



California ISO

Decision on imbalance conformance enhancements proposal

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Balancing area operators manually adjust load forecast to reflect actual system conditions.

- Load forecast adjustments are called *imbalance conformances* because the adjustments are made for a variety of reasons.
- Imbalance conformance is necessary to adjust the load forecast used by the market model due to deviations in:
 - Forecast
 - Generator output
 - Intertie schedules
 - Outages

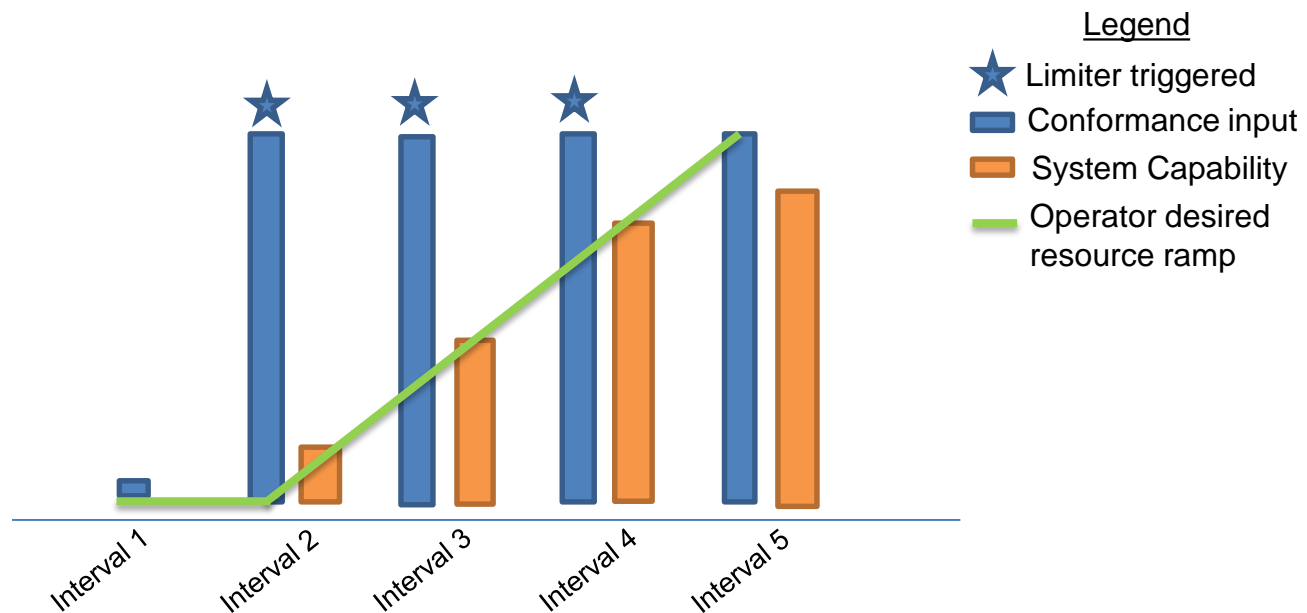
Proposal was approved and supported by the EIM Governing Body.

- EIM Governing Body had primary decisional role for one element of the proposal and advisory role for the balance of the proposal:
 - Approved tariff change explicitly authorizing imbalance conformance by EIM balancing areas
 - Recommend Board approve Management's proposal
- Board of Governors decisional items:
 - Tariff change explicitly authorizing imbalance conformance by ISO balancing area
 - Tariff change allowing use of the conformance limiter in the real-time market
 - Enhancements to the conformance limiter

Imbalance conformance limiter aligns operator adjustments with the capabilities of the system.

- ISO market sets high administrative prices when unable to balance load and supply
 - \$1,000/MWh for shortage and -\$150/MWh for oversupply
- Operator imbalance conformances are typically “coarse”
 - Input “coarse” adjustment in one interval instead of ramping across multiple intervals
 - May result in the market being unable to balance supply and load, setting high administrative prices
- Imbalance conformance limiter limits adjustments to the available energy bid quantity
 - Results in pricing based on highest priced bid

Proposed enhancements to imbalance conformance limiter address impacts of coarse adjustments.



- Enhanced limiter triggers based on changes between intervals, while previous logic was based on single interval

Propose to clarify tariff language authorizing the ISO to perform imbalance conformances.

- Tariff currently provides the ISO discretion to create a load forecast it deems appropriate to maintain grid reliability
- Propose to expand tariff language to provide transparency
 - Authorize ISO to perform imbalance conformances
 - Authorize use of the imbalance conformance limiter
- Stakeholders support the proposed tariff clarifications

Stakeholders generally support the imbalance conformance enhancements with some exceptions.

- SCE maintains revised limiter logic should be implemented in addition to existing limiter logic
- Powerex maintains imbalance conformance limiter will suppress valid scarcity prices
- Management committed to stakeholders to propose to remove limiter in two years
 - Operational tool enhancements will reduce operator need to make coarse adjustments

Management recommends the Board approve the imbalance conformance enhancements proposal.

- Tariff changes provide increased transparency
 - Authorize imbalance conformance by the ISO
 - Authorize use of the conformance limiter
- Enhancements to the conformance limiter will help align prices with actual system conditions