

# Generation Interconnection Reform Initiative Presentation to RETI Stakeholder Steering Committee



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**California ISO**  
Your Link to Power

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# The current process is based on FERC Order 2003 and subsequent orders establishing the ISO role beginning in 2005.

## Key Objectives:

- Maintain FERC Order 888's requirement of open access transmission service
- Limit opportunities for transmission providers to favor their own generation
- Facilitate market entry for new generation by reducing interconnection costs and time
- Encourage needed investment in generator and transmission infrastructure

## Some underlying assumptions are no longer valid, such as:

- Process assumed unused transmission capacity
- Process designed around single large thermal plants close to load

# Active projects in the queue today exceed our all-time system peak of 50,270 MW.

- 🌐 212 Interconnection Requests received from July 1, 2005 – November 30, 2007
  - Total 65,645 MW
  - 135 renewable projects totaling 40,429 MW
- 🌐 173 Interconnection Requests active today
  - Total 57,686 MW
  - 118 renewable projects totaling 38,112 MW

There has been an explosion of renewable projects entering the queue.

 Interconnection requests for renewable projects:

■ January 2006	5,700 MW
■ January 2007	11,000 MW
■ November 2007	40,000 MW

 Renewable generation is typically located in areas with inadequate transmission infrastructure

# Serial studies pose significant problems.

- 🌐 Individual interconnection studies are performed in serial order based on queue position
- 🌐 Serial Study approach disproportionately allocates costs of Network Upgrades and potentially discourages legitimate projects
- 🌐 Re-studies:
  - Increase ISO and PTO workload
  - Delay projects and increase study costs

# Ease of entry and lack of viability measures complicates queue management.

- 🌐 Barriers to entry are low, both monetarily and in terms of initial data requirements
- 🌐 Process flexibility leads to proliferation of requests and strains technical resources
- 🌐 Queue position has value regardless of project viability

# Transmission infrastructure and queue reform are both key to meeting renewable energy goals.

- ISO-approved transmission projects provide access to renewable resource areas:
  - Tehachapi Renewable Transmission Project (TRTP) will connect 3,450 MW Wind (4,500 MW Total Capacity)
  - Sunrise Power Link Project will facilitate interconnection:
    - » 1800 MW Geothermal in Imperial Irrigation District
    - » 900 MW Solar at Imperial Valley
  - Devers-Palo Verde II
  - Total capability from these projects exceeds the RPS 20% Goal
- Generation Interconnection Reform Initiative
  - Will address retroactive and going-forward improvements

# FERC has acknowledged the existence of LGIP challenges and has requested reform proposals.

- FERC held a nationwide technical conference on December 11, 2007 in Docket No. AD08-02-000.
- CAISO collaborated with the CPUC, PTO's, and members of the generating community in preparation for the conference.
- CAISO submitted comments. <http://www.caiso.com/1cb3/1cb3cf4dc520.pdf>
- FERC requested CAISO to file its reform proposal by Spring 2008.
- CAISO announced the Generation Interconnection Process Reform Initiative in a January 3rd Market Notice.
- CAISO filed Post-Technical Conference comments on January 10<sup>th</sup>. <http://www.caiso.com/1f4a/1f4acaa38410.pdf>
- An Issues Identification Paper was posted on January 18, 2008.

# The CAISO has defined several goals in the Generation Interconnection Reform Initiative.

- 🌐 Clear the existing backlog of Interconnection Requests (IR's)
- 🌐 Develop procedures and requirements that lead to more accurate study outcomes that ensure a more efficient interconnection of resources that match system needs
- 🌐 Provide Interconnection Customers (IC's) with reasonable cost and timing certainty
- 🌐 Reduce or eliminate the need for restudies
- 🌐 Create greater certainty in the timing of study outcomes
- 🌐 Better integrate the CAISO Transmission Planning Process (TPP) with the generation interconnection process
- 🌐 Allow for the integration of state efforts to identify transmission needs for Energy Resource Areas (ERAs)
- 🌐 Ensure the viability of projects entering the CAISO TPP

# The CAISO Issues Identification Paper provides initial guidance and structure for the Stakeholder Process.

- 🌐 Annual Queue Cluster Window
- 🌐 Group Studies
- 🌐 Increased financial commitments and consequences for delay or withdrawal
- 🌐 Accelerated site control by developers
- 🌐 Two study phases to determine:
  - Pro-rata Network Upgrade cost responsibility based upon IC requested deliverability
  - Interconnection Facilities cost estimate
- 🌐 Pro-rata or other shared cost allocation mechanism
- 🌐 Binding financial commitment prior to signing an Interconnection Agreement
- 🌐 Viable projects with executed Interconnection Agreements are an input to the Transmission Planning Process (TPP)

# The CAISO needs an aggressive and creative retroactive solution to clear the existing Queue.

- Obtain waiver from FERC to create a retroactive cluster and allow for group studies
  - Similar to approach utilized for the Tehachapi Wind Resource Area
  - Permit shared cost allocation unrelated to queue position
- Apply the same (or similar) going forward modifications to the retroactive cluster (i.e., increased financial commitments, proof of viability, etc.)

# The CAISO has announced a schedule for the Stakeholder Process.

- 🌐 January 18, 2008 CAISO posted Issues Identification Paper
- 🌐 January 25, 2008 Stakeholder Meeting – CAISO, 9 - 5
- 🌐 January 31, 2008 Stakeholder comments due by COB
- 🌐 February 5, 2008 CAISO posts Draft Proposal
- 🌐 February 12, 2008 Stakeholder Meeting - Lake Natoma Inn, 9 - 5
- 🌐 February 19, 2008 Stakeholder comments due by COB
- 🌐 March 2008 CAISO Board of Governors presentation
- 🌐 Early April 2008 CAISO posts draft Tariff language
- 🌐 Late April 2008 Stakeholder Meeting – CAISO, 9 - 5