Update on the Design for Convergence Bidding

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Convergence Bidding Stakeholder Meeting
November 14, 2007
Overview for Today’s Discussion

Relevant papers (posted November 7 at): http://www.caiso.com/1807/1807996f7020.html
- “Update on the Design for Convergence Bidding”
- “Convergence Bidding: Department of Market Monitoring Recommendations”

1. Discuss deferral of granularity decision
2. Review key characteristics for virtual bids (nodal or zonal)
3. Review features for all-encompassing functionality
   - Position Limits
   - CRR Settlement Rule
   - Uninstructed Deviation Penalty
   - Ability to Suspend Virtual Trading
4. Review proposed Day Ahead Modifications
5. Proposed Credit Policy
6. Proposed Cost Allocation

7. Implications relevant only for nodal virtual bidding:
   - Scheduling incentives for Seller’s Choice contracts

Written comments to convergencebidding@caiso.com by November 30.
Resolving Zonal vs Nodal Convergence Bidding

The CAISO will defer the policy decision on nodal or LAP-level virtual bidding.
- Build scalable functionality
- Review market outcomes
- Seek MSC guidance

The CAISO seeks greater consensus among stakeholders.
- Further stakeholder engagements February-August, 2008
- Late August, 2008: CAISO recommendation for the granularity of virtual bidding upon implementation
- September 9-10, 2008: Targeted date for CAISO Board decision
- Late September, 2008: Targeted date for tariff filing to FERC

December 12-13, 2007: Informational briefing to the CAISO Board
Proposed Characteristics for Virtual Bids

Virtual bids (at any location) would:

- Be explicit (flagged)
- Be submitted only in DAM; automatically liquidated at Real Time price
- Include a price and quantity ($/MWh)
  - Energy Bids only
  - Single energy curve that starts at zero MWhs; up to ten segments
  - No start-up or minimum energy costs

- Capability for virtual bids at nodes or aggregation of pricing nodes
Proposed Characteristics for Virtual Bids (continued)

The CAISO proposes no virtual bidding at the interties.
- Increased risk of gaming opportunities
- Intertie schedule adjustments can be accomplished through HASP

The CAISO is exploring capability for virtual bids at EZ Trading Zones.

The CAISO would use the same distribution factors that are applied to physical bids in the relevant market for LAP-level virtual bids.

Virtual bids would be subject to the same bid caps as physical bids.

Virtual bids would not be subject to local market power mitigation.
Building the Functionality for Convergence Bidding

The CAISO seeks capability for additional features; implementation of these features would be linked with granularity decision.

- **Position Limits**: ability to limit virtual bidding by each SC to a percentage of the MW amount for a PNode or APNode.

- **CRR Settlement Rule**: adjusts the revenues received by an SC from CRRs impacted by virtual bidding behavior.

- **Uninstructed Deviation Penalty (UDP)**: functionality exists, but CAISO would need filing to FERC prior to implementing UDPs.

- **Ability to Suspend Virtual Bids**: both for individual SCs and for all virtual trading.
Proposed Day Ahead Modifications
(regardless of granularity)

Pre-IFM Process for Local Market Power Mitigation

- Maintain the MPM/RRD run, but use Bid-in Demand rather than forecasted Demand
  - Virtual bids may impact the market power of physical bids
  - Aligns bid mitigation with the IFM
  - LECG recommendation and FERC directive to use Bid-in Demand
Proposed Day Ahead Modifications (continued)
(regardless of granularity)

Manual Commitment of Needed RMR Units

- Using Bid-in Demand may commit fewer RMR units than would be needed.
  - CAISO has right to issue manual RMR Dispatch Notices to RMR units.
  - CAISO operators would commit RMR units, if necessary, after IFM but before RUC.

Release of Virtual Bid Information

- The CAISO proposes to post the aggregated clearing quantities of virtual bids by location (not by SC) upon the daily publication of IFM results.
Comments or Questions

Please submit written comments by November 30, 2007 to convergencebidding@caiso.com.