

UNITED STATES OF AMERICA  
FEDERAL ENERGY REGULATORY COMMISSION

California Independent System Operator  
Corporation

Docket Nos. ER15-861-000

EL15-53-000

NOTICE OF TECHNICAL CONFERENCE

(March 24, 2015)

By order issued in this proceeding on March 16, 2015,<sup>1</sup> the Federal Energy Regulatory Commission (Commission) directed its staff to convene a technical conference to develop a record regarding issues related to imbalance energy price spikes experienced in PacifiCorp's balancing authority areas (BAAs) subsequent to PacifiCorp's full activation in the California Independent System Operator Corporation's (CAISO) Energy Imbalance Market (EIM), and to facilitate the development of a long-term solution. Consistent with the attached agenda, the technical conference will explore the circumstances identified in reports filed by CAISO and its Department of Market Monitoring (DMM) in Docket No. ER15-402-000 regarding the imbalance energy price spikes in PacifiCorp's BAAs and the status of CAISO and PacifiCorp efforts to improve the transitional issues identified in those reports. CAISO should come prepared to answer the questions laid out in the attached agenda. We invite DMM and PacifiCorp to also be prepared to answer questions.

The technical conference will be held on Thursday, April 9, 2015, from 10:00 am to 5:00 pm (EST), at the offices of the Federal Energy Regulatory Commission, 888 First Street, NE, Washington, DC 20426.

Attached to this notice is an agenda for the technical conference.

The technical conference will be open for the public to attend, and those interested in attending are encouraged to register by close of business, April 1, 2015. You may register at the following webpage: <https://www.ferc.gov/whats-new/registration/04-09-15-form.asp>.

An audio listen-only line will be provided. If you need a listen-only line, please email Sarah McKinley (Sarah.McKinley@ferc.gov) by 5:00 pm (EST) on Friday, April 3, with your name, email, and phone number, in order to receive the call-in information the

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<sup>1</sup> *Cal. Indep. Sys. Operator Corp.*, 150 FERC ¶ 61,191 (2015).

day before the conference. Please use the following text for the subject line, “ER15-861 listen-only line registration.”

This conference will also be transcribed. Transcripts of the technical conference will be available for a fee from Ace-Federal Reporters, Inc. ((202) 347-3700.

Commission conferences are accessible under section 508 of the Rehabilitation Act of 1973. For accessibility accommodations, please send an email to [accessibility@ferc.gov](mailto:accessibility@ferc.gov) or call toll free 1 (866) 208-3372 (voice) or (202) 208-1659 (TTY), or send a FAX to (202) 208-2106 with the required accommodations.

FOR FURTHER INFORMATION PLEASE CONTACT:

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Kimberly D. Bose,  
Secretary.



## California Independent System Operator Corporation

Docket Nos. ER15-861 and EL15-53

April 9, 2015

### Agenda

**10:00 a.m. – 10:15 a.m. Staff Introductory Remarks:** The purpose of this technical conference is to develop a record regarding issues related to imbalance energy price spikes experienced in PacifiCorp's balancing authority areas (BAAs) subsequent to PacifiCorp's full activation in the California Independent System Operator Corporation's (CAISO) Energy Imbalance Market (EIM), and to facilitate the development of a long-term solution. We will explore the circumstances identified in reports filed by CAISO and its Department of Market Monitoring (DMM)<sup>2</sup> regarding the imbalance energy price spikes in PacifiCorp's BAAs and the status of CAISO and PacifiCorp efforts to improve the transitional issues identified in those reports. Each session will consist of questions from staff to representatives from CAISO, DMM, and PacifiCorp. Time permitting, questions will be taken from those in attendance.

**10:15 a.m. – 12:00 p.m. Session 1:** In this session, staff seeks information related to certain categories of causes of price spikes noted in the March 4, 2015 DMM report: resource data alignment, resource outages, manual dispatches, and imports/exports. Staff will lead a question and answer session addressing the following questions:

1. Describe the factors that drive each category and the frequency with which they contribute to the pricing parameter being triggered.
2. To what extent are these factors reflective of physical conditions? To what extent are they reflective of communication, forecasting, or other non-physical conditions?

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<sup>2</sup> CAISO submitted these informational reports on December 15, 2014, January 15, 2015, and February 19, 2015 in Docket No. ER15-402-000. DMM filed independent assessments of the causes and solutions identified by CAISO in the reports on December 18, 2014, January 18, 2015, and March 4, 2015 in the same docket.

3. To what extent do these categories contribute to undersupply conditions and why? Why are there instances of small undersupply infeasibility when there is generally an excess amount of capacity bid in to the EIM? Is there an inconsistency on this issue in DMM and CAISO observations in their respective reports?<sup>3</sup>
4. To what extent do these categories contribute to flexible ramp sufficiency failure and why?
5. How frequently does PacifiCorp use manual dispatches to serve PacifiCorp balancing needs? What portion of PacifiCorp's balancing needs is being supplied by manual dispatch? How do such manual dispatches work relative to CAISO's market model? What is the timing of such manual dispatches relative to base schedule submissions and CAISO's real-time market process and how are the dispatches communicated to CAISO and to EIM?
6. What are the tools, procedures, and the level of automation for outage management made available to EIM Entities and individual resources, participating and non-participating, within EIM BAAs? How do they compare to outage management tools and processes available to resources within CAISO's BAA?
7. What are the contributing factors to the increased level of emergency intra-hour tags observed in PacifiCorp's BAAs? What efforts, if any, are underway to reduce intra-hour emergency tags?

**12:00 p.m. – 1:00 p.m. Lunch Break**

**1:00 p.m. – 2:45 p.m. Session 2:** In this session, staff seeks information related to the categories of causes of price spikes noted in the March 4, 2015 DMM report: load changes, renewable deviation, and transfer constraints/congestion. Staff will lead a question and answer session addressing the following questions:

1. Describe the factors that drive each category and the frequency with which they contribute to the pricing parameter being triggered.
2. To what extent are these reflective of physical conditions? To what extent are these reflective of communication, forecasting, or other non-physical conditions?
3. To what extent do these categories contribute to undersupply conditions and why? Why are there instances of small undersupply infeasibility when there is generally an excess amount of capacity bid in to the EIM?

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<sup>3</sup> The March 4, 2015 DMM report states that “the amount of capacity bid in to the EIM continues to generally exceed the amount of energy dispatched from EIM resources by a substantial amount.” CAISO's February 19, 2015 informational report shows many instances of undersupply infeasibility (e.g., Attachment E, Figures 17 and 19).

4. To what extent do these categories contribute to flexible ramp sufficiency failure and why?
5. What are the significant transmission constraints (static, dynamic, rate of change, and any other limits) that are enforced between EIM BAAs, within each PacifiCorp BAA, between EIM BAAs and non-EIM BAAs, and between CAISO and non-EIM entities that contribute to EIM price spikes?

**2:45 p.m. – 3:00 p.m.      Break**

**3:00 p.m. – 4:45 p.m.      Session 3:** Having explored the causes of the imbalance energy price spikes experienced in PacifiCorp's BAAs, staff will lead a question and answer session addressing the following questions:

1. What specific steps need to be taken to address the underlying causes of price spikes discussed in previous sessions? Who is responsible for taking these steps, and in what timeframe? What, if any, changes to the tariff would be necessary to implement these steps?
2. Please explain what seasonal variations CAISO and PacifiCorp anticipate and how they might impact a future EIM Entity's learning curve for participating in the EIM?
3. Are PacifiCorp or third-party suppliers in PacifiCorp's BAAs in the process of registering additional resources for participation in the EIM? What might encourage those third-party suppliers to join or discourage them from joining the EIM? Are there any known barriers to their participation?
4. Are there any efforts underway to increase transmission transfer capability that can be used for EIM transfers?

**4:45 p.m. – 5:00 p.m.      Wrap-Up**