the product.

Market Participant Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

Unclear of the market participant impact. For some parties that want to offer the service it could be moderate. For others not participating, it would have no impact. Overall could be minimal.

ISO Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

Likely to have a moderate impact on CAISO systems.

Initiative: 4.12 Mitigating Transient Price Spikes, Real-Time Imbalance Energy Offset (RTIEO) / Real-Time Congestion Offset (RTCO)

		HIGH MEDIUM LOW	NONE	Your Score			
		Criteria	10	7	3	0	Use 0, 3, 7, or 10
Α		Grid Reliability	Significant Improvement	Moderate Improvement	Minimal Improvement	No Improvement	8
В	Benefit	Improving Overall Market Efficiency	Significant improvement	Moderate improvement	Minimal improvement	No impact	10
С	Be	Desired by Stakeholders	Universally desired by stakeholders	Desired by majority of stakeholders	Desired by a small subset of stakeholders	No apparent desire	
D	Feasibility	Market Participant Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	10
E	Fea	ISO Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	7
			Total	35			

High Level Prioritization Criteria Matrix

Grid Reliability (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

The CAISO grid depends on supply liquidity. Market participants may be discouraged from participation if they observe the levels of volatility that are characteristic of the CAISO market.

Improving Overall Market Efficiency (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

The CAISO lists several measures as support for its actions in this area:

1. Reduction of Transmission Constraint Relaxation Parameter: While SCE appreciates the CAISO's efforts in this initiative, the uplift reduction is 36%, by the CAISO's own estimates in its filing (ER13-1060). The market continues to bear substantial uplift.

- Order 764 initiative: While SCE appreciates the CAISO's efforts, the elimination of the CAISO's inefficient three-settlement system was a by-product of a FERC mandated process.
- 3. Flexible Ramping Product: As a proxy, the Flexible Ramping Constraint did reduce price spikes for three months after the implementation in December 2011. Since March 2012, the spikes have risen to even higher levels. SCE fails to see how this provides support of the ability of Flexible Ramping to mitigate these spikes that are not representative of actual economic conditions.
- 4. Full Network Model: The CAISO has not provided sufficient support to claim that this initiative will reduce price spikes.

Price spikes are the result of incorrect assumptions in the CAISO modeling. These spikes do not represent reality - economic or physical. The CAISO must rectify this flaw in its market design as this defect causes substantial costs through inefficient functioning.

Market Participant Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

Currently, market participants are suffering the costs high price spikes which are in many cases due to market design defects. Removal of these defects would halt the costs from these inefficiencies to the market participants. The impacts of unjustified price spikes need prompt resolution.

As this would require changes to the CAISO system, there would is no effort or resources expended by participants.

ISO Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

The systems are already in place at the CAISO, but this would require fine tuning of those resources. The implementation impact would be minimal for the CAISO.

Initiative: 11.4 Transmission Interconnection Process (D)

High Level Prioritization Criteria Matrix

		Criteria HIGH MEDIUM LOW 10 7 3	LOW	NONE	Your Score		
			10	7	3	0	Use 0, 3, 7, or 10
A		Grid Reliability	Significant Improvement	Moderate Improvement	Minimal Improvement	No Improvement	10
В	Benefit	Improving Overall Market Efficiency	Significant improvement	Moderate improvement	Minimal improvement	No impact	7
С	Be	Desired by Stakeholders	Universally desired by stakeholders	Desired by majority of stakeholders	Desired by a small subset of stakeholders	No apparent desire	\times
D	easibility	Market Participant Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	10
E	Fea	ISO Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	3
			Total	30			

Grid Reliability (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

The number of transmission interconnection applications has grown and continues to grow in the future with the expanded opportunities for non-incumbent transmission owners to become project sponsors.

SCE recognizes that the CAISO understands that a stakeholder initiative is needed to create a single CAISO transmission interconnection process for the CAISO footprint; however, given the expected implementation of FERC Order 1000 during the CAISO 2013/14 Transmission Planning Process, there is more urgency for the CAISO to initiate such a stakeholder process to work in concert with the new CAISO framework FERC Order 1000 framework.

Improving Overall Market Efficiency (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

A single CAISO queue for transmission interconnection will support improved overall market efficiency over individual TO transmission interconnection queues.

Market Participant Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

The TO's will need to work with the CAISO on a stakeholder process and development of tariff language. Impacts are expected and planned for.

ISO Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

The ISO will need to spend time, resources and develop a process for transmission interconnection. The CAISO has recognized the need for this initiative; however, it is more important now with the implementation of FO1000.

Initiative: 9.4 Joint Reliability Framework (JRF)

High Level Prioritization Criteria Matrix

			HIGH	MEDIUM	LOW	NONE	Your Score
		Criteria	10	7	3	0	Use 0, 3, 7, or 10
A		Grid Reliability	Significant Improvement	Moderate Improvement	Minimal Improvement	No Improvement	10
В	Benefit	Improving Overall Market Efficiency	Significant improvement	Moderate improvement	Minimal improvement	No impact	10
С	Be	Desired by Stakeholders	Universally desired by stakeholders	Desired by majority of stakeholders	Desired by a small subset of stakeholders	No apparent desire	\times
D	Feasibility	Market Participant Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	7
E	Fea	ISO Implementation Impact (\$ and resources)	No Impact	Minimal Impact	Moderate Impact	Significant impact	3
			Total	30			

Grid Reliability (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

The JRF provides grid reliability because it would expand the resource adequacy forward procurement requirement from one year to multiple years. In addition the CAISO would request data for all long-term RA contracts to do a study for up to 10 years outlook to start planning for what new resources we may potentially need to meet grid changes in the near future (where building a new power plant can take many years). It also provides reliability by procuring all the necessary attributes for the next 3 years to ensure the appropriate resources are available to the CAISO market (flexible resources, local resources, and system resources). The last point is even more important for grid reliability as more intermittent generation continues to penetrate the CAISO market.

Improving Overall Market Efficiency (provide a detailed explanation of how and why this initiative provides an improvement in grid reliability) –

Today RA is procured bilaterally within the CAISO market. Creating a Residual Services Auction is the first step toward a capacity market that would start to send price signals for capacity. This creates market efficiency for capacity procurement.

Market Participant Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

The market participant implementation impact would be minimal except to have the proper GUIs (if not already provided by the CAISO via a web platform) to participate in the Residual Services Auction. The Market Participant would need to track all bilateral RA forward procurement for reporting purposes to the CAISO (which most LSEs should already be doing). Market participants would also have to implement the settlement of awarded contracts from the auction. In terms of dollars and resources it would be minimal cost (especially if the CAISO creates a user-friendly auction platform).

ISO Implementation Impact (\$ and resources) (provide a detailed explanation of what you expect the impact to be in terms of \$ and resources) –

The ISO would have to create a new capacity auction mechanism that accepts bids from market participants, tracks awarded capacity deals, and also acts as the "clearing exchange" for settlement. The ISO would also have to develop a standard RA contract for each flavor of RA (Flexible, Local, and System) that satisfies all market participants (various generators and LSEs). Negotiations and drafting a document would take a lot of resource time (man-hours). The CAISO auction should be very straightforward in terms of cost to implement considering the amount of auction software out there today.