# ALSTON&BIRD LLP

The Atlantic Building 950 F Street, NW Washington, DC 20004-1404

> 202-756-3300 Fax: 202-756-3333

Bradley R. Miliauskas

Direct Dial: 202-756-3405

Email: bradley.miliauskas@alston.com

July 13, 2006

The Honorable Magalie R. Salas Secretary Federal Energy Regulatory Commission 888 First Street, N.E. Washington, D.C. 20426

Re: California Independent System Operator Corporation

Errata to Compliance Filing Docket No. ER06-723-\_\_\_

Dear Secretary Salas:

On June 12, 2006, the California Independent System Operator Corporation (the "CAISO") submitted a compliance filing in the captioned docket ("June 12 Compliance Filing"). It has come to the CAISO's attention that several inadvertent errors appeared on the clean ISO Tariff sheets included in Attachments B and C to the June 12 Compliance Filing. Therefore, the CAISO is providing corrected versions of Attachments B and C, in their entirety, in the instant filing.

In Attachment B in the June 12 Compliance Filing, a number of clean ISO Tariff sheets were submitted that were inadvertently designated as "Substitute" sheets. The clean ISO Tariff sheets included in the version of Attachment B in the instant filing do not contain that erroneous "Substitute" designation.

In Attachment C in the June 12 Compliance Filing, several types of errors appeared. First, all of the clean ISO Tariff sheets in Attachment C were inadvertently designated as "Substitute" sheets, though none of those clean sheets should have been designated as "Substitute" sheets. Second, the iteration (*i.e.*, the sheet number designation shown in the upper right-hand corner) of a number of the ISO Tariff sheets included in Attachment C was

The Honorable Magalie R. Salas July 13, 2006 Page 2

incorrect. Third, ISO Tariff Sheet No. 229, as included in Attachment C, did not reflect the Commission's prior acceptance of changes to Section 11.2.11.2 of the ISO Tariff.<sup>1</sup> The CAISO has corrected all of these errors in the clean ISO Tariff sheets in the version of Attachment C provided in the instant filing.

Attachment 1 to the instant filing contains the corrected version of Attachment B to the June 12 Compliance Filing. Attachment 2 to the instant filing contains the corrected version of Attachment C to the June 12 Compliance Filing. Please replace the versions of Attachments B and C, as provided in the June 12 Compliance Filing, with the versions of Attachments B and C contained in the instant filing. The CAISO apologizes for any inconvenience this filing may have caused.

Two additional copies of this filing are enclosed to be date-stamped and returned to our messenger. If there are any questions concerning the filing, please contact the undersigned.

Respectfully submitted,

Charles F. Robinson
General Counsel
Sidney M. Davies
Assistant General Counsel
The California Independent
System Operator Corporation
151 Blue Ravine Road
Folsom, CA 95630
Tol: (016) 351 4400

Tel: (916) 351-4400 Fax: (916) 608-7246 Bradley R. Muliaushas
Sean A. Atkins
Bradley R. Miliauskas
Alston & Bird LLP
The Atlantic Building
950 F Street, NW
Washington, DC 20004-2601

Tel: (202) 756-3300 Fax: (202) 756-3333

See March 2006 Credit Policy Amendments to the Tariff of the California Independent System Operator Corporation, Docket No. ER06-700-000 (Mar. 7, 2006), at Attachment B (at changes to Section 11.2.11.2 of the ISO Tariff); California Independent System Operator Corp., 115 FERC ¶ 61,170, at Ordering Paragraph (A) (May 12, 2006).

# **ATTACHMENT 1**

# Errata to Attachment B of the IRRP Compliance Filing (ER 06-723-000)

Filed on June 12, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 306

Superseding Original Sheet No. 306

(d) transactions between Scheduling Coordinators;

(e) individual Generator Outage programs unless a Generator makes a change to its Generator

Outage program which causes Congestion in the short term (i.e. one month or less), in which case, the

ISO may publish the identity of that Generator.

(f) Demand Forecast and other hourly data provided by Scheduling Coordinators to the ISO

pursuant to Section 31.1.4.

The following information provided to the ISO by Scheduling Coordinators or Market Participants for

purposes of the Interim Reliability Requirements Program shall be treated by the ISO as confidential:

(a) Annual and monthly Resource Adequacy Plans pursuant to Sections 40.2.1 and 40.2.2,

respectively, and Supply Plans pursuant to Section 40.6; however, any Planning Reserve Margin

information required by Section 40.4 and any Qualifying Capacity eligibility criteria information required by

Section 40.5.1 contained in the Resource Adequacy Plans and/or Supply Plans shall not be treated as

confidential.

(b) Demand Forecast and other hourly data provided pursuant to Section 40.3.

(c) Information on existing import contracts, and any trades or sales of allocated import capacity,

provided pursuant to Section 40.5.2.2.

(d) Information reported by non-Participating Generators pursuant to Sections 40.6A.3 and 40.7.3.

(e) Information submitted through the dispute or discrepancy resolution process pursuant to Section

40.2.3.

20.3 Other Parties.

No Market Participant shall have the right hereunder to receive from the ISO or to review any documents,

data or other information of another Market Participant to the extent such documents, data or information

is to be treated as in accordance with Section 20.2; provided, however, a Market Participant may receive

and review any composite documents, data, and other information that may be developed based upon

such confidential documents, data, or information, if the composite document does not disclose such

Original Sheet No. 306A

Effective: May 12, 2006

confidential data or information relating to an individual Market Participant and provided, however, that the ISO may disclose information as provided for in its bylaws.

20.4 Disclosure.

Notwithstanding anything in this Section 20 to the contrary,

(a) The ISO: (i) shall publish individual bids for Supplemental Energy, individual bids for Ancillary Services, and individual Adjustment Bids, provided that such data are published no sooner than six (6) months after the Trading Day with respect to which the bid or Adjustment Bid was submitted and in a manner that does not reveal the specific resource or the name of the Scheduling Coordinator submitting the bid or Adjustment Bid, but that allows the bidding behavior of individual, unidentified resources and Scheduling Coordinators to be tracked over time; and (ii) may publish data sets analyzed in any public report issued by the ISO or by the Market Surveillance Committee, provided that such data sets shall be published no sooner than six (6) months after the latest Trading Day to which data in the data set apply, and in a manner that does not reveal any specific resource or the name of any Scheduling Coordinator submitting bids or Adjustment Bids included in such data sets.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I Superseding Original Sheet No. 308

Confidentiality Agreement for Electric System Data, or are subject to similar

First Revised Sheet No. 308

confidentiality requirements; or

(iii) In order to maintain reliable operation of the ISO Control Area, the ISO may share

individual Generating Unit Outage information with the operations engineering and/or the

outage coordination division(s) of other Control Area operators, Participating TOs, MSS

Operators and other transmission system operators engaged in the operation and

maintenance of the electric supply system whose system is significantly affected by the

Generating Unit and who have executed the Western Electricity Coordinating Council

Confidentiality Agreement for Electric System Data.

(d) Information submitted through Resource Adequacy Plans pursuant to Sections 40.2.1 and 40.2.2,

Supply Plans pursuant to Section 40.6, and the dispute or discrepancy resolution process

pursuant to Section 40.2.3 may be provided to:

(i) the Scheduling Coordinator(s) and/or Market Participant(s) involved in the dispute or

discrepancy pursuant to Section 40.2.3, only to the limited extent necessary to identify

the disputed transaction and relevant counterparty or counterparties.

(ii) the regulatory entity, whether the CPUC or a Local Regulatory Authority, with jurisdiction

over a Load Serving Entity involved, pursuant to Section 40.2.3, in a dispute or

discrepancy, or otherwise is identified by the ISO as exhibiting a potential deficiency in

demonstrating compliance with Resource Adequacy rules adopted by the CPUC or Local

Regulatory Authority, as applicable. The information provided shall be limited to the

particular dispute, discrepancy or deficiency.

20.5 Confidentiality.

The ISO shall implement and maintain a system of communications with Scheduling Coordinators that

includes the strict use of passwords for access to data to ensure compliance with Section 20. Access

within the ISO to such data on ISO's communications systems, including databases and backup files,

shall be strictly limited to authorized ISO personnel through the use of passwords and other appropriate

means.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Original Sheet No. 308A

Effective: May 12, 2006

#### 21 SCHEDULE VALIDATION TOLERANCES.

# 21.1 Temporary Simplification of Schedule Validation Tolerances.

Notwithstanding any other provision in the ISO Tariff, including the ISO Protocols, a Schedule shall be treated as a Balanced Schedule when aggregate Generation, adjusted for Transmission Losses, is within 20 MW of aggregate Demand, or such lower amount, greater than 1 MW, as may be established from time to time by the ISO. The ISO may establish the Schedule validation tolerance level at any time, between a range from 1 MW to 20 MW, by giving seven days' notice published on the ISO's "Home Page," at http://www.ISO.com or such other Internet address as the ISO may publish from time to time.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Original Sheet No. 463B

Effective: May 12, 2006

### 40.2 Submission of Annual and Monthly Resource Adequacy Plan.

# 40.2.1 Annual Resource Adequacy Plan.

Each Scheduling Coordinator for a Load Serving Entity serving Load within the ISO Control Area must provide the ISO with an annual Resource Adequacy Plan; however, Scheduling Coordinators representing a Load Serving Entity with an MSS Agreement shall submit the information required by this section pursuant to the terms and formal standards set forth in the MSS Agreement. The annual Resource Adequacy Plan provided to the ISO by Scheduling Coordinators for the CPUC Load Serving Entity or Entities for whom they schedule Demand within the ISO Control Area shall be submitted on the schedule and in the form approved by the CPUC. The annual Resource Adequacy Plan provided to the ISO by Scheduling Coordinators for the non-CPUC Load Serving Entity or Entities for whom they schedule Demand within the ISO Control Area, except Load Serving Entities with an MSS Agreement, shall be submitted no later than October 25<sup>th</sup> of each year and in the form set forth on the ISO Website. Other than for good cause, the form of the Resource Adequacy Plan and the date for submission for the CPUC Load Serving Entities and the Non-CPUC Load Serving Entities should be identical. The annual Resource Adequacy Plan must identify the Resource Adequacy Resources that will be relied upon to satisfy the Planning Reserve Margin under Section 40.4, or portion thereof as established by the CPUC or applicable Local Regulatory Authority, and must apply the Net Qualifying Capacity requirements of Section 40.5.2.

#### 40.2.2 Monthly Resource Adequacy Plan.

Each Scheduling Coordinator for a Load Serving Entity serving Load within the ISO Control Area must provide the ISO with a monthly Resource Adequacy Plan; however, (1) Scheduling Coordinators representing a Load Serving Entity with an MSS Agreement shall submit the information required by this section pursuant to the terms and formal standards set forth in the MSS Agreement and (2) Scheduling Coordinators for a Load Serving Entity serving Load within the ISO Control Area in a forecasted peak amount of less than (1) MW on average per day over the compliance year may notify the ISO that the Load Serving Entity's annual Resource Adequacy Plan pursuant to Section 40.2.1 will constitute its monthly Resource Adequacy Plan under this section for each month of the following compliance year.

Issued by: Charles F. Robinson, Vice President and General Counsel

Effective: May 12, 2006

The monthly Resource Adequacy Plan provided to the ISO by Scheduling Coordinators for the CPUC Load Serving Entity or Entities for whom they schedule Demand within the ISO Control Area shall be submitted on the schedule and in the form approved by the CPUC. The monthly Resource Adequacy Plan provided to the ISO by Scheduling Coordinators for the non-CPUC Load Serving Entity or Entities for whom they schedule Demand within the ISO Control Area, except for Load Serving Entities with an MSS Agreement, shall be submitted no later than on the last business day of the second month prior to the compliance month (e.g., March 31 for May) and in the form set forth on the ISO's Website. Other than for good cause, the form of the Resource Adequacy Plan and the date for submission for the CPUC Load Serving Entities and the Non-CPUC Load Serving Entities should be identical. The monthly Resource Adequacy Plan must identify the Resource Adequacy Resources that will be relied upon to satisfy the Planning Reserve Margin under Section 40.4 for the relevant reporting month and must apply the Net Qualifying Capacity requirements of Section 40.5.2.

### 40.2.3 Resource Adequacy Plan Compliance.

The ISO will evaluate whether each monthly Resource Adequacy Plan submitted by a Scheduling Coordinator on behalf of a Load Serving Entity serving Load within the ISO Control Area satisfies the Load Serving Entity's obligation to procure sufficient Net Qualifying Capacity to comply with its Planning Reserve Margin under Section 40.4. If a Scheduling Coordinator for a Load Serving Entity submits a Resource Adequacy Plan that the ISO identifies as not demonstrating compliance with Resource Adequacy rules adopted by the CPUC or other Local Regulatory Authority, as applicable, the ISO will, within 10 business days, first notify the relevant Scheduling Coordinator, or in the case of a mismatch between Resource Adequacy Plan(s) and Supply Plan(s), the relevant Scheduling Coordinators in an attempt to resolve the issue. If this process does not resolve the ISO's concern, the ISO will notify the CPUC or other appropriate Local Regulatory Authority of the potential deficiency. To the extent that the CPUC or other appropriate Local Regulatory Authority allows Load Serving Entities under its jurisdiction to cure the identified deficiency or determines that no deficiency exists, the Scheduling Coordinator shall inform the ISO at least 10 days before the effective month. If the deficiency is not resolved prior to the 10th day before the effective month, the ISO will use the information contained in the Supply Plan to set

Issued by: Charles F. Robinson, Vice President and General Counsel

Original Sheet No. 463C.01

Resource Adequacy Resources' obligations under this section of the ISO Tariff for the applicable reporting month.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Original Sheet No. 463E

#### 40.3 Demand Forecasts.

The annual and monthly Resource Adequacy Plans must include a Demand Forecast as follows:

- a. For CPUC Load Serving Entities, the Demand Forecast shall be the Demand Forecast required by the CPUC. To the extent the ISO has not received a CPUC Load Serving Entity's load forecast through the CPUC's Resource Adequacy process, the Scheduling Coordinators for the CPUC Load Serving Entities must provide to the ISO a copy of the Demand Forecast that they provided to the CPUC and CEC, subject to the confidentiality terms established by the CPUC in its proceeding.
- b. For non-CPUC Load Serving Entities, the Demand Forecast shall be the Demand Forecast required by the applicable Local Regulatory Authority. Scheduling Coordinators for non-CPUC Load Serving Entities must provide data and/or supporting information, as requested by the ISO, for the Demand Forecasts required by this Section for each represented non-CPUC Load Serving Entity.
- c. If the CPUC or other Local Regulatory Authority has not established a requirement to prepare a Demand Forecast, the Scheduling Coordinator for the Load Serving Entity shall prepare and provide the ISO with a Demand Forecast that shall be the Load Serving Entity's monthly non-coincident peak Demand Forecast for its Service Area, for its MSS area, or in each Service Area of an Original Participating TO in which the Load Serving Entity serves Load, unless the Load Serving Entity agrees to utilize a coincident peak determination provided by the California Energy Commission for such Load Serving Entity. Scheduling Coordinators for Load Serving Entities covered by this subsection must provide data and/or supporting information, as requested by the ISO, for the Demand Forecasts required by this Section for each represented Load Serving Entity.

For Load Serving Entities that are local publicly owned electric utilities as defined in Section 9604 of the PUC, the Demand Forecasts required by this Section 40.3 should be consistent with Section 9620(a) of the PUC, as it may be amended from time to time, requiring that such Load Serving Entities meet their

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Original Sheet No. 463F

Planning Reserve Margin, peak demand, and operating reserves.

40.4 Planning Reserve Margin.

The monthly Resource Adequacy Plan must include a level of Resource Adequacy Capacity sufficient to

meet 100% of the Demand Forecast in Section 40.3 plus a Planning Reserve Margin as follows:

a. For Scheduling Coordinators representing CPUC Load Serving Entities, the Planning Reserve

Margin shall be that adopted by the CPUC.

b. For Scheduling Coordinators representing non-CPUC Load Serving Entities, the Planning

Reserve Margin shall be that adopted by the appropriate Local Regulatory Authority.

c. For Scheduling Coordinators representing Load Serving Entities for which the CPUC or other

Local Regulatory Authority has not established a Planning Reserve Margin as of May 31, 2006,

the Planning Reserve Margin shall be: (1) for compliance months June through September 2006,

the Planning Reserve Margin provided by the Load Serving Entity to accommodate any

processes to approve the Planning Reserve Margin that may be pending before the applicable

Local Regulatory Authority and (2) thereafter, no less than 115% of the peak hour of the month in

the Demand Forecast set forth in Section 40.3.

40.5 Determination of Resource Adequacy Capacity.

Resource Adequacy Capacity shall be the quantity of capacity in MWs from a resource listed in a

Resource Adequacy Plan. Resource Adequacy Capacity cannot exceed a resource's Net Qualifying

Capacity.

40.5.1 Qualifying Capacity.

Qualifying Capacity is the capacity from a resource prior to application of the Net Capacity provisions of

Section 40.5.2. The criteria for determining the types of resources that may be eligible to provide

Qualifying Capacity and for calculating Qualifying Capacity from eligible resource types may be

established by the CPUC or other applicable Local Regulatory Authority and provided to the ISO. For

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Effective: May 31, 2006

compliance months June through September 2006, the criteria for determining the types of resources that may be eligible to provide Qualifying Capacity and for calculating Qualifying Capacity from eligible resource types may be provided by the Load Serving Entity to accommodate any processes to approve the Qualifying Capacity criteria that may be pending before the applicable Local Regulatory Authority.

Only if such criteria are not provided by the CPUC or other Local Regulatory Authority by August 31, 2006 for compliance month October 2006, then Section 40.13 will apply. The ISO shall use the criteria provided by the CPUC, other Local Regulatory Authority or, if necessary, Section 40.13, to determine and verify, if necessary, the Qualifying Capacity of all resources listed in a Resource Adequacy Plan; however, to the extent a resource is listed by one or more Scheduling Coordinators in their respective Resource Adequacy Plans, which apply the criteria of more than one regulatory entity that leads to conflicting Qualifying Capacity values for that resource, the ISO will apply the respective Qualifying Capacity formulas applicable for each Load Serving Entity.

# 40.5.2 Net Qualifying Capacity.

Net Qualifying Capacity is Qualifying Capacity, determined under the criteria provided by the CPUC or other Local Regulatory Authority or, if such criteria is not provided by the CPUC or Local Regulatory Authority, under Section 40.13 of this ISO Tariff, reduced, as applicable, based on: (1) testing and verification or (2) deliverability restrictions. The Net Qualifying Capacity determination shall be made by the ISO pursuant to the provisions of this ISO Tariff. The ISO shall produce a report, posted to the ISO Website and updated from time to time, setting forth the Net Qualifying Capacity of Participating Generators. All other resources may be included in the report under this Section upon their request. Any disputes as to the ISO's determination regarding Net Qualifying Capacity shall be subject to the ISO's alternative dispute resolution procedures.

Original Sheet No. 463G.01

Effective: May 31, 2006

### 40.5.2.1 Deliverability Within the ISO Control Area.

In order to determine Net Qualifying Capacity from a Generating Unit, the ISO will determine that the Generating Unit is able to serve the aggregate of Load by means of a deliverability analysis. The deliverability analysis will be performed annually and shall focus on peak Demand conditions. The ISO will review its input assumptions and draft results with Market Participants before completing its determination. The ISO will coordinate with the CPUC and other Local Regulatory Authorities so that the results of the deliverability analysis can be incorporated in annual and monthly Resource Adequacy Plans. The results of the ISO's 2006 deliverability analysis shall be effective for a period no shorter than compliance year 2007. To the extent the deliverability analysis shows that the Qualifying Capacity of a Generating Unit is not deliverable to the aggregate of Load under the conditions studied, the Qualifying Capacity of the Generating Unit will be reduced on a MW basis for the capacity that is undeliverable.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Effective: May 31, 2006

#### 40.5.2.2 Deliverability of Imports.

This Section 40.5.2.2 shall apply only to Resource Adequacy Plans covering the period through December 31, 2007, unless superseded earlier by alternative ISO Tariff provisions. Total import capacity will be assigned to Load Serving Entities serving Load in the ISO Control Area and other Market Participants, if applicable, for 2007 as described by the following sequence of steps.

- 1. Step 1: The ISO shall establish for 2007 for each branch group the total import capacity values for the ISO Control Area, and will post those values on the ISO Website by July 1, 2006.
- 2. Step 2: For each branch group, the total capacity established in Step 1 will be reduced by subtracting the import capacity associated with (i) Existing Transmission and (ii) encumbrances and transmission ownership rights. Existing Contracts and encumbrances and transmission ownership rights therefore shall be reserved for holders of such commitments as part of the deliverability study and will not be subject to allocation under this Section.
- 3. Step 3: From the amount of import capacity remaining on each branch group determined in Step 2 above, Load Serving Entities serving Load within the ISO Control Area will receive, to the extent feasible, an allocation on a particular branch group selected by the Load Serving Entity equal to each entity's resource commitments from outside the ISO Control Area, as of March 10, 2006, the terms of which runs through at least calendar year 2007. The branch group shall be selected by the Load Serving Entity based on the primary branch group upon which the energy or capacity from the particular resource commitment from outside the ISO Control Area has been historically scheduled or, for a resource commitment without a scheduling history, the primary branch group upon which the energy or capacity from the particular resource commitment from outside the ISO Control Area is anticipated to be scheduled. To the extent a particular branch group is over requested, such that the MWs represented in all requested resource commitments utilizing the branch group exceed the branch group's remaining import capacity, the requested resource commitment MW quantities will be allocated available capacity based on the "Import Capacity Load Share" ratio of each Load Serving Entity submitting such resource commitments. To the extent this initial allocation has not fully assigned the total import capacity of a particular branch

Issued by: Charles F. Robinson, Vice President and General Counsel

Original Sheet No. 4631

group to the requested resource commitments, the remaining capacity will be allocated until fully exhausted based on the Import Capacity Load Share ratio of each Load Serving Entity whose submitted resource commitment has not been fully satisfied.

- a. Import Capacity Load Share is each Load Serving Entity's proportionate share of the forecasted 2007 coincident peak Load for the ISO Control Area relative to the total coincident peak Load of all Load Serving Entities that have not had their request for import capacity for a resource commitment on a particular branch group fully satisfied. The proportionate share of the forecasted 2007 peak Load for the ISO Control Area for each Load Serving Entity is the "Coincident Load Share," as determined by the California Energy Commission.
- b. The ISO will notify the Scheduling Coordinator for each Load Serving Entity of the Load Serving Entity's Coincident Load Share. The ISO will further notify the Scheduling Coordinator for each Load Serving Entity of the amount of, and branch group on which, import capacity has been allocated to the Load Serving Entity pursuant to this Step 3.
  The import capacity allocated pursuant to this Step 3 shall be referred to as "Commitment Import Capacity."
- 4. Step 4: To the extent import capacity remains unallocated following Steps 1-3 above, the ISO will publish on its Website remaining aggregate import capacity, the identity of the branch groups with available capacity, and the MW quantity remaining on each such branch group. The remaining aggregate import capacity will be allocated to Load Serving Entities serving Load within the ISO Control Area through their Scheduling Coordinators based on each Load Serving Entity's Coincident Load Share. The quantity of import capacity allocated to a Load Serving Entity under this paragraph is that entity's "Remainder Import Capacity." This Step 4 does not allocate import capacity on a specific branch group, but rather allocates aggregate import capacity.
- 5. Step 5: Load Serving Entities shall be allowed to trade some or all of their Remainder Import Capacity or Commitment Import Capacity to any other Load Serving Entity or Market Participant during a period of time established by ISO Market Notice. The ISO will accept trades among

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Original Sheet No. 463I.01

Effective: May 31, 2006

LSEs and Market Participants only to the extent such trades are reported to the ISO in a manner established by ISO Market Notice.

- 6. Step 6: Three business days after the close of the trading period set forth in Step 5 above, the Scheduling Coordinator for each Load Serving Entity or Market Participant shall notify the ISO of its request to allocate its post-trading Remainder Import Capacity on a MW per available branch group basis. The ISO will honor the requests to the extent a branch group has not been over requested. If a branch group is over requested, the requests for Remainder Import Capacity on that branch group will be allocated based on the ratio of each Load Serving Entity's Import Capacity Load Share, as used in Step 3. A Market Participant without a Coincident Load Share will be assigned the Coincident Load Share equal to the average Coincident Load Share of those Load Serving Entities from which it received Remainder Import Capacity. The ISO will notify each Scheduling Coordinator for Load Serving Entities or Market Participants of their accepted allocation under this Step 6.
- 7. Step 7: Following Step 6, the ISO will publish on its Website remaining aggregate import capacity, if any, the identity of the branch groups with available capacity, and the MW quantity remaining on each such branch group. To the extent import capacity remains unallocated, in the time period and manner established by ISO Market Notice, all Load Serving Entities or Market Participants shall notify the ISO of their requests to allocate any remaining Remainder Import Capacity on a MW per available branch group basis. The ISO will honor the requests to the extent a branch group has not been over requested. If a branch group is over requested, the requests on that branch group will be allocated based on the ratio of each Load Serving Entity or Market Participant's Import Capacity Load Share, as used in Steps 3 and 6. The ISO will notify each Scheduling Coordinator for a Load Serving Entity or Market Participant of the Load Serving Entity or Market Participant's accepted allocation under this Step 7. No further iterations will be permitted.

This multi-step allocation of total import capacity does not guarantee or result in any actual transmission service being allocated and is only used for determining the maximum import capacity that can be

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Original Sheet No. 4631.02

credited towards satisfying the Planning Reserve Margin of a Load Serving Entity under this Section 40. Upon the request of the ISO, Scheduling Coordinators must provide the ISO with information on existing import contracts and any trades or sales of their load share allocation. To the extent that the ISO's review of Resource Adequacy Plans identifies reliance upon imports that exceed the import capacity allocated to the Load Serving Entity under this section, the ISO will inform the CPUC or appropriate Local Regulatory Authority of any Resource Adequacy Plan submitted by a Scheduling Coordinator for a Load Serving Entity under their respective jurisdiction that exceeds its allocation of import capacity.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Original Sheet No. 463J

Effective: May 12, 2006

# 40.6 Submission of Supply Plans.

Scheduling Coordinators representing Resource Adequacy Resources supplying Resource Adequacy Capacity shall provide the ISO with annual and monthly Supply Plans; however, Scheduling Coordinators for resources listed on schedule 14 of an MSS Agreement need not submit a Supply Plan, unless any capacity from such Schedule 14 resources has been sold to any Load Serving Entity other than the MSS Operator that owns or controls the resource. The annual Supply Plan shall be provided by September 30th of each year. The monthly Supply Plan shall be provided on the last business day of the second month prior to the compliance month (e.g., March 31 for May). Both the annual and monthly Supply Plans shall be provided in the form set forth on the ISO's Website, listing their commitments to provide Resource Adequacy Capacity to any Load Serving Entity or Entities for the reporting period.

## 40.6.1 Compliance with Supply Plan Obligation.

Scheduling Coordinators representing Resource Adequacy Resources supplying Resource Adequacy Capacity that fail to provide the ISO with annual or monthly Supply Plans as set forth in this ISO Tariff shall be subject to Section 37.6.1 of the ISO Tariff.

Issued by: Charles F. Robinson, Vice President and General Counsel

Original Sheet No. 463K

Effective: May 31, 2006

40.6A Availability of Resource Adequacy Resources.

40.6A.1 Applicability.

The requirements of Section 40.6A shall apply to all Resource Adequacy Resources identified on the Resource Adequacy Plans submitted by Scheduling Coordinators for Load Serving Entities serving Load in the ISO Control Area other than Resource Adequacy Resources identified exclusively on the Resource Adequacy Plans of (i) Load Serving Entities that have entered into a Metered Subsystem Agreement with the ISO and (ii) the State Water Project.

40.6A.2 Available Generation.

For the purposes of Section 40.6A, a Resource Adequacy Resources' "Available Generation" shall be: (a) the Resource Adequacy Capacity of a Generating Unit, other than a Hydroelectric facility or a QF that is still under a power purchase agreement with a host utility, System Unit that has contracted to supply Resource Adequacy Capacity to a non-MSS Load Serving Entity serving Load with the ISO Control Area, adjusted for any outages or reductions in capacity reported to the ISO in accordance with this ISO Tariff, (b) minus the unit's scheduled operating level as identified in the ISO's Final Hour-Ahead Schedule, (c) minus the unit's capacity committed to provide Ancillary Services to the ISO either through the ISO's Ancillary Services market or through self-provision by a Scheduling Coordinator, and (d) minus the capacity of the unit committed to deliver Energy or provide Operating Reserve to the Resource Adequacy Resources' Generator's Native Load.

In the case where the Resource Adequacy Resource is a System Resource, and to the extent the CPUC or other Local Regulatory Authority has imposed an obligation that System Resources relied upon by Load Serving Entities within their jurisdiction to meet Resource Adequacy requirements must be available to the ISO, the Available Generation of the System Resource shall be the Resource Adequacy Capacity of the System Resource adjusted for any outages or reductions in capacity reported to the ISO in accordance with this ISO Tariff, (b) minus the total amount of the System Resource's actual energy scheduled on the specific intertie of the import Resource Adequacy Capacity as identified in the ISO's Final Hour-Ahead Schedules, and (c) minus the amount of the System Resource's commitments on the

Issued by: Charles F. Robinson, Vice President and General Counsel

Original Sheet No. 463L

specific intertie of the import Resource Adequacy Capacity to provide Ancillary Services to the ISO either through the ISO's Ancillary Services market or through self-provision by a Scheduling Coordinator. The Available Generation of the System Resource shall never be less than zero.

# 40.6A.3 Reporting Requirements for Non-Participating Generators.

So that the ISO may determine the Available Generation of Resource Adequacy Resources, Resource Adequacy Resources, other than non-resource specific System Resources and Qualifying Facilities ("QFs") with effective contracts under the Public Utilities Regulatory Policies Act, that are not Participating Generators shall be required to file with the ISO: (i) the Generating Unit's minimum operating level; (ii) the Generating Unit's maximum operating level; and (iii) the Generating Unit's ramp rates at all operating levels; and (iv) such other information the ISO determines is necessary to determine available generation and to dispatch Resource Adequacy Resources. In addition, Resource Adequacy Resources that are not Participating Generators must, consistent with the notification obligations of Participating Generators and in order to comply with the intent of this Section 40.6A, notify the ISO, as soon as practicable, of any Planned Maintenance Outages, Forced Outages, Force Majeure Event outages or any other reductions in their maximum operating levels or Resource Adequacy Capacity during the relevant month.

#### 40.6A.4 Obligation to Offer Available Capacity.

Except as set forth in Sections 40.6A.5 and 40.6A.6, all Resource Adequacy Resources shall offer to sell in the ISO's Real Time Market for Imbalance Energy, in all hours, all their Available Generation as defined in Section 40.6A.2 and any other Available Generation beyond its Resource Adequacy Capacity shall be subject to the FERC must-offer obligation as set forth in Section 40.7. The Resource Adequacy Resource shall make available to the ISO Real Time Market all Resource Adequacy Capacity that is not subject to an outage or is otherwise participating in the ISO Market or included on a self-schedule.

Notwithstanding the foregoing, a Resource Adequacy Resource that is a Participating Intermittent Resource satisfies its obligation to offer Available Generation under this Section by scheduling in accordance with Appendix Q of the ISO Tariff.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Original Sheet No. 463L.01

Effective: May 31, 2006

40.6A.5 Submission of Bids and Applicability of the Proxy Price.

For each Operating Hour, the Scheduling Coordinator for the Resource Adequacy Resource shall submit Supplemental Energy bids for all of their Available Generation to the ISO in accordance with Section 34.2. In addition, the ISO shall calculate for each gas-fired Resource Adequacy Resource (other than gas-fired Resource Adequacy Resources which are also System Resources), in accordance with Section 40.10.1, a Proxy Price for Energy.

If a Scheduling Coordinator for the Resource Adequacy Resource fails to submit a Supplemental Energy bid for any portion of its Available Generation for any Dispatch Interval, the un-bid quantity of the Resource Adequacy Resource's Available Generation will be deemed by the ISO to be bid at the Resource Adequacy Resource's Proxy Price if (i) the Resource Adequacy Resource is a gas-fired Generating Unit and (ii) the Resource Adequacy Resource has provided the ISO with adequate data in compliance with Section 40.6A.3 for the applicable Generating Unit. For all other Resource Adequacy Resources that are Generating Units, the un-bid quantity of the Resource Adequacy Resources' Available Generation will be deemed by the ISO to be bid and settled in accordance with Section 11.2. In order to dispatch resources providing Imbalance Energy in proper merit order the ISO will insert this un-bid quantity into the Resource Adequacy Resource's Supplemental Energy bid curve above any lower-priced segments of the bid curve and below any higher-priced segments of the bid curve as necessary to maintain a non-decreasing bid curve over the entire range of the Resource Adequacy Resources' Available Generation.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: June 12, 2006

Effective: May 31, 2006

Adequacy Resources of the ISO decisions on Waiver requests that were submitted to the ISO after 10:00 a.m. (beginning of Hour Ending 11) on the day before; (3) end Waiver Denial Periods at any time; (4) revoke Waivers at any time, while making best attempts to revoke a Waiver at least 90 minutes prior to the time a unit would be required to be on-line generating at its Pmin; and (5) revoke a waiver denial for a Short-Start Resource Adequacy Resource at any time and such revocation will be communicated via a ISO real-time dispatch or unit commitment instruction.

# 40.6A.7 Penalties for Non-Compliance.

In addition to any other penalty or settlement consequence of a failure of a unit to operate in accordance with a ISO operating order, the failure of a Scheduling Coordinator for a Resource Adequacy Resource to make the Resource Adequacy Resource available to the ISO in accordance with the requirements of Section 40 of this ISO Tariff or to operate the Resource Adequacy Resource by placing it online or in a manner consistent with a submitted Supplemental Energy bid or Proxy Price Energy Bid shall result in that Scheduling Coordinator being subject to the sanctions set forth in Section 37.2 of the ISO Tariff.

40.6B Recovery of Minimum Load Costs By Resource Adequacy Resources.

#### 40.6B.1 Eligibility.

Except as set forth below, Resource Adequacy Resources that are Generating Units and System Units for which the MSS Operator has contracted to supply Resource Adequacy Capacity to another entity shall be eligible to recover Un-Recovered Minimum Load Costs during Waiver Denial Periods. Units from Resource Adequacy Resources that incur Minimum Load Costs during hours for which the ISO has granted to them a waiver shall not be eligible to recover such costs for such hours. When a Resource Adequacy Resource has a Final Hour-Ahead Energy Schedule, the Resource Adequacy Resource shall not be eligible to recover Minimum Load Costs for any such hours within a Waiver Denial Period. When, on a 10-minute Settlement Interval basis, a Resource Adequacy Resource generating at minimum load in compliance with the supply obligation, produces a quantity of Energy that varies from its minimum operating level by more than the Tolerance Band, the Resource Adequacy Resource shall not be eligible to recover Minimum Load Costs for any such Settlement Intervals during hours within a Waiver Denial Period. When, on a Settlement Interval basis, a Resource Adequacy Resource produces a quantity of

Issued by: Charles F. Robinson, Vice President and General Counsel

Original Sheet No. 477C

40.13.11 Facilities Under Construction.

The Qualifying Capacity for facilities under construction will be determined based on the type of resource as described elsewhere in this Section. In addition, the facility must have been in commercial operation for no less than one month to be eligible to be included as a Resource Adequacy Resource in a Scheduling Coordinator's monthly plan.

40.13.12 System Resources.

40.13.12.1 Dynamically Scheduled System Resources.

Dynamically Scheduled System Resources shall be treated similar to resources within the ISO Control Area, except with respect to the deliverability screen under Section 40.5.2.1. However, eligibility as a Resource Adequacy Resource is contingent upon a showing by the Scheduling Coordinator that the Dynamically Scheduled System Resource has secured transmission through any intervening Control Areas for the operating hours that cannot be curtailed for economic reasons or bumped by higher priority transmission and that the Load Serving Entity upon which the Scheduling Coordinator is scheduling Demand has an allocation of import capacity at the import Scheduling Point under Section 40.5.2.2 of the ISO Tariff that is not less than the Resource Adequacy Capacity provided by the Dynamically Scheduled System Resource.

40.13.12.2 Non-Dynamically Scheduled System Resources.

For Non-Dynamically Scheduled System Resources, the Scheduling Coordinator must demonstrate that the Load Serving Entity upon which the Scheduling Coordinator is scheduling Demand has an allocation of import allocation at the import Scheduling Point under Section 40.5.2.2 of the ISO Tariff that is not less than the Resource Adequacy Capacity from the Non-Dynamically Scheduled System Resource. Eligibility as Resource Adequacy Capacity would be contingent upon a showing by the Scheduling Coordinator of the System Resource that it has secured transmission through any intervening Control Areas for the operating hours that cannot be curtailed for economic reasons or bumped by higher priority transmission.

With respect to Non-Dynamically Scheduled System Resources, any inter-temporal constraints such as multi-hour run blocks, must be explicitly identified in the monthly Resource Adequacy Plan, and no

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

# **ATTACHMENT 2**

# Errata to Attachment C of the IRRP Compliance Filing (ER 06-723-000)

**Filed on June 12, 2006** 

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 39

Superseding Original Sheet No. 39

Operator provides documentation to the ISO by November 1 of any year demonstrating that the MSS

Operator has secured generating capacity for the following calendar year at least equal to one hundred

and fifteen percent (115%), on an annual basis, of the peak Demand responsibility of the MSS Operator,

the ISO shall grant the exemption. Eligible generating capacity for such a demonstration may include on-

demand rights to Energy, peaking resources, and Demand reduction programs. The peak Demand

responsibility of the MSS Operator shall be equal to the annual peak Demand Forecast of the MSS Load

plus any firm power sales by the MSS Operator, less interruptible Loads, and less any firm power

purchases. Firm power for the purposes of this Section 4.9.16.2 shall be Energy that is intended to be

available to the purchaser without being subject to interruption or curtailment by the supplier except for

Uncontrollable Forces or emergency. To the extent that the MSS Operator demonstrates that it has

secured generating capacity in accordance with this Section 4.9.16.2., the Scheduling Coordinator for the

MSS Operator shall not be obligated to bear any share of the ISO's costs for any summer Demand

reduction program or for any summer reliability Generation procurement program pursuant to ISO Tariff

Section 42.1.8 for the calendar year for which the demonstration is made.

4.9.16.3 If the ISO is compensating Generating Units for Emissions Costs, Start-Up Fuel Costs

and Minimum Load Costs, and if MSS Operator charges the ISO for the Emissions Costs, Start-Up Fuel

Costs and Minimum Load Costs, of the Generating Units serving the Load of the MSS, then the

Scheduling Coordinator for the MSS shall bear its proportionate share of the total amount of those costs

incurred by the ISO based on the MSS gross metered Demand and exports and the Generating Units

shall be made available to the ISO through the submittal of Supplemental Energy bids. If the MSS

Operator chooses not to charge the ISO for the Emissions Costs, Start-Up Fuel Costs and Minimum Load

Costs of the Generating Units serving the Load of the MSS, then the Scheduling Coordinator for the MSS

shall bear its proportionate share of the total amount of those costs incurred by the ISO based on the

MSS's net metered Demand and exports. The MSS Operator shall make the election whether to charge

the ISO for these costs on an annual basis on November 1 for the following calendar year.

**4.9.16.4** The Scheduling Coordinator for the MSS shall be responsible for Transmission Losses, in

accordance with the ISO Tariff, only within the MSS, at any points of interconnection between the MSS

First Revised Sheet No. 84 Superseding Original Sheet No. 84

Effective: May 31, 2006

8.3.4 The ISO shall procure on a daily and hourly basis, each day, Regulation, Spinning, Non-Spinning and Replacement Reserves. The ISO shall procure Replacement Reserve on a longer-term basis pursuant to Section 42.1.3 if necessary to meet reliability criteria. The ISO Governing Board must approve all long-term Replacement Reserve contracts. The ISO shall contract for Voltage Support annually (or for such other period as the ISO may determine is economically advantageous) and on a daily or hourly basis as required to maintain System Reliability. The ISO shall contract annually (or for such other period as the ISO may determine is economically advantageous) for Black Start Generation.

#### 8.4 Technical Requirements for Providing Ancillary Services.

All Generating Units, System Units, Loads and System Resources providing Ancillary Services shall comply with the technical requirements set out in Sections 8.4.1 to 8.4.6.1 below relating to their operating capabilities, communication capabilities and metering infrastructure. No Scheduling Coordinator shall be permitted to submit a bid to the ISO for the provision of an Ancillary Service from a Generating Unit, System Unit, Load or System Resource, or to submit a Schedule for self-provision of an Ancillary Service from that Generating Unit, System Unit, Load or System Resource, unless the Scheduling Coordinator is in possession of a current certificate issued by the ISO confirming that the Generating Unit, System Unit, Load or System Resource complies with the ISO's technical requirements for providing the Ancillary Service concerned. Scheduling Coordinators can apply for Ancillary Services certificates in accordance with the ISO's Protocols for considering and processing such applications. The ISO shall have the right to inspect Generating Units, Loads or the individual resources comprising System Units and other equipment for the purposes of the issue of a certificate and periodically thereafter to satisfy itself that its technical requirements continue to be met. If at any time the ISO's technical requirements are not being met, the ISO may withdraw the certificate for the Generating Unit, System Unit, Load or System Resource concerned.

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

any, to facilitate delivery of Energy from Ancillary Services.

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 118

Effective: May 31, 2006

Superseding Original Sheet No. 118

set forth in Section 40.7, as the ISO's auction does not compensate the Scheduling Coordinator for the minimum energy output of Generating Units or System Units, if any, bidding to provide these services. Accordingly, except as set forth under Section 40.7, the Scheduling Coordinators shall adjust their schedules to accommodate the minimum outputs required by the Generating Units or System Units, if

Notwithstanding the foregoing, a Scheduling Coordinator who has sold or self-provided Regulation,
Spinning Reserve, Non-Spinning Reserve or Replacement Reserve capacity to the ISO in the Day-Ahead
Market shall be required to replace that capacity in whole or in part from the ISO if the scheduled selfprovision is decreased between the Day-Ahead and Hour-Ahead Markets, or if the Ancillary Service
associated with a Generating Unit, Curtailable Demand, or System Resource successfully bid in a DayAhead Ancillary Service Market is reduced in the Hour-Ahead Market, for any reason (other than the
negligence or willful misconduct of the ISO, or a Scheduling Coordinator's involuntary decrease in such
sold capacity or scheduled self-provision on the instruction of the ISO). The price for such replaced
Ancillary Service shall be the Market Clearing Price in the Hour-Ahead Market for the Ancillary Service for
the Settlement Period concerned for the Zone in which the Generating Units or other resources are
located. The ISO will purchase the Ancillary Service concerned from another Scheduling Coordinator in
the Hour-Ahead Market in accordance with the provisions of the ISO Tariff.

#### 8.8 Black Start.

- (a) Black Start shall meet the standards specified for Black Start in this Tariff and Appendix K; and
- (b) the ISO will Dispatch Black Start as required in accordance with the applicable Black Start agreement.

#### 8.9 [Not Used]

#### 8.10 Verification, Compliance Testing, and Audit of Ancillary Services.

Availability of both contracted and self-provided Ancillary Services shall be verified by the ISO by unannounced testing of Generating Units, Loads and System Resources, by auditing of response to ISO

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 222

Effective: May 31, 2006

Superseding Original Sheet No. 222

specific requirements of the ISO. The cost associated with each Dispatch instruction is broken into two

components:

a) the portion of the Energy payment at or below the Market Clearing Price

("MCP") for the Settlement Interval, and

b) the portion of the Energy payment above the MCP, if any, for the

Settlement Interval.

For each Settlement Interval, costs above the MCP incurred by the ISO for such Dispatch instructions

necessary as a result of a transmission facility Outage or in order to satisfy a location-specific requirement

in that Settlement Interval shall be payable to the ISO by the Participating Transmission Owner in whose

PTO Service Territory the transmission facility is located or the location-specific requirement arose. The

costs incurred by the ISO for such Dispatch instructions for reasons other than for a transmission facility

Outage or a location-specific requirement will be recovered in the same way as for Instructed Imbalance

Energy.

11.2.4.2.1.1 Allocation of Costs from Out-Of-Market calls to Condition 2 RMR Units.

All costs associated with energy provided by a Condition 2 RMR Unit operating other than according to a

dispatch notice issued under the RMR Contract shall be allocated in accordance with Section 11.2.4.2.1.

Until either the RMR Contract Counted MWh, Counted Service Hours or Counted Start-ups exceed the

relevant RMR Contract Service Limit, any cost incurred for energy provided under the RMR Contract

above the rate specified in equation 1a or 1b as set forth in Section 11.2.4.2 shall be allocated in

accordance with Section 11.2.4.2.1, not to the Responsible Utility.

Start-Up Costs for Condition 2 RMR Units providing service outside the RMR Contract, and any additional

Start-Up Cost associated with a Condition 2 RMR Unit providing service under the RMR Contract when

the unit's total service has exceeded an RMR Contract Service Limit but neither the RMR Contract

Counted MWh, Counted Service Hours or Counted Start-ups have exceeded the applicable RMR

Contract Service Limit, shall be invoiced in accordance with Section 40.12.6 and collected in accordance

with Section 40.12.1.

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

Superseding First Revised Sheet No. 229

Second Revised Sheet No. 229

Effective: May 31, 2006

THIRD REPLACEMENT VOLUME NO. I

11.2.10 **Payments Under Section 42.1 Contracts.** 

The ISO shall calculate and levy charges for the recovery of costs incurred under contracts entered into by the ISO under the authority granted in Section 42.1 in accordance with Section 42.1.8 of this ISO Tariff.

11.2.11 Obligation for FERC Annual Charges.

11.2.11.1 Each Scheduling Coordinator shall be obligated to pay for the FERC Annual Charges for its use of the ISO Controlled Grid to transmit electricity, including any use of the ISO Controlled Grid through Existing Contracts scheduled by the Scheduling Coordinator. Any FERC Annual Charges to be assessed by FERC against the ISO for such use of the ISO Controlled Grid shall be assessed against Scheduling Coordinators at the FERC Annual Charge Recovery Rate, as determined in accordance with this Section 11.2.11. Such assessment shall be levied monthly against all Scheduling Coordinators based upon each Scheduling Coordinator's metered Demand and exports.

11.2.11.2 Scheduling Coordinators may elect, each year, to pay the FERC Annual Charges assessed against them by the ISO either on a monthly basis or an annual basis. Scheduling Coordinators that elect to pay FERC Annual Charges on a monthly basis shall make payment for such charges within five (5) Business Days after issuance of the monthly invoice. The FERC Annual Charges will be issued to Market Participants once a month, on the first business day after the final market and Grid Management Charge invoices are issued for the trade month. Once the final FERC Annual Charge Recovery Rate is received from FERC in the Spring/Summer of the following year, a supplemental invoice will be issued. Scheduling Coordinators that elect to pay FERC Annual Charges on an annual basis shall make payment for such charges within five (5) Business Days after the ISO issues such supplemental invoice. Scheduling Coordinators that elect to pay FERC Annual Charges on an annual basis shall maintain either an Unsecured Credit Limit or shall maintain Financial Security in accordance with Section 12.1.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 232

Superseding Original Sheet No. 232

11.2.14 Credits and Debits of FERC Annual Charges Collected from Scheduling

Coordinators.

In addition to the surcharges or credits permitted under Sections 11.2.13 or 11.6.3.3 of this ISO Tariff, the

ISO shall credit or debit, as appropriate, the account of a Scheduling Coordinator for any over- or under-

assessment of FERC Annual Charges that the ISO determines occurred due to the error, omission, or

miscalculation by the ISO or the Scheduling Coordinator.

11.2.15 The ISO shall calculate the amount due from each UDC or MSS, or from a Scheduling

Coordinator delivering Energy for the supply of Gross Load not directly connected to the facilities of a

UDC or MSS, for the High Voltage Access Charge and Transition Charge in accordance with operating

procedures posted on the ISO Home Page. These charges shall accrue on a monthly basis.

11.2.16 Emissions and Start-Up Fuel Cost Charges.

The ISO shall calculate, account for and settle charges and payments for Emissions Costs and Start-Up

Fuel Costs in accordance with Sections 40.11 and 40.12 of this ISO Tariff.

11.2.17 The ISO shall calculate, charge and disburse all collected default Interest in accordance

with the ISO Tariff.

11.2.18 **Auditing** 

All of the data, information, and estimates the ISO uses to calculate these amounts shall be subject to the

auditing requirements of Section 10.2.11 of the ISO Tariff. The ISO shall calculate these amounts using

the software referred to in Section 11.4. 4except in cases of system breakdown when it shall apply the

procedures set out in 11.9a (Emergency Procedures).

11.3 Billing and Payment Process.

The ISO will calculate for each charge the amounts payable by the relevant Scheduling Coordinator,

Black Start Generator or Participating TO for each Settlement Period of the Trading Day, and the

amounts payable to that Scheduling Coordinator, Black Start Generator or Participating TO for each

charge for each Settlement Period of that Trading Day and shall arrive at a net amount payable for each

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 343

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 343

If a Generating Unit shut down according to this Section 27.1.1.6.1 cannot start up in time to meet its next

day's Energy Schedules, the ISO shall charge the Scheduling Coordinator for that Generating Unit the

lesser of the decremental reference price or the Market Clearing Price at the operating level set forth in

the relevant Energy Schedule for any deviation from the next day's Final Day-Ahead Schedules for

Energy caused by such shut-down. Charges set forth in this Section 27.1.1.6.1 shall not apply to (1)

Reliability Must-Run Units operating solely under their Reliability Must-Run Contracts or (2) units

operating during a Waiver Denial Period in accordance with the must-offer obligation.

The ISO shall apply the decremental reference prices to thermal Generating Units and to non-thermal

Generating Units. If a Generating Unit is instructed by the ISO to shut down to manage Intra-Zonal

Congestion, and is subsequently re-started, the Owner of that Generating Unit may invoice the ISO for

the lesser of (1) the Start-Up Costs incurred and (2) the costs of keeping the Generating Unit warm to

meet its Energy Schedules as set forth in Section 40.12.6. If the ISO Dispatches System Resources or

Dispatchable Loads to alleviate Intra-Zonal Congestion, the ISO shall Dispatch those resources in merit

order according to the resource's Day-Ahead or Hour-Ahead Adjustment Bid or Imbalance Energy bid.

The ISO shall only Redispatch Regulatory Must-Take or Regulatory Must-Run Generation, Intermittent

Resources, or Qualifying Facilities to manage Intra-Zonal Congestion after Redispatching all other

available and effective generating resources, including Reliability Must-Run Units.

27.1.1.6.1.1 Decremental Bid Reference Levels. Decremental bid reference levels shall be

determined for use in managing Intra-Zonal Congestion as set forth above in Section 27.1.1.6.1.

(a) Determination. Decremental bid reference levels shall be determined by applying the following

steps in order as needed:

1. Excluding proxy bids, mitigated bids, and bids used out of merit order for managing Intra-Zonal

Congestion, the accepted decremental bid, or the lower of the mean or the median of a resource's

accepted decremental bids if such a resource has more than one accepted decremental bid in

competitive periods over the previous 90 days for peak and off-peak periods, adjusted for daily changes

in fuel prices using gas price determined by Equation C1-8 (Gas) of the Schedules to the Reliability Must-

Run Contract for the relevant Service Area (San Diego Gas & Electric Company, Southern California

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 344

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 344

Edison Company, or Pacific Gas and Electric Company), or, if the resource is not served from one of

those three Service Areas, from the nearest of those three Service Areas. There will be a six-day time lag

between when the gas price used in the daily gas index is determined and when the daily gas index

based on that gas price can be calculated. For the purposes of this Section 27.1.1.6.1, to determine

whether accepted decremental bids over the previous 90 days were accepted during competitive periods,

the independent entity responsible for determining reference prices will apply a test to the prior 90-day

period. The test will require that the ratio of a unit's accepted out-of-sequence decremental bids (MWh)

for the prior 90 days to its total accepted decremental bids (MWh) for the prior 90 days be less than 50

percent. If this ratio is greater or equal to 50%, accepted decremental bids will be determined to have

been accepted in non-competitive periods and cannot be used to determine the decremental reference

price. This test would be applied each day on a rolling 90-day basis. One ratio would be calculated for

each unit with no differentiation for various output segments on the unit. Accepted and justified

decremental bids below the applicable soft cap, as set forth in Section 39.3 of this Tariff, will be included

in the calculation of reference prices;

2. A level determined in consultation with the Market Participant submitting the bid or bids at issue,

provided such consultation has occurred prior to the occurrence of the conduct being examined, and

provided the Market Participant has provided sufficient data in accordance with specifications provided by

the independent entity responsible for determining reference prices;

3. 90 percent of the unit's default Energy Bid determined monthly as set forth in Section 40.7.5

(based on the incremental heat rate submitted to the independent entity responsible for determining

reference prices, adjusted for gas prices, determined according to paragraph (a)(1) above, and the

variable O&M cost on file with the independent entity responsible for determining reference prices, or the

default O&M cost of \$6/MWh);

4. 90 percent of the mean of the economic Market Clearing Prices for the units' relevant location

during the lowest-priced 25 percent of the hours that the unit was dispatched or scheduled over the

previous 90 days for peak and off-peak periods, adjusted for changes in fuel prices determined according

to paragraph (a)(1) above; or

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 379 Superseding Original Sheet No. 379

Effective: May 31, 2006

be derived pursuant to Section 40.8.4.

For Curtailable Demand, the submitted Minimum Load Cost (\$/hr) is the cost incurred while operating the resource at reduced consumption after receiving a Dispatch Instruction. The submitted Minimum Load Cost must not be negative.

30.5

[Not Used]

30.6

RMR.

30.6.1

Procurement of Reliability Must-Run Generation by the ISO.

A Reliability Must-Run Contract is a contract entered into by the ISO with a Generator which operates a Generating Unit giving the ISO the right to call on the Generator to generate Energy and, only as provided in this Section 30.6.1, or as needed for Black Start or Voltage Support required to meet local reliability needs, or to procure Ancillary Services from Potrero or Hunter's Point power plants to meet operating criteria associated with the San Francisco local reliability area, to provide Ancillary Services from the Generating Units as and when this is required to ensure that the reliability of the ISO Controlled Grid is maintained.

30.6A.1.1 If the ISO, pursuant to Section 8.5.4(e), has elected to procure an amount of megawatts of its forecast needs for an Ancillary Service in the Hour-Ahead Markets and there is not an adequate amount of capacity bid into an Hour-Ahead Market for the ISO to procure such amount of megawatts of that Ancillary Service (excluding bids that exceed price caps imposed by the ISO or FERC), the ISO may call upon Reliability Must-Run Units under Must-Run Contracts to meet the remaining portion of that amount of megawatts for that Ancillary Service but only after accepting all available bids in the Hour-Ahead Market (including any unused bids that can be used to satisfy that particular Ancillary Services requirement under Section 8.2.3.6), except that the ISO shall not be required to accept bids that exceed price caps imposed by the ISO or the FERC.

**30.6A.1.2** If, at any time after the issuance of Final Day-Ahead Schedules for the Trading Day –

(1) the ISO determines that it requires more of an Ancillary Service than it has procured;

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

First Revised Sheet No. 398

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 398

33.1.2.3.2.3 Notification of Adjustment. Notification if the scheduled Demand was adjusted to

resolve Congestion.

**33.1.2.4** Usage Charges. The ISO shall notify each Scheduling Coordinator of the applicable

Usage Charge calculated in accordance with Section 27.1.2.

34 REAL-TIME.

34.1 Energy Bids.

34.1.1 Energy Bid Definition.

A single Energy Bid curve per resource per hour shall be used in: (a) the real-time Hourly Pre-Dispatch

as set forth in Section 34.3.0.2, and (b) Dispatch in the Real Time Markets. A corresponding operational

ramp rate as provided for in Section 30.4.6 shall be submitted along with the single Energy Bid curve and

shall be used in determination of Dispatch Instructions pursuant to Section 34.3.1(c).

The Energy Bid shall be a staircase price (\$/MWh) versus quantity (MW) curve of up to 10 segments.

The Energy Bid shall be submitted to the real-time Imbalance Energy market using the Supplemental

Energy Bid template. The Energy Bid curve shall be monotonically increasing, i.e., the price of a

subsequent segment shall be greater than the price of a previous segment. Subject to the foregoing,

sellers may increase or decrease bids in the ISO Real Time Market for capacity associated with those

parts of the bid curve that were not accepted in or before the Hour-Ahead Market. For capacity

associated with those parts of the bid curve previously accepted in or before the Hour-Ahead Market,

sellers may only submit lower bids in subsequent markets. Each Forbidden Operating Region must be

represented by only one bid segment.

34.1.2 Energy Bid Submission.

34.1.2.1 Real Time Market.

Bids shall be submitted for use in the real-time Hourly Pre-Dispatch Section 34.3.0.2(i) and the Real-Time

Economic Dispatch up to sixty-two (62) minutes prior to the Operating Hour. Resources required to offer

their Available Generation in accordance with Section 40.7.4 shall be required to submit Energy Bids for

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 399

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 399

1) all of their Available Generation and 2) any Ancillary Services capacity awarded or self-provided in the

Day-Ahead or Hour-Ahead Ancillary Services markets. In the absence of submitted bids, default bids will

be used for resources required to offer their Available Generation in accordance with Section 40.7.4.

Resources not required to offer their Available Generation in accordance with Section 40.7.4 that were

awarded or self-provided Ancillary Services capacity must submit an Energy Bid for no less than the

amount of awarded or self-provided Ancillary Services capacity. Resources not required to offer their

Available Generation in accordance with Section 40.7.4 may voluntarily submit Energy Bids. Submitted

Energy Bids shall be subject to the Damage Control Bid Cap as set forth in Section 39.1 and to the

Mitigation Measures set forth in Attachment A to Appendix P.

34.1.2.2 Real-Time Energy Bid Partition.

The portion of the single Energy Bid that corresponds to the high end of the resource's operating range.

shall be allocated to any awarded or self-provided Ancillary Services in the following order from higher to

lower capacity: (a) Regulation Up; (b) Spinning Reserve; (c) Non-Spinning Reserve; and (d)

Replacement Reserve. For resources providing Regulation Up, the upper regulating limit shall be used

if it is lower than the highest operating limit. The remaining portion of the Energy Bid (i.e. that portion

not associated with capacity committed to provide Ancillary Services) shall constitute a Bid to provide

Supplemental Energy.

34.1.2.3 Creation of the Real-Time Merit Order Stack.

34.1.2.3.1 Sources of Imbalance Energy.

The following Energy Bids will be considered in the creation of the real-time merit order stack for

Imbalance Energy:

(a) Supplemental Energy Bids;

(b) Ancillary Services Energy Bids (except for Regulation) submitted for specific Ancillary Services

for those resources which have been selected in the ISO's Ancillary Services auction to supply such

specific Ancillary Services; and

Ancillary Services Energy Bids (except for Regulation) submitted for specific Ancillary Services

(c)

FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I First Revised Sheet No. 401 Superseding Original Sheet No. 401

(d) recovering Operating Reserves utilized in real time:

(e) procuring additional Voltage Support required from resources beyond their power factor

ranges in real time; and

(f) Dispatching System Resources and Dispatchable Loads and increasing Generating

Units' output to manage Intra-Zonal Congestion in real time.

34.1.3 Requirement to Submit Energy Bids For Awarded or Self-Provided Ancillary

Services Capacity.

Scheduling Coordinators for resources that have been awarded or self-provide Regulation Up, Spinning

Reserve, Non-Spinning Reserve or Replacement Reserve capacity must submit a Supplemental Energy

bid for at least all the awarded or self-provided Ancillary Services capacity. To the extent a

Supplemental Energy bid is not so submitted for a gas-fired resource, the ISO shall calculate a

Supplemental Energy bid in accordance with Section 40.10.1 and insert that bid into the real-time

Imbalance Energy market. To the extent a Supplemental Energy bid is not so submitted for a non-gas-

fired resource, the ISO shall insert a bid of \$0/MWh into the real-time Imbalance Energy market.

34.2 Supplemental Energy Bids.

In addition to the Generating Units, Loads and System Resources which have been scheduled to provide

Ancillary Services in the Day-Ahead and Hour-Ahead Markets, the ISO may Dispatch Generating Units,

Loads or System Resources for which Scheduling Coordinators have submitted Supplemental Energy

bids. Supplemental Energy bids are available to the ISO for procurement and use for Imbalance Energy,

additional Voltage Support and Congestion Management in the Real Time Market.

34.2.1 Identification of Supplemental Energy Bids.

The upper portion of a Scheduling Coordinator's Energy Bid for a resource providing Spinning, Non-

Spinning, or Replacement Reserves that corresponds to the resource's available capacity up to the

highest operating limit, shall be allocated to any awarded or self-provided Ancillary Services in the

following order from higher to lower capacity: a) Regulation Up; b) Spinning Reserve; c) Non-Spinning

Reserve; and d) Replacement Reserve. For resources providing Regulation Up, the upper regulating limit

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Negative Decremental Energy Bids.

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

justification and refund.

39.3

Negative decremental Energy bids into the ISO Markets less than -\$30/MWh (minus thirty dollars per

MWh) shall not be eligible to set any Market Clearing Price and, if Dispatched, shall be paid as bid. If the

ISO Dispatches a bid below -\$30/MWh, the supplier must submit a detailed breakdown of the component

costs justifying the bid to the ISO and to the Federal Energy Regulatory Commission no later than seven

(7) days after the end of the month in which the bid was submitted. The ISO will treat such information as

confidential and will apply the procedures in Section 20.4 of this ISO Tariff with regard to requests for

disclosure of such information. The ISO shall pay suppliers for amounts in excess of \$-30/MWh after

those amounts have been justified.

ARTICLE V - RESOURCE ADEQUACY

40 RESOURCE ADEQUACY.

40.1 Must-Offer Obligations.

This Section 40 applies to all Scheduling Coordinators representing Load Serving Entities serving retail

Load within the ISO Control Area. For purposes of this Section 40 of the ISO Tariff, Load Serving Entity

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Effective: May 31, 2006

First Revised Sheet No. 463

Superseding Original Sheet No. 463

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 463A

is defined as: (1) any entity serving retail Load under the jurisdiction of the California Public Utilities

Commission (hereinafter "CPUC"), including an Electrical corporation under section 218 of the California Public Utilities Code (hereinafter "PUC"), an Electric service provider under section 218.3 of the PUC, and a Community choice aggregator under section 331.1 of the PUC (hereinafter collectively "CPUC Load").

Serving Entities"); and (2) all entities serving retail Load in the ISO Control Area not within the jurisdiction of the CPUC including: (i) a local publicly owned electric utility under section 9604 of the PUC; (ii) the

or the or the mentaling. (1) a result publicly entried disease during and or escaping estate the first escaping

State Water Resources Development System commonly known as the State Water Project; and (iii) any

Federal entities, including but not limited to Federal Power Marketing Authorities, that serve retail Load

(hereafter collectively "non-CPUC Load Serving Entities"). Load Serving Entity shall not include customer

generation located on the customer's site or providing electric service through arrangements authorized by Section 218 of the PUC, if the customer generation, or the Load it serves, meets one of the following

criteria: (i) it takes standby service from the electrical corporation on a commission-approved rate

schedule that provides for adequate backup planning and operating reserves for the standby customer

class; (ii) it is not physically interconnected to the electric transmission or distribution grid, so that if the

customer generation fails, backup electricity is not supplied from the electricity grid; or (iii) there is

physical assurance that the Load served by the customer generation will be curtailed concurrently and

commensurately with an outage of the customer generation.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 463D

Effective: May 12, 2006

40.2.4 Reporting of Enforcement Actions.

To the extent that the CPUC or other Local Regulatory Authority has not adopted rules allowing public access to records or information regarding action taken for violations of its Resource Adequacy policies and rules, the Scheduling Coordinator for each Load Serving Entity serving Load in the ISO Control Area notified of a potential failure to comply by the ISO and not resolved under 40.2.3 must report to the ISO within thirty (30) days of any action taken by the appropriate Local Regulatory Authority in response to the deficiency notification.

40.2.5 Compliance with Submission Obligation.

Scheduling Coordinators representing Load Serving Entities Serving Load in the ISO Control Area that fail to provide the ISO with annual or monthly Resource Adequacy Plans as set forth in this ISO Tariff shall be subject to Section 37.6.1 of the ISO Tariff.

Issued by: Charles F. Robinson, Vice President and General Counsel

Original Sheet No. 463M

Effective: May 31, 2006

40.6A.6 Resource Adequacy Resource Obligation Process.

Resource Adequacy Resources may seek a waiver of the obligation to offer all Available Generation, as set forth in Section 40.6A.4 of this ISO Tariff, for one or more of their units. All Resource Adequacy Resources obligated under their respective Resource Adequacy Plans that have not submitted Day-Ahead Energy Schedules will be deemed to have requested a waiver, either implicitly or explicitly, of the obligation to offer all Available Generation. If conditions permit, the ISO may, at its sole discretion, grant waivers and allow a Resource Adequacy Resource to remove one or more Generating Units from service and, in doing so, the ISO will first grant waivers to FERC Must-Offer Generators, on a non-discriminatory basis, that are not also Resource Adequacy Resources, and then, if permissible, the ISO may grant waivers to Resource Adequacy Resources on a non-discriminatory basis.

The hours for which waivers are not granted shall constitute Waiver Denial Periods. A Waiver Denial Period shall be extended as necessary to accommodate the unit minimum up and down times. Units shall be on-line in real time during Waiver Denial Periods, or they will be in violation of the availability. Exceptions shall be allowed for verified forced outages or as otherwise set forth in Section 40.6A.5. The ISO may revoke waivers as necessary due to outages, changes in Load forecasts, or changes in system conditions. The ISO shall determine which waiver(s) will be revoked, and shall notify the relevant Scheduling Coordinator(s). The ISO shall inform a Resource Adequacy Resource that its Waiver request has been approved, disapproved or revoked, and shall provide the Resource Adequacy Resource with the reason(s) for the decision, which reasons shall be non-discriminatory apart from the status of whether the unit is a Resource Adequacy Resource. The ISO will: (1) notify Resource Adequacy Resources of the ISO decisions on pending Waiver requests received no later than 10:00 a.m. (beginning of Hour Ending 11) no later than 11:30 a.m. (middle of Hour Ending 12) on the day before the operating day for which the Waivers are requested; (2) at any time but no later than 11:30 a.m. on the following day, notify Resource

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

Original Sheet No. 4630

Effective: May 31, 2006

THIRD REPLACEMENT VOLUME NO. I Energy above minimum load due to an ISO Dispatch Instruction, the Resource Adequacy Resource shall recover its Un-Recovered Minimum Load Costs as set forth in this Section and its bid costs, as set forth in Section 11.2.4.1.1.1, for any such Settlement Intervals during hours within a Waiver Denial Period. irrespective of deviations outside of its Tolerance Band. Subject to the foregoing eligibility restrictions set forth in this section, the ISO shall guarantee recovery of the Minimum Load Costs of an otherwise eligible Resource Adequacy Resource for each Settlement Interval during hours within a Waiver Denial Period as follows: (1) First, ISO will pre-dispatch for real time the minimum load Energy from Resource Adequacy Resources that have been denied waivers for each hour within a Waiver Denial Period: (2) This minimum load Energy will be accounted as Instructed Imbalance Energy for each Settlement Interval within the relevant hour and be settled at the Resource-Specific Settlement Interval Ex Post Price; (3) To the extent the Instructed Imbalance Energy payments are not sufficient to cover the generator's Minimum Load Cost as defined in Section 40.6B.3 of this ISO Tariff, the generator will also receive an uplift payment for its Un-Recovered Minimum Load Cost compensation for the relevant eligible Settlement Intervals of hours during the Waiver Denial Period that the unit runs at minimum load in compliance with the Resource Adequacy offer obligation; and (4) To the extent the Generator is dispatched for real time Imbalance Energy above its minimum load for any Dispatch Interval within an hour during the Waiver Denial Period,

#### 40.6B.2 Payments for Imbalance Energy above the Minimum Operating Level for Generating Units Eligible to Be Paid Minimum Load Costs.

the Generator will be eligible for Bid Cost Recovery, as set forth in Section 11.2.4.1.1.1.

When, on a Settlement Interval basis, a Resource Adequacy Resource's Generating Unit or System Units for which the MSS Operator has contracted to supply Resource Adequacy Capacity to another entity produces a quantity of Energy above the unit's minimum operating level due to an ISO Dispatch Instruction, the Resource Adequacy Resource shall recover Un-Recovered Minimum Load Costs as set forth in Section 40.6B.1 and its bid costs, based on the ISO's instruction, as set forth in Section 11.2.4.1.1.1, for any such Settlement Intervals during hours within a Waiver Denial Period, irrespective of deviations outside of its Tolerance Band.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 463P

Effective: May 31, 2006

40.6B.3 Payments for Imbalance Energy for the Minimum Operating Level for Generating

Units Eligible to Be Paid Minimum Load Costs.

Resource Adequacy Resources operating at or near its operating level during a Waiver Denial Period either: (1) without a forward Schedule for its minimum operating level Energy or (2) with a Schedule to a special-purpose Demand ID for the sole purpose of Scheduling the minimum operating level Energy shall be paid its Un-Recovered Minimum Load Costs subject to eligibility as set forth in Section 40.6B.1 and not be paid an additional amount by the ISO for Energy actually delivered.

40.6B.4 Un-Recovered Minimum Load Costs.

The Un-Recovered Minimum Load Costs for each hour of Waiver Denial Period shall be calculated as the difference between: (1) a resource's Minimum Load Costs as calculated in this Section for the same Settlement Interval and (2) the Imbalance Energy payment for a resource's minimum load energy in the Settlement Interval. If the Imbalance Energy payment for minimum load energy exceeds the Minimum Load Costs, then there are no Un-Recovered Minimum Load Costs. The Minimum Load Costs shall be calculated as the sum, for all eligible hours in the Waiver Denial Period and Settlement Periods in which the unit generated in response to an ISO Dispatch Instruction, of: (1) the product of the unit's average heat rate (as determined by the ISO from the data provided in accordance with Section 40.10) at the unit's relevant minimum operating level or Dispatchable minimum operating level as set forth in the ISO Master File or as amended through notification to the ISO via SLIC and the gas price determined by Equation C1-8 (Gas) of the Schedules to the Reliability Must-Run Contract for the relevant Service Area (San Diego Gas & Electric Company, Southern California Gas Company, or Pacific Gas and Electric Company), or, if the Resource Adequacy Resource is not served from one of those three Service Areas: and (2) the product of the unit's relevant minimum operating level or Dispatchable minimum operating level as set forth in the ISO Master File or as amended through notification to the ISO via SLIC; and \$6.00/MWh.

40.6B.5 Allocation of Un-Recovered Minimum Load Costs.

For each Settlement Interval, the ISO shall determine that the Un-Recovered Minimum Load Costs for

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 463Q

Resource Adequacy Resources, as applicable, for each unit operating during a Waiver Denial Period are

due to (1) local reliability requirements, (2) zonal requirements, or (3) Control Area-wide requirements.

For each such month, the ISO shall sum the Un-Recovered Minimum Load Costs and shall allocate those

costs as follows:

(1) if the Generating Unit or System Unit for which the MSS Operator has contracted to

supply Resource Adequacy Capacity to another entity was operating to meet local reliability

requirements, the incremental locational cost shall be allocated to the Participating TO in whose

PTO Service Territory the unit is located, or, where the unit is located outside the PTO Service

Territory of any Participating TO, to the Participating TO or Participating TOs whose PTO Service

Territory or Territories are contiguous to the Service Area in which the Generating Unit or System

Unit is located, in proportion to the benefits that each such Participating TO receives, as

determined by the ISO. Where the costs allocated under this section are allocated to two or more

Participating TOs, the ISO shall file the allocation under Section 205 of the Federal Power Act.

For the purposes of this section, the incremental locational cost shall be the additional costs

associated with committing and operating a particular unit or units to meet a local reliability

requirement over the costs of a less expensive unit or units that would have been committed and

operated absent the local reliability requirement. If a unit is committed in real-time for local

reliability, its Un-Recovered Minimum Load costs shall be considered incremental locational

costs. Costs allocated under this part (1) shall be considered Reliability Services Costs.

(2) if the Generating Unit or System Unit for which the MSS Operator has contracted to

supply Resource Adequacy Capacity to another entity was operating due to Inter-Zonal

Congestion, the Un-Recovered Minimum Load Costs shall be allocated on a monthly basis to

each Scheduling Coordinator in the constrained Zone based on the ratio of that Scheduling

Coordinator's monthly Demand to the sum of all Scheduling Coordinator's monthly Demand in

that Zone;

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

Effective: May 31, 2006

- (3) if the Generating Unit or System Unit for which the MSS Operator has contracted to supply Resource Adequacy Capacity to another entity was operating to satisfy an ISO Control Area-wide need, the ISO shall allocate the Un-Recovered Minimum Load Costs in the following way:
  - a. first, to the monthly absolute total of all Net Negative Uninstructed Deviation (determined for each Settlement Interval based on Final Hour-Ahead Schedules) at a per-MWh rate that shall not exceed a figure that is determined by dividing the total Un-Recovered Minimum Load Cost in that month by the sum of the minimum loads for Generating Units operating under Waiver Denial Periods in that month;
  - b. finally, all remaining costs not allocated per (a) shall be allocated to each Scheduling Coordinator in proportion to the sum of that Scheduling Coordinator's monthly Control Area Gross Load and Demand within California outside the ISO Control Area that is served by exports to the monthly sum of the ISO Control Area Gross Load and the projected Demand within California outside the ISO Control Area that is served by exports from the ISO Control Area of all Scheduling Coordinators.

#### 40.6B.6 Payment of Available Capacity under the Resource Adequacy Obligation.

Available Generation of Resource Adequacy Resources that is required to be offered to the Real Time Market, if dispatched by the ISO, shall be settled as follows: the actual amount of the dispatched Energy shall be settled at the applicable Instructed Imbalance Energy Market Clearing Price. Un-Recovered Minimum Load Cost compensation shall be paid for all otherwise eligible hours within the Waiver Denial Period that the unit generated above minimum load in compliance with ISO Dispatch Instructions.

#### 40.7 FERC Must-Offer Obligations.

#### 40.7.1 Applicability.

The requirements of Section 40.7 shall apply to (a) all Participating Generators, and (b) all persons,

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION
FERC ELECTRIC TARIFF
First Revised Sheet No. 464
THIRD REPLACEMENT VOLUME NO. I
Superseding Original Sheet No. 464
regardless of whether the person is a "public utility" as defined in Section 201 of the Federal Power Act,
that own or control one or more non-hydroelectric Generating Units or System Units or System Resources
located in California from which energy or capacity is either: (i) sold through any market operated by the
ISO, or (ii) transmitted over the ISO Controlled Grid. Each person described in this Section 40.7.1 is
referred to in the ISO Tariff as a "FERC Must-Offer Generator." The requirements of this Section 40.7
shall apply to all non-hydroelectric Generating Units located in California that are owned or controlled by a
FERC Must-Offer Generator.

#### 40.7.2 Available Generation.

For the purposes of Section 40.7, a FERC Must-Offer Generator's "Available Generation" from a non-hydroelectric Generating Unit shall be: (a) the Generating Unit's maximum operating level adjusted for any outages or reductions in capacity reported to the ISO in accordance with Section 9.3.9 or 40.7.3 and for any limitations on the Generating Unit's operation under applicable law, including contractual obligations, which shall be reported to the ISO, (b) minus the Generating Unit's scheduled operating level as identified in the ISO's Final Hour-Ahead Schedule, (c) minus the Generating Unit's or System Unit's capacity committed to provide Ancillary Services to the ISO either through the ISO's Ancillary Services market or through self-provision by a Scheduling Coordinator, and (d) minus the capacity of the Generating Unit committed to deliver Energy or provide Operating Reserve to the FERC Must-Offer Generator's Native Load.

#### 40.7.3 Reporting Requirements for Non-Participating Generators.

So that the ISO may determine the Available Generation of all FERC Must-Offer Generators, FERC Must-Offer Generators that are not Participating Generators shall be required to file with the ISO, for each non-hydroelectric Generating Unit located in California they own or control: (i) the Generating Unit's minimum operating level; (ii) the Generating Unit's maximum operating level; and (iii) the Generating Unit's ramp rates at all operating levels; and (iv) such other information the ISO determines is necessary to determine available generation and to dispatch FERC Must-Offer Generators. In addition, FERC Must-Offer Generators that are not Participating Generators must, consistent with the notification obligations of Participating Generators and in order to comply with the intent of this Section 40.7, notify the ISO, as

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006 Effective: May 31, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 464A

soon as practicable, of any Planned Maintenance Outages, Forced Outages, Force Majeure Event

outages or any other reductions in their maximum operating

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. 1

First Revised Sheet No. 465

Superseding Original Sheet No. 465

levels or Resource Adequacy Capacity during the relevant month.

40.7.4 Obligation To Offer Available Generation.

Except as set forth in Sections 40.7.5 and 40.7.6, all FERC Must-Offer Generators shall offer to sell in the

ISO's Real Time Market for Imbalance Energy, in all hours, all their Available Generation as defined in

Section 40.7.2.

40.7.5 Submission of Bids and Applicability of the Proxy Price.

For each Operating Hour, FERC Must-Offer Generators shall submit Supplemental Energy bids for all of

their Available Generation to the ISO in accordance with Section 34.2. In addition, the ISO shall calculate

for each gas-fired FERC Must-Offer Generator, in accordance with Section 40.10.1, a Proxy Price for

Energy.

If a FERC Must-Offer Generator fails to submit a Supplemental Energy bid for any portion of its Available

Generation for any Dispatch Interval, the unbid quantity of the FERC Must-Offer Generator's Available

Generation will be deemed by the ISO to be bid at the FERC Must-Offer Generator's Proxy Price for that

hour if: (i) the applicable Generating Unit is a gas-fired unit and (ii) the FERC Must-Offer Generator has

provided the ISO with adequate data in compliance with Sections 40.7.7 and 40.7.3 for the applicable

Generating Unit. For all other Generating Units owned or controlled by a FERC Must-Offer Generator.

the unbid quantity of the FERC Must-Offer Generator's Available Generation will be deemed by the ISO

to be bid and settled in accordance with Section 11.2. In order to dispatch resources providing Imbalance

Energy in proper merit order, the ISO will insert this unbid quantity into the FERC Must-Offer Generator's

Supplemental Energy bid curve above any lower-priced segments of the bid curve and below any higher-

priced segments of the bid curve as necessary to maintain a non-decreasing bid curve over the entire

range of the FERC Must-Offer Generator's Available Generation.

40.7.6 **FERC Must-Offer Obligation Process.** 

FERC Must-Offer Generators may seek a waiver of the obligation to offer all available capacity, as set

forth in Section 40.7.4 of this ISO Tariff, for one or more of their Generating Units or System Units.

All FERC Must-Offer Generators obligated under the must-offer obligation that have not submitted Day-

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 465A

Ahead Energy Schedules will be deemed to have requested a waiver, either implicitly or explicitly, of the

obligation to offer all Available Generation. If conditions permit, the ISO may, at its sole

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 466

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 466

discretion, grant waivers and allow a FERC Must-Offer Generator to remove one or more Generating

Units or System Units from service. In doing so, the ISO will first grant waivers to FERC Must-Offer

Generators, on a non-discriminatory basis, that are not also Resource Adequacy Resources and then, if

permissible, the ISO may grant waivers to Resource Adequacy Resources on a non-discriminatory basis.

The hours for which waivers are not granted shall constitute Waiver Denial Periods. A Waiver Denial

Period shall be extended as necessary to accommodate Generating Unit minimum up and down times.

Generating Units shall be on-line in real time during Waiver Denial Periods, or they will be in violation of

the must-offer obligation. Exceptions shall be allowed for verified forced outages. The ISO may revoke

waivers as necessary due to outages, changes in Load forecasts, or changes in system conditions. The

ISO shall determine which waiver(s) will be revoked, and shall notify the relevant Scheduling

Coordinator(s). To the extent conditions permit, the ISO will revoke the waivers of Resource Adequacy

Resources prior to revoking the waivers of other FERC Must-Offer Generators. The ISO shall inform a

FERC Must-Offer Generator that its Waiver request has been approved, disapproved or revoked, and

shall provide the FERC Must-Offer Generator with the reason(s) for the decision, which reasons shall be

non-discriminatory. The ISO will: (1) notify FERC Must-Offer Generators of the ISO decisions on pending

Waiver requests received no later than 10:00 a.m. (beginning of Hour Ending 11) no later than 11:30 a.m.

(middle of Hour Ending 12) on the day before the operating day for which the Waivers are requested; (2)

at any time but no later than 11:30 a.m. on the following day, notify FERC Must-Offer Generators of the

ISO decisions on Waiver requests that were submitted to the ISO after 10:00 a.m. (beginning of Hour

Ending 11) on the day before; (3) end Waiver Denial Periods at any time; and (4) revoke Waivers at any

time, while making best attempts to revoke a Waiver at least 90 minutes prior to the time a unit would be

required to be on-line generating at its Pmin.

40.8 Recovery of Minimum Load Costs By FERC Must-Offer Generators.

40.8.1 Eligibility.

Except as set forth below, Generating Units shall be eligible to recover Minimum Load Costs during

Waiver Denial Periods. Units from FERC Must-Offer Generators that incur Minimum Load Costs during

hours for which the ISO has granted to them a waiver shall not be eligible to recover such costs for such

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 466A

hours. When a FERC Must-Offer Generator has a Final Hour-Ahead Energy Schedule, the FERC Must-

Offer Generator shall not be eligible to recover Minimum Load Costs for any such hours within a Waiver

Denial Period. When, on a 10-minute Settlement Interval basis, a FERC Must-Offer Generator generating

at minimum operating level in compliance with the must-offer obligation, produces a quantity of Energy

that varies from its minimum

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF First Revised Sheet No. 467 THIRD REPLACEMENT VOLUME NO. I Superseding Original Sheet No. 467 operating level by more than the Tolerance Band, the FERC Must-Offer Generator shall not be eligible to recover Minimum Load Costs for any such Settlement Intervals during hours within a Waiver Denial Period. When, on a Settlement Interval basis, a FERC Must-Offer Generator's resource produces a quantity of Energy above minimum load due to an ISO Dispatch Instruction, the FERC Must-Offer Generator shall recover its Minimum Load Costs as set forth in this Section and its bid costs, as set forth in Section 11.2.4.1.1.1, for any such Settlement Intervals during hours within a Waiver Denial Period, irrespective of deviations outside of its Tolerance Band. Subject to the foregoing eligibility restrictions set forth in this section, the ISO shall guarantee recovery of the Minimum Load Costs of an otherwise eligible FERC Must-Offer Generator for each Settlement Interval during hours within a Waiver Denial Period as follows: (1) First, ISO will pre-dispatch for real time the minimum load Energy from FERC Must-Offer Generators that have been denied waivers for each hour within a Waiver Denial Period; (2) This minimum load Energy will be accounted as Instructed Imbalance Energy for each Settlement Interval within the relevant hour and be settled at the Resource-Specific Settlement Interval Ex Post Price; (3) The generator's Minimum Load Cost as defined in Section 40.8.4 of this ISO Tariff, the generator will also receive a payment for its Minimum Load Cost compensation for the relevant eligible Settlement Intervals of hours during the Waiver Denial Period that the Generating Unit runs at minimum load in compliance with the must-offer obligation; and (4) To the extent the Generator is dispatched for real time Imbalance Energy above its minimum load for any Dispatch Interval within an hour during the Waiver Denial Period. the Generator will be eligible for Bid Cost Recovery, as set forth in Section 11.2.4.1.1.1.

### 40.8.2 Payments for Imbalance Energy Above the Minimum Operating Level for Generating Units Eligible to Be Paid Minimum Load Costs.

When, on a Settlement Interval basis, a FERC Must-Offer Generator's Generating Unit produces a quantity of Energy above the Generating Unit's minimum operating level due to an ISO Dispatch Instruction, the FERC Must-Offer Generator shall recover Minimum Load Costs and its bid costs, based on the ISO's instruction, as set forth in Section 11.2.4.1.1.1, for any such Settlement Intervals during hours within a Waiver Denial Period, irrespective of deviations outside of its Tolerance Band.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006 Effective: May 31, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 468

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 468

40.8.3 Payments for Imbalance Energy for the Minimum Operating Level for Generating

Units Eligible to Be Paid Minimum Load Costs.

A Generating Unit operating at or near its minimum operating level during a Waiver Denial Period either

(1) without a forward Schedule for its minimum operating level Energy or (2) with a Schedule to a special-

purpose Demand ID for the sole purpose of Scheduling the minimum operating level Energy shall be

paid, in addition to being paid its Minimum Load Costs subject to eligibility as set forth in Section 40.8.1,

an amount equal to the Resource Specific Settlement Interval Ex Post Price times the amount of Energy

actually delivered.

40.8.4 Minimum Load Costs.

The Minimum Load Costs shall be calculated as the sum, for all eligible hours in the Waiver Denial Period

and Settlement Periods in which the unit generated in response to an ISO Dispatch Instruction, of: (1) the

product of the unit's average heat rate (as determined by the ISO from the data provided in accordance

with Section 40.10) at the unit's relevant minimum operating level or Dispatchable minimum operating

level as set forth in the ISO Master File or as amended through notification to the ISO via SLIC and the

gas price determined by Equation C1-8 (Gas) of the Schedules to the Reliability Must-Run Contract for

the relevant Service Area (San Diego Gas & Electric Company, Southern California Gas Company, or

Pacific Gas and Electric Company), or, if the FERC Must-Offer Generator is not served from one of those

three Service Areas; and (2) the product of the unit's relevant minimum operating level or Dispatchable

minimum operating level as set forth in the ISO Master File or as amended through notification to the ISO

via SLIC; and \$6.00/MWh.

40.8.5 [Not Used]

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 469 Superseding Original Sheet No. 469

40.8.6 Allocation of Minimum Load Costs.

For each Settlement Interval, the ISO shall determine that the Minimum Load Costs for each FERC Must Offer Generator unit operating during a Waiver Denial Period are due to (1) local reliability requirements, (2) zonal requirements, or (3) Control Area-wide requirements. For each such month, the ISO shall sum the Settlement Interval Minimum Load Costs and shall allocate those costs as follows:

- (1) if the Generating Unit was operating to meet local reliability requirements, the incremental locational cost shall be allocated to the Participating TO in whose PTO Service Territory the Generating Unit is located, or, where the Generating Unit is located outside the PTO Service Territory of any Participating TO, to the Participating TO or Participating TOs whose PTO Service Territory or Territories are contiguous to the Service Area in which the Generating Unit is located, in proportion to the benefits that each such Participating TO receives, as determined by the ISO. Where the costs allocated under this section are allocated to two or more Participating TOs, the ISO shall file the allocation under Section 205 of the Federal Power Act. For the purposes of this section, the incremental locational cost shall be the additional costs associated with committing and operating a particular unit or units to meet a local reliability requirement over the costs of a less expensive unit or units that would have been committed and operated absent the local reliability requirement. If a unit is committed in real-time for local reliability, its Minimum Load costs shall be considered incremental locational costs. Costs allocated under this part (1) shall be considered Reliability Services Costs.
- (2) if the Generating Unit was operating due to Zonal requirements, the Minimum Load Costs shall be allocated on a monthly basis to each Scheduling Coordinator in the constrained Zone based on the ratio of that Scheduling Coordinator's monthly Demand to the sum of all Scheduling Coordinator's monthly Demand in that Zone;

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF
THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 470 Superseding Original Sheet No. 470

(3) if the Generating Unit was operating to satisfy an ISO Control Area-wide need, the ISO shall allocate the Minimum Load Costs in the following way:

- a. first, to the monthly absolute total of all Net Negative Uninstructed Deviation (determined for each Settlement Interval based on Final Hour-Ahead Schedules) at a per-MWh rate that shall not exceed a figure that is determined by dividing the total Minimum Load Cost in that month by the sum of the minimum loads for Generating Units operating under Waiver Denial Periods in that month;
- b. finally, all remaining costs not allocated per (a) shall be allocated to each Scheduling Coordinator in proportion to the sum of that Scheduling Coordinator's monthly Control Area Gross Load and Demand within California outside the ISO Control Area that is served by exports to the monthly sum of the ISO Control Area Gross Load and the projected Demand within California outside the ISO Control Area that is served by exports from the ISO Control Area of all Scheduling Coordinators.

#### 40.8.7 Payment Of Available Generation Under The FERC Must-Offer Obligation.

Available Generation that is required to be offered to the Real-Time Market, if dispatched by the ISO, shall be settled as follows: the actual amount of the dispatched Energy shall be settled at the applicable Instructed Imbalance Energy Market Clearing Price. Minimum Load Cost compensation shall be paid for all otherwise eligible hours within the Waiver Denial Period, as defined in Section 40.8.1, that the unit generated Energy above minimum operating level in compliance with ISO Dispatch Instructions.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I

40.9 Criteria for Issuing Must-Offer Waivers.

Original Sheet No. 470A

The ISO shall grant waivers so as to: (1) provide sufficient on-line generating capacity to meet operating reserve requirements; and (2) account for other physical operating constraints, including Generating Unit or System Unit minimum up and down times. Subject to the exceptions for Short Start Resource Adequacy Resources as identified in this ISO Tariff, the ISO shall grant, deny or revoke waivers using a security-constrained unit commitment software application to minimize start-up and Minimum Load Costs.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 471

Superseding Original Sheet No. 471

40.10 Data. Requirement of FERC Must-Offer Generators to File Heat Rate and Emissions Rate

Resource Adequacy Resources and FERC Must-Offer Generators, as defined in this ISO Tariff, that own or control gas-fired Generating Units or System Units must file with the ISO and the FERC, on a confidential basis, the heat rates and emissions rates for each gas-fired Generating Unit or System Unit that they own or control. Heat rate and emissions rate data shall be provided in the format specified by the ISO as posted on the ISO Website. Heat rate data provided to comply with this requirement shall not include start-up or minimum load fuel costs. Resource Adequacy Resources and FERC Must-Offer Generators must also file periodic updates of this data upon the direction of either FERC or the ISO. The ISO will treat the information provided to the ISO in accordance with this section as confidential and will apply the procedures in Section 20.4 of this ISO Tariff with regard to requests for disclosure of such information.

#### 40.10.1 Calculation of the Proxy Price.

The ISO shall calculate each day separate Proxy Prices for each gas-fired Generating Unit or System Unit owned or controlled by a Resource Adequacy Resource or FERC Must-Offer Generator by applying the filed heat rates for those Generating Units or System Units to a daily proxy figure for natural gas costs with an additional \$6.00/MWh allowed for operations and maintenance expenses. The proxy figures for natural gas costs shall be based on the most recent data available and shall be posted on the ISO Website by 8:00 AM on the day prior to which the figures will be used for calculation of the Proxy Price.

#### 40.11 Emissions Costs.

#### 40.11.1 Obligation to Pay Emissions Cost Charges.

Each Scheduling Coordinator shall be obligated to pay a charge which will be used to pay the verified Emissions Costs incurred by a Resource Adequacy Resource or FERC Must-Offer Generator as a direct result of an ISO Dispatch Instruction, in accordance with this Section 40. The ISO shall levy this administrative charge (the "Emissions Cost Charge") each month, against all Scheduling Coordinators based upon each Scheduling Coordinator's Control Area Gross Load and Demand within California

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION
FERC ELECTRIC TARIFF
THIRD REPLACEMENT VOLUME NO. I
Original Sheet No. 471A
outside of the ISO Control Area that is served by exports from the ISO Control Area. Scheduling

Coordinators shall make payment for all Emissions Cost Charges in accordance with the ISO Payments Calendar.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006 Effective: May 31, 2006

All Emissions Cost Charges received by the ISO shall be deposited in the Emissions Cost Trust Account.

The Emissions Cost Trust Account shall be an interest-bearing account separate from all other accounts

maintained by the ISO, and no other funds shall be commingled in it at any time.

40.11.3 Rate For the Emissions Cost Charge.

The rate at which the ISO will assess the Emissions Cost Charge shall be at the projected annual total of

all Emissions Costs incurred by Resource Adequacy Resources and FERC Must-Offer Generators as a

direct result of ISO Dispatch Instruction, adjusted for interest projected to be earned on the monies in the

Emissions Cost Trust Account, divided by the sum of the Control Area Gross Load and the projected

Demand within California outside of the ISO Control Area that is served by exports from the ISO Control

Area of all Scheduling Coordinators for the applicable year ("Emissions Cost Demand"). The initial rate

for the Emissions Cost Charge, and all subsequent rates for the Emissions Cost Charge, shall be posted

on the ISO Website.

40.11.4 Adjustment of the Rate For the Emissions Cost Charge.

The ISO may adjust the rate at which the ISO will assess the Emissions Cost Charge on a monthly basis,

as necessary, to reflect the net effect of the following:

(a) the difference, if any, between actual Emissions Cost Demand and projected Emissions

Cost Demand;

(b) the difference, if any, between the projections of the Emissions Costs incurred by

Resource Adequacy Resources or FERC Must-Offer Generators as a direct result of ISO

Dispatch Instructions and the actual Emissions Costs incurred by Resource Adequacy

Resources or FERC Must-Offer Generators as a direct result of ISO Dispatch Instructions

as invoiced to the ISO and verified in accordance with this Section 40.11; and

(c) the difference, if any, between actual and projected interest earned on funds in the

**Emissions Cost Trust Account.** 

### CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 472A

The adjusted rate at which the ISO will assess the Emissions Cost Charge shall take effect on a

prospective basis on the first day of the next calendar month. The ISO shall publish all data and

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION
FERC ELECTRIC TARIFF
First Revised Sheet No. 473
THIRD REPLACEMENT VOLUME NO. I
Superseding Original Sheet No. 473
calculations used by the ISO as a basis for such an adjustment on the ISO Website at least five (5) days
in advance of the date on which the new rate shall go into effect.

## 40.11.5 Credits and Debits of Emissions Cost Charges Collected from Scheduling Coordinators.

In addition to the surcharges or credits permitted under Section 11.6.3.3 of this ISO Tariff, the ISO may credit or debit, as appropriate, the account of a Scheduling Coordinator for any over- or under-assessment of Emissions Cost Charges that the ISO determines occurred due to the error, omission, or miscalculation by the ISO or the Scheduling Coordinator.

#### 40.11.6 Submission of Emissions Cost Invoices.

Scheduling Coordinators for Resource Adequacy Resources or FERC Must-Offer Generators that incur Emissions Costs as a direct result of an ISO Dispatch Instruction may submit to the ISO an invoice in the form specified on the ISO Website (the "Emissions Cost Invoice") for the recovery of such Emissions Costs. Emissions Cost Invoices shall not include any Emissions Costs specified in an RMR Contract for a unit owned or controlled by a FERC Must-Offer Generator. All Emissions Cost Invoices must include a copy of all final invoice statements from air quality districts demonstrating the Emissions Costs incurred by the applicable Generating Unit or System Unit, and such other information as the ISO may reasonably require to verify the Emissions Costs incurred as a direct result of an ISO Dispatch Instruction.

#### 40.11.7 Payment of Emissions Cost Invoices.

The ISO shall pay Scheduling Coordinators for all Emissions Costs submitted in an Emissions Cost Invoice and demonstrated to be a direct result of an ISO Dispatch Instruction. If the Emissions Costs indicated in the applicable air quality districts' final invoice statements include emissions produced by operation not resulting from ISO Dispatch Instructions, the ISO shall pay an amount equal to Emissions Costs multiplied by the ratio of the MWh associated with ISO Dispatch Instruction to the total MWh associated with such Emissions Costs. The ISO shall pay Emissions Cost Invoices each month in accordance with the ISO Payments Calendar from the funds available in the Emissions Cost Trust Account in any

Effective: May 31, 2006

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

First Revised Sheet No. 474

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 474

month to pay all Emissions Costs submitted in an Emissions Cost Invoice and demonstrated to be a

direct result of an ISO Dispatch Instruction, the ISO shall make pro rata payment of such Emissions Costs

and shall adjust the rate at which the ISO will assess the Emissions Cost Charge in accordance with

Section 40.11.4. Any outstanding Emissions Costs owed from previous months will be paid in the order

of the month in which such costs were invoiced to the ISO. The ISO's obligation to pay Emissions Costs

is limited to the obligation to pay Emissions Cost Charges received. All disputes concerning payment of

Emissions Cost Invoices shall be subject to ISO ADR Procedures, in accordance with Section 13 of this

ISO Tariff.

40.12 Start-Up Costs.

40.12.1 Obligation to Pay Start-Up Cost Charges.

Start-Up Costs incurred by a Resource Adequacy Resource or FERC Must-Offer Generator as a direct result of an ISO Dispatch Instruction, in accordance with this Section 40.12. Such Start-Up Costs shall include (1) fuel and (2) auxiliary power. The ISO shall levy this charge (the "Start-Up Cost Charge"), each month, against all Scheduling Coordinators based upon each Scheduling Coordinator's Control Area

Each Scheduling Coordinator shall be obligated to pay a charge which will be used to pay the verified

Gross Load and Demand within California outside of the ISO Control Area that is served by exports from

the ISO Control Area. Scheduling Coordinators shall make payment for all Start-Up Cost Charges in

accordance with the ISO Payments Calendar.

40.12.2 Start-Up Cost Trust Account.

All Start-Up Cost Charges received by the ISO shall be deposited in the Start-Up Cost Trust Account.

The Start-Up Cost Trust Account shall be an interest-bearing account separate from all other accounts

maintained by the ISO, and no other funds shall be commingled in it at any time.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I

40.12.3 Rate For the Start-Up Cost Charge.

Original Sheet No. 474A

Effective: May 31, 2006

The rate at which the ISO will assess the Start-Up Cost Charge shall be at the projected annual total of all Start-Up Costs incurred by Resource Adequacy Resource or FERC Must-Offer Generators as a direct result of ISO Dispatch Instruction, adjusted for interest projected to be earned on the monies in the Start-Up Cost Trust Account, divided by the sum

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION
FERC ELECTRIC TARIFF
First Revised Sheet No. 475
THIRD REPLACEMENT VOLUME NO. I
Superseding Original Sheet No. 475
of the Control Area Gross Load and the projected Demand within California outside of the ISO Control
Area that is served by exports from the ISO Control Area ("Start-Up Cost Demand"). The initial rate for
the Start-Up Cost Charge, and all subsequent rates for the Start-Up Cost Charge, shall be posted on the
ISO Website.

#### 40.12.4 Adjustment of the Rate For the Start-Up Cost Charge.

The ISO may adjust the rate at which the ISO will assess the Start-Up Cost Charge on a monthly basis, as necessary, to reflect the net effect of the following:

- the difference, if any, between actual Start-Up Cost Demand and projected Start-Up CostDemand;
- (b) the difference, if any, between the projections of the Start-Up Costs incurred by FERC Must-Offer Generators as a direct result of ISO Dispatch Instructions and the actual Start-Up Costs incurred by Resource Adequacy Resource or FERC Must-Offer Generators as a direct result of ISO Dispatch Instructions as invoiced to the ISO and verified in accordance with this Section 40.12; and
- the difference, if any, between actual and projected interest earned on funds in the Start-Up Cost Trust Account.

The adjusted rate at which the ISO will assess the Start-Up Cost Charge shall take effect on a prospective basis on the first day of the next calendar month. The ISO shall publish all data and calculations used by the ISO as a basis for such an adjustment on the ISO Website at least five (5) days in advance of the date on which the new rate shall go into effect.

# 40.12.5 Credits and Debits of Start-Up Cost Charges Collected from Scheduling Coordinators.

In addition to the surcharges or credits permitted under Section 11.6.3.3 of this ISO Tariff, the ISO may credit or debit, as appropriate, the account of a Scheduling Coordinator for any over- or under-assessment of Start-Up Cost Charges that the ISO determines occurred due to the error, omission, or miscalculation by the ISO or the Scheduling Coordinator.

Effective: May 31, 2006

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

First Revised Sheet No. 476 Superseding Original Sheet No. 476

Effective: May 31, 2006

40.12.6

**Submission of Start-Up Cost Invoices.** 

Scheduling Coordinators for Resource Adequacy Resources or FERC Must-Offer Generators that incur Start-Up Costs as a direct result of an ISO Dispatch Instruction or if the ISO revokes a waiver from compliance with the FERC must-offer obligation while the unit is off-line in accordance with Section 40.6A.6 or 40.7.6 of this ISO Tariff, and Scheduling Coordinators for Generating Units or System Units operating under Condition 2 of the relevant RMR Contract which are called out-of-market in accordance with Section 11.2.4.2 of this ISO Tariff may submit to the ISO an invoice in the form specified on the ISO Website (the "Start-Up Cost Invoice") for the recovery of such Start-Up Costs. Such Start-Up Costs shall not exceed the costs which would be incurred within the start-up time for a unit specified in Schedule 1 of the Participating Generator Agreement. Start-Up Cost Invoices shall use the applicable proxy figure for natural gas costs as determined by Equation C1-8 (Gas) of the Schedules to the Reliability Must-Run Contract for the relevant Service Area (San Diego Gas & Electric Company, Southern California Gas Company, or Pacific Gas and Electric Company), or, if the Resource Adequacy Resource or FERC Must-Offer Generator is not served from one of those three Service Areas, from the nearest of those three Service Areas. Start-Up Cost Invoices shall specify the amount of auxiliary power used during the startup and the actual price paid for that power. Start-Up Cost Invoices shall not include any Start-Up Costs specified in an RMR Contract for a unit owned or controlled by a FERC Must-Offer Generator.

#### 40.12.7 Payment of Start-Up Cost Invoices.

The ISO shall pay Scheduling Coordinators for all Start-Up Costs submitted in a Start-Up Cost Invoice and demonstrated to be a direct result of an ISO Dispatch Instruction. The ISO shall pay such Start-Up Cost Invoices each month in accordance with the ISO Payments Calendar from the funds available in the Start-Up Cost Trust Account. To the extent there are insufficient funds available in the Start-Up Cost Trust Account in any month to pay all Start-Up Costs submitted in a Start-Up Cost Invoice and demonstrated to be a direct result of an ISO Dispatch Instruction, the ISO shall make pro rata payment of such Start-Up Costs and shall adjust the rate at which the ISO will assess the Start-Up Cost Charge in accordance with Section 40.12.4. Any outstanding Start-Up Costs owed from previous months will be paid in the order of the month in which such costs were invoiced to the ISO. The ISO's obligation to pay

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF
THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 476A

Start-Up Costs is limited to the obligation to pay Start-Up Cost Charges received. All disputes concerning

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION
FERC ELECTRIC TARIFF First Revised Sheet No. 477
THIRD REPLACEMENT VOLUME NO. I Superseding Original Sheet No. 477
payment of Start-Up Cost Invoices shall be subject to ISO ADR Procedures, in accordance with Section

13 of this ISO Tariff.

40.13 ISO Default Qualifying Capacity Criteria.

40.13.1 Applicability.

The criteria in Section 40.13 shall apply only where a Local Regulatory Authority does not establish criteria to determine the types of resources that may be eligible to provide Qualifying Capacity and for calculating Qualifying Capacity for such eligible resource types.

40.13.2 Nuclear and Thermal.

Nuclear and thermal units, other than Qualifying Facilities ("QFs") with effective contracts under the Public Utility Regulatory Policies Act addressed in Section 40.13.8 below, must be a Participating Generator or a System Unit. The Qualifying Capacity of nuclear and thermal units, other than Qualifying Facilities addressed in Section 40.13.8, will be based on net dependable capacity defined by North American Electric Reliability Council ("NERC") Generating Availability Data System ("GADS") information.

40.13.3 Hydro.

Hydro units, other than QFs with contracts under the Public Utility Regulatory Policies Act, must be either Participating Generators or System Units. The Qualifying Capacity of a pond or pumped storage hydro unit, other than a QF, will be determined based on net dependable capacity defined by NERC GADS minus variable head de-rate based on an average dry year reservoir level. The Qualifying Capacity of a pond or pumped storage hydro unit that is a QF will be determined based on historic performance during the Standard Offer 1 peak hours of noon to 6:00 p.m., using a three-year rolling average.

The Qualifying Capacity of all run-of-river hydro units, including QFs, will be based on net dependable capacity defined by NERC GADS minus an average dry year conveyance flow, stream flow, or canal head de-rate. As used in this section, average dry year reflects a one-in-five year dry hydro scenario (for example, using the 4th driest year from the last 20 years on record).

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006 Effective: May 31, 2006

Effective: May 31, 2006

40.13.4 **Unit-Specific Contracts.** 

Unit-specific contracts with Participating Generators or System Units will qualify as Resource Adequacy capacity subject to the verification that the total MW quantity of all contracts from a specific unit do not exceed the total Net Qualifying Capacity (MW) consistent with the Net Qualifying Capacity determination for that unit.

40.13.5 **Contracts with Liquidated Damage Provisions.** 

Firm energy contracts with liquidated damages provisions, as generally reflected in Service Schedule C of the Western Systems Power Pool Agreement or the Firm LD product of the Edison Electric Institute pro forma agreement, or any other similar firm energy contract that does not require the seller to source the energy from a particular unit, and specifies a delivery point internal to the ISO Control Area entered into before October 27, 2005 shall be eligible to count as Qualifying Capacity until the end of 2008. A Scheduling Coordinator, however, cannot have more than 75% of its portfolio of Qualifying Capacity met by contracts with liquidated damage provisions for 2006. This percentage will be reduced to 50% for 2007 and 25% for 2008.

40.13.6 Wind and Solar.

As used in this Section, wind units are those wind Generating Units without backup sources of generation and solar units are those solar Generating Units without backup sources of generation. Wind and Solar units, other than QFs with effective contracts under the Public Utility Regulatory Policies Act, must be participants in the ISO's Participating Intermittent Resource Program ("PIRP").

The Qualifying Capacity of all wind or solar units, including QFs, will be based on their monthly historic performance during the Standard Offer 1 peak hours of noon to 6:00 p.m., using a three-year rolling average. New wind and solar generators which do not have three years of historic performance data will be assigned a default Qualifying Capacity for each year of the missing historical performance as follows: the Qualifying Capacity of another solar or wind generator with historic data located in the same weather regime with similar technology adjusted for the nameplate capacity ratio of the new generator and the similarly situated proxy generator. The supporting data and the sample Qualifying Capacity calculation will be submitted to the ISO for approval as part of the facilities PIRP program application.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. I

Original Sheet No. 477B

The default Qualifying Capacity values will be replaced on a year by year basis with actual performance

data as the data becomes available to form a three year rolling average.

40.13.7 Geothermal.

Geothermal units, other than QFs addressed in Section 40.13.8, must be Participating Generators or

System Units. The Qualifying Capacity of geothermal units, other than QFs addressed in Section

40.13.8, will be based on NERC GAD net dependable capacity minus a de-rate for steam field

degradation.

40.13.8 Treatment of Qualifying Capacity for QFs.

QFs must be Participating Generators (signed a Participating Generator or QF Participating Generator

Agreement) or System Units, unless they have a PURPA contract. Except for hydro, wind, and solar QFs

addressed pursuant to Sections 40.13.3 and 40.13.6 above, the Qualifying Capacity of QFs under

PURPA contracts, will be based on historic monthly generation output during Standard Offer 1 peak hours

of noon to 6:00 p.m. (net behind the meter loads) during a three-year rolling average.

40.13.9 Participating Load Resources.

The Qualifying Capacity of Participating Load shall be the average reduction in demand for over a three-

year period on a per dispatch basis or, if the Participating Load does not have three years of performance

history, based on comparable evaluation data using similar programs. Participating Load resources must

be available at least 48 hours and if the Participating Load can only be dispatched for a maximum of two

hours per event, than only 0.89% of a Scheduling Coordinator's portfolio may be made up of such

Participating Load.

40.13.10 Jointly-Owned Facilities.

A jointly-owned facility must be either a Participating Generator or a System Unit. The Qualifying

Capacity for the entire facility will be determined based on the type of resource as described elsewhere in

this Section. In addition, the Scheduling Coordinator must provide the ISO with a demonstration of its

entitlement to the output of the jointly-owned facility's Qualified Capacity and an explanation of how that

entitlement may change if the facility's output is restricted.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF THIRD REPLACEMENT VOLUME NO. I constraints may be imposed beyond those explicitly stated in the plan.

Original Sheet No. 477D

Effective: May 31, 2006

41 Procurement of RMR.

42 Assurance of Adequate Generation and Transmission to meet Applicable

Operating and Planning Reserve.

42.1 Generation Planning Reserve Criteria.

Generation planning reserve criteria shall be met as follows:

**42.1.1** On an annual basis, the ISO shall prepare a forecast of weekly Generation capacity and weekly

peak Demand on the ISO Controlled Grid. This forecast shall cover a period of twelve months and be

posted on the WEnet and the ISO may make the forecast available in other forms at the ISO's option.

42.1.2 If the forecast shows that the applicable WECC/NERC Reliability Criteria can be met during peak

Demand periods, then the ISO shall take no further action.

42.1.3 If the forecast shows that the applicable WECC/NERC Reliability Criteria cannot be met during

peak Demand periods, then the ISO shall facilitate the development of market mechanisms to bring the

ISO Controlled Grid during peak periods into compliance with the Applicable Reliability Criteria (or such

more stringent criteria as the ISO may impose pursuant to Section 7.2.2.2). The ISO shall solicit bids for

Replacement Reserve in the form of Ancillary Services, short-term Generation supply contracts of up to

one (1) year with Generators, and Load curtailment contracts giving the ISO the right to reduce the

Demands of those parties that win the contracts when there is insufficient Generation capacity to satisfy

those Demands in addition to all other Demands. The curtailment contracts shall provide that the ISO's

curtailment rights can only be exercised after all available Generation capacity has been fully utilized

unless the exercise of such rights would allow the ISO to satisfy the Applicable Reliability Criteria at lower

cost, and the curtailment rights shall not be exercised to stabilize or otherwise influence prices for power

in the Energy markets.

FERC ELECTRIC TARIFF

First Revised Sheet No. 478

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 478

**42.1.4** If Replacement Reserve, short-term Generation supply contracts or curtailment contracts are

required to meet Applicable Reliability Criteria, the ISO shall select the bids that permit the satisfaction of

those Applicable Reliability Criteria at the lowest cost.

**42.1.5** Notwithstanding the foregoing, if the ISO concludes that it may be unable to comply with the

Applicable Reliability Criteria, the ISO shall, acting in accordance with Good Utility Practice, take such

steps as it considers to be necessary to ensure compliance, including the negotiation of contracts through

processes other than competitive solicitations. The steps can include the negotiation of contracts for

Ancillary Services on a real time basis. If the ISO is unable to obtain such Ancillary Services from within

the ISO Controlled Grid, the ISO may solicit Ancillary Services from other Control Areas on a real-time

basis.

42.1.6 The ISO may, in addition to the required annual forecast, publish a forecast of the peak Demands

and Generation resources for two or more additional years. This forecast would be for information

purposes to allow Market Participants to take appropriate steps to satisfy the Applicable Reliability

Criteria, and would not be used by the ISO to determine whether additional resources are necessary.

42.1.7 In fulfilling its requirement to ensure that the applicable Generation planning reserve criteria are

satisfied, the ISO shall rely to the maximum extent possible on market forces.

42.1.8 Except where and to the extent that such costs are recovered from Scheduling Coordinators

pursuant to Section 8, and except as provided in Section 42.1.9, all costs incurred by the ISO in any hour

pursuant to any contract entered into under this Section 42.1 shall be charged to each Scheduling

Coordinator pro rata based upon the same proportion as the Scheduling Coordinator's metered hourly

Demand (including exports) bears to the total metered hourly Demand (including exports) served in that

hour.

**42.1.9** Costs incurred by the ISO pursuant to any contract entered into under this Section 42.1 for

resources to meet any portion of the anticipated difference between forward schedules and the real-time

deviations from those schedules shall be charged to each Scheduling Coordinator pro rata based upon

the same proportion as the Scheduling Coordinator's obligation for deviation Replacement

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 479

THIRD REPLACEMENT VOLUME NO. I

Superseding Original Sheet No. 479

Reserve in the hour, determined in accordance with Section 8.12.3A bears to the total deviation

Replacement Reserve in that hour.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

First Revised Sheet No. 492

Superseding Original Sheet No. 492

States, Canada or Mexico; however, such entity is not eligible for

transmission service that would be prohibited by Section 212(h)(2)

of the Federal Power Act; and (ii) any retail customer taking

unbundled transmission service pursuant to a state retail access

program or pursuant to a voluntary offer of unbundled retail

transmission service by the Participating TO.

**Eligible Intermittent** 

A Generating Unit that is powered solely by 1) wind, 2) solar energy,

Resource or 3) hydroelectric potential derived from small conduit water

distribution facilities that do not have storage capability.

**Emissions Cost Charge** 

The charge determined in accordance with Section 40.11.

**Emissions Cost Demand** 

The level of Demand specified in Section 40.11.3.

**Emissions Cost Invoice** 

The invoice submitted to the ISO in accordance with Section

40.11.6.

**Emissions Cost Trust** 

The trust account established in accordance with Section 40.11.2.

**Account** 

**Emissions Costs** 

The mitigation fees, excluding capital costs, assessed against a

Generating Unit by a state or federal agency, including air quality

districts, for exceeding applicable NOx emissions limitations.

**EMS (Energy Management** 

System)

A computer control system used by electric utility dispatchers to monitor the real-time performance of the various elements of an

electric system and to control Generation and transmission facilities.

Encumbrance A legal restriction or covenant binding on a Participating TO that

affects the operation of any transmission lines or associated facilities

and which the ISO needs to take into account in exercising

Operational Control over such transmission lines or associated

facilities if the Participating TO is not to risk incurring significant

liability. Encumbrances shall include Existing Contracts and may

include: (1) other legal restrictions or covenants meeting the

definition of Encumbrance and arising under other arrangements entered into before the ISO Operations Date, if any; and (2) legal

restrictions or covenants meeting the definition of Encumbrance and

arising under a contract or other arrangement entered into after the

**End-Use Customer or** 

A consumer of electric power who consumes such power to satisfy a

Issued by: Charles F. Robinson, Vice President and General Counsel

ISO Operations Date.

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

Superseding First Revised Sheet No. 495

Second Revised Sheet No. 495

THIRD REPLACEMENT VOLUME NO. II

modifications that will be required to provide needed services.

**Facility Study Agreement** An agreement between a Participating TO and either a Market

Participant, Project Sponsor, or identified principal beneficiaries pursuant to which the Market Participants, Project Sponsor, and

identified principal beneficiaries agree to reimburse the Participating

TO for the cost of a Facility Study.

<u>Fed-Wire</u> The Federal Reserve Transfer System for electronic funds transfer.

**FERC** The Federal Energy Regulatory Commission or its successor.

**FERC Annual Charges**Those charges assessed against a public utility by the FERC

pursuant to 18 C.F.R. § 382.201 and any related statutes or regulations, as they may be amended from time to time.

FERC Annual Charge The rate to be paid by Scheduling Coordinators for recovery of

**Recovery Rate** FERC Annual Charges assessed against the ISO for transactions on

the ISO Controlled Grid.

FERC Annual Charge An account to be established by the ISO for the purpose of

<u>Trust Account</u> maintaining funds collected from Scheduling Coordinators for FERC

Annual Charges and disbursing such funds to the FERC.

<u>FERC Must-Offer</u> All entities defined by Section 40.7.1 of this ISO Tariff.

<u>Generator</u>

Final Approval A statement of consent by the ISO Control Center to initiate a

scheduled Outage.

Final Day-Ahead Schedule The Day-Ahead Schedule which has been approved as feasible and

consistent with all other Schedules by the ISO based upon the ISO's

Day-Ahead Congestion Management procedures.

<u>Final Hour-Ahead</u> The Hour-Ahead Schedule of Generation and Demand that has

**Schedule** been approved by the ISO as feasible and consistent with all other

Schedules based on the ISO's Hour-Ahead Congestion

Management procedures.

Final Invoice The invoice due from a RMR Owner to the ISO at termination of the

RMR Contract.

Final Schedule A Schedule developed by the ISO following receipt of a Revised

Schedule from a Scheduling Coordinator.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF First Revised Sheet No. 509

THIRD REPLACEMENT VOLUME NO. II Superseding Original Sheet No. 509

ISO Website The ISO internet home page at <a href="http://www.caiso.com">http://www.caiso.com</a> or such other

internet address as the ISO shall publish from time to time.

ISP (Internet Service An independent network service organization engaged by the ISO to

**Provider)** establish, implement and operate WEnet.

Large Generating Facility A Generating Facility having a Generating Facility Capacity of more

than 20 MW.

<u>Line Loss Correction</u> The line loss correction factor as set forth in the Technical

<u>Factor</u> Specifications.

**Load** An end-use device of an End-Use Customer that consumes power.

Load should not be confused with Demand, which is the measure of

power that a Load receives or requires.

**Load-Serving Entity (LSE)** Any entity (or the duly designated agent of such an entity, including,

e.g. a Scheduling Coordinator), including a load aggregator or power marketer; (i) serving End Users within the ISO Control Area and (ii) that has been granted authority or has an obligation pursuant to California State or local law, regulation, or franchise to sell electric energy to End Users located within the ISO Control Area or (iii) is a

Federal Power Marketing Authority that serves retail Load.

**Load Shedding** The systematic reduction of system Demand by temporarily

decreasing the supply of Energy to Loads in response to

transmission system or area capacity shortages, system instability,

or voltage control considerations.

<u>Local Furnishing Bond</u> Tax-exempt bonds utilized to finance facilities for the local furnishing

of electric energy, as described in section 142(f) of the Internal

Revenue Code, 26 U.S.C. § 142(f).

**Local Furnishing** Any Tax-Exempt Participating TO that owns facilities financed by

Participating TO Local Furnishing Bonds.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Original Sheet No. 509A

**Local Publicly Owned** 

**Electric Utilities** 

A municipality or municipal corporation operating as a public utility furnishing electric service, a municipal utility district furnishing

electric service, a public utility district furnishing electric services, an

irrigation district furnishing electric services, a state agency or

subdivision furnishing electric services, a rural cooperative

furnishing electric services, or a joint powers authority that includes

one or more of these agencies and that owns Generation or

transmission facilities, or furnishes electric services over its own or

its members' electric Distribution System.

**Local Regulatory** 

The state or local governmental authority responsible for the

<u>Authority</u>

regulation or oversight of a utility.

**Local Reliability Criteria** 

Reliability Criteria unique to the transmission systems of each of the PTOs established at the later of: (1) ISO Operations Date, or (2) the date upon which a New Participating TO places its facilities under

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Second Revised Sheet No. 514

Superseding First Revised Sheet No. 514

the Internal Revenue Code of 1986 or the corresponding provisions of prior law without regard to the identity of the holder thereof. Municipal Tax Exempt Debt does not include Local Furnishing Bonds.

**Native Load** 

Load required to be served by a utility within its Service Area

pursuant to applicable law, franchise, or statute.

**NERC** 

Net FTR Revenue

The North American Electric Reliability Council or its successor.

The sum of: 1) the revenue received by the New Participating

TO from the sale auction or other transfer of the ETPs provided

TO from the sale, auction, or other transfer of the FTRs provided

to it pursuant to Section 36.4.3 FTR, or any substantively

identical successor provision of the ISO Tariff; and 2) for each

hour: a) the Usage Charge revenue received by the New

Participating To associated with its Section 36.4.3 FTRs; minus

b) Usage Charges that are: i) incurred by the Scheduling

Coordinator for the New Participating TO under ISO Tariff

Section 27.1.2.1.4 ii) associated with the New Participating TO's

Section 36.4.3 FTRs, and iii) incurred by the New Participating

TO for its energy transactions but not incurred as a result of the

use of the transmission by a third-party and minus c) the

charges paid by the New Participating TO pursuant to Section

27.1.2.1.7, to the extent such charges are incurred by the

Scheduling Coordinator of the New Participating TO on

Congested Inter-Zonal Interfaces that are associated with the

Section 36.4.3 FTRs provided to the New Participating TO. The

component of New FTR Revenue represented by item 2)

immediately above shall not be less than zero for any hour.

Net Negative Uninstructed

**Deviation** 

The real-time change in Generation or Demand associated with underscheduled Load (i.e., Load that appears unscheduled in real time) and overscheduled Generation (i.e., Generation that is scheduled in forward markets and does not appear in real time). Deviations are netted for each Settlement Interval, apply to a

Scheduling Coordinator's entire portfolio, and include Load,

Generation, imports and exports.

**Net Output** 

The gross Energy output from a Generating Unit less the Station

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 514A

THIRD REPLACEMENT VOLUME NO. II

Superseding Original Sheet No. 514A

Power requirements for such Generating Unit during the Netting Period, or the Energy available to provide Remote Self-Supply from a generating facility in another Control Area during the

Netting Period.

**Netting Period** 

A calendar month, representing the interval over which the Net Output of one or more generating resources in a Station Power Portfolio is available to be attributed to the self-supply of Station

Power in that Station Power Portfolio.

**Net Qualifying Capacity** 

Qualifying capacity reduced, as applicable, based on: (1) testing and verification; and (2) deliverability restrictions. The Net Qualifying Capacity determination shall be made by the ISO pursuant to the provisions of this ISO Tariff and any applicable

manual or procedure.

**Network Upgrades** 

The additions, modifications, and upgrades to the ISO

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

First Revised Sheet No. 519

Superseding Original Sheet No. 519

from one component necessarily causes Energy production from other components; iii) the operational arrangement of related multiple generating components determines the overall physical efficiency of the combined output of all components; iv) the level of coordination required to schedule individual generating components would cause the ISO to incur scheduling costs far in excess of the benefits of having scheduled such individual components separately; or v) metered output is available only for the combined output of related multiple generating components and separate generating component metering is either impractical or economically inefficient.

### **Planning Reserve Margin**

PMS (Power Management

## A Planning Reserve Margin shall be that quantity or percentage

of capacity in MWs that exceeds the Demand Forecast set forth in Section 40.3 as provided for in Section 40.4 of this ISO Tariff.

The ISO computer control system used to monitor the real-time performance of the various elements of the ISO Controlled Grid, control Generation, and perform operational power flow studies.

## Point of Change of

**Ownership** 

System)

The point, as set forth in Part A to the Standard Large Generator

Interconnection Agreement, where the Interconnection

Customer's Interconnection Facilities connect to the

Participating TO's Interconnection Facilities.

#### **Point of Interconnection**

The point, as set forth in Part A to the Standard Large Generator Interconnection Agreement, where the Interconnection Facilities connect to the ISO Controlled Grid.

#### **Power Flow Model**

The computer software used by the ISO to model the voltages, power injections and power flows on the ISO Controlled Grid and determine the expected Transmission Losses and Generation Meter Multipliers.

# Power System Stabilizers

(PSS)

An electronic control system applied on a Generating Unit that helps to damp out dynamic oscillations on a power system. The PSS senses Generator variables, such as voltage, current and shaft speed, processes this information and sends control signals to the Generator voltage regulator.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Original Sheet No. 519A

Preferred Day-Ahead

A Scheduling Coordinator's Preferred Schedule for the ISO Day-

Schedule

Ahead scheduling process.

**Preferred Hour-Ahead** 

A Scheduling Coordinator's Preferred Schedule for the ISO

**Schedule** 

Hour-Ahead scheduling process.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 520

THIRD REPLACEMENT VOLUME NO. II

Superseding Original Sheet No. 520

Preferred Schedule

The initial Schedule produced by a Scheduling Coordinator that represents its preferred mix of Generation to meet its Demand. For each Generator, the Schedule will include the quantity of output, details of any Adjustment Bids, and the location of the Generator. For each Load, the Schedule will include the quantity of consumption, details of any Adjustment Bids, and the location of the Load. The Schedule will also specify quantities and location of trades between the Scheduling Coordinator and

all other Scheduling Coordinators. The

Preferred Schedule will be balanced with respect to Generation, Transmission Losses, Load and trades between Scheduling

Coordinators.

**Preliminary Settlement** 

Statement

The initial statement issued by the ISO of the calculation of the Settlements and allocation of the charges in respect of all Settlement Periods covered by the period to which it relates.

Price Overlap

The price range of bids for Supplemental Energy or Energy associated with Ancillary Services bids for any Dispatch Interval that includes decremental and incremental Energy Bids where the price of the decremental Energy Bids exceeds the price of the incremental Energy Bids.

**Primary ISO Control** 

**Center** 

**Project Sponsor** 

The ISO Control Center located in Folsom, California.

A Market Participant or group of Market Participants or a Participating TO that proposes the construction of a

transmission addition or upgrade in accordance with Section 24

of the ISO Tariff.

**Proposal for Installation** 

A written proposal submitted by an ISO Metered Entity to the ISO describing a proposal for the installation of additional Metering Facilities.

**Proxy Price** 

The value determined for each gas-fired Generating Unit owned or controlled by a Must-Offer Generator in accordance with Section 40.10.1.

**PTO Service Territory** 

The area in which an IOU, a Local Public Owned Electric Utility, or federal power marketing administration that has turned over its transmission facilities and/or Entitlements to ISO Operational Control is obligated to provided electric service to Load. A PTO

Effective: May 31, 2006

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 521 Superseding Original Sheet No. 521

THIRD REPLACEMENT VOLUME NO. II

ed of the Service Areas of

Service Territory may be comprised of the Service Areas of more than one Local Public Owned Electric Utility, if they are operating under an agreement with the ISO for aggregation of their MSS and their MSS Operator is designated as the

Participating TO.

**Queue Position** The order of a valid Interconnection Request, relative to all other

pending valid Interconnection Requests, that is established

based upon the date and time of receipt of the valid

Interconnection Request by the ISO.

**Qualifying Capacity** The maximum capacity of a Resource Adequacy Resource.

The criteria for calculating Qualifying Capacity from Resource Adequacy Resources may be established by the CPUC or other applicable Local Regulatory Authority and provided to the ISO,

or default provisions in Section 40.13 of this ISO Tariff.

**Qualifying Facility** A qualifying co-generation or small power production facility

recognized by FERC.

**Ramping** Changing the loading level of a Generating Unit in a constant

manner over a fixed time (e.g., ramping up or ramping down).

Such changes may be directed by a computer or manual

Protective systems that typically utilize a combination of

control.

RAS (Remedial Action

Schemes) conventional protective relays, computer-based processors, and

telecommunications to accomplish rapid, automated response to

unplanned power system events. Also, details of RAS logic and

any special requirements for arming of RAS schemes, or changes in RAS programming, that may be required.

**Reactive Power Control**Generation or other equipment needed to maintain acceptable

voltage levels on the ISO Controlled Grid and to meet reactive capacity requirements at points of interconnection on the ISO

Controlled Grid.

Real Time Market The competitive generation market controlled and coordinated

by the ISO for arranging real-time Imbalance Energy.

Redispatch The readjustment of scheduled Generation or Demand side

management measures, to relieve Congestion or manage

Energy imbalances.

Issued by: Charles F. Robinson, Vice President and General Counsel

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Original Sheet No. 521A

**Registered Data** 

Those items of technical data and operating characteristics relating to Generation, transmission or distribution facilities which are identified to the owners of such facilities as being information, supplied in accordance with the ISO Tariff, to assist the ISO to maintain reliability of the ISO Controlled Grid and to

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Second Revised Sheet No. 524

Superseding First Revised Sheet No. 524

are deemed by the ISO as necessary to maintain reliable

electric service in the ISO Control Area; and 2) whose costs are billed by the ISO to the Participating TO pursuant to the ISO

Tariff. Reliability Services Costs include costs charged by the

ISO to a Participating TO associated with service provided

under an RMR Contract (Section 30.6.1.2), local out-of-market dispatch calls (Section 11.2.4.2.1) and Minimum Load Costs

associated with units committed under the must-offer obligation

for local reliability requirements (Section 40.8.6)

**Remote Self-Supply** Positive Net Output from generating resources in the Station

Power Portfolio that is deemed to have self-supplied Station
Power load of other Generating Units in the Station Power
Portfolio during the Netting Period, where such self-supply

requires use of the ISO Controlled Grid.

REMnet The Wide Area Network through which the ISO acquires Meter

Data.

**Replacement Reserve** Generating capacity that is dedicated to the ISO, capable of

starting up if not already operating, being synchronized to the ISO Controlled Grid, and Ramping to a specified operating level within a sixty (60) minute period, the output of which can be continuously maintained for a two hour period. Also, Curtailable Demand that is capable of being curtailed within sixty minutes

and that can remain curtailed for two hours.

Resource Adequacy The program that ensures that adequate physical generating

capacity dedicated to serving all load requirements is available to meet peak demand and planning and operating reserves, at or deliverable to locations and at times as may be necessary to

ensure local area reliability and system reliability.

Resource Adequacy The capacity of a Resource Adequacy Resource listed on a

<u>Capacity</u> Resource Adequacy Plan and a Supply Plan.

Resource Adequacy Plan A submission by a Scheduling Coordinator for a Load Serving

Entity serving Load in the ISO Control Area in order to satisfy

the requirements of Section 40 of this ISO Tariff.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

First Revised Sheet No. 524A

THIRD REPLACEMENT VOLUME NO. II

Superseding Original Sheet No. 524A

Resource Adequacy

A resource that is required to offer Resource Adequacy Capacity.

Resource

The criteria for determining the types of resources that are eligible to provide Qualifying Capacity may be established by the CPUC, other applicable Local Regulatory Authority and provided to the ISO, or the

default provision in Section 40.13 of this ISO Tariff.

Resource-Specific

Settlement Interval Ex

**Post Price** 

The Resource-Specific Settlement Interval Ex Post Price will equal the Energy-weighted average of the applicable Dispatch Interval Ex Post Prices for each Settlement Interval taking into account each resource's Instructed Imbalance Energy, except Regulation Energy. The Resource-Specific Settlement Interval Ex Post Price shall apply to those resources that are capable of responding to ISO Dispatch

Instructions.

**Responsible Utility** 

The utility which is a party to the TCA in whose PTO Service
Territory the Reliability Must-Run Unit is located or whose PTO
Service Territory is contiguous to the PTO Service Territory in
which a Reliability Must-Run Unit owned by an entity outside of the
ISO Controlled Grid is located.

**Revenue Requirement** 

The revenue level required by a utility to cover expenses made on an investment, while earning a specified rate of return on the investment.

**Revised Adjusted RMR** 

Invoice

The monthly invoice issued by the RMR Owner to the ISO pursuant to the RMR Contract reflecting any appropriate revisions to the Adjusted RMR Invoice based on the ISO's validation and actual data

for the billing month.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

First Revised Sheet No. 528

Superseding Original Sheet No. 528

reasonable uneconomic portion of costs associated with Generation-

related assets and obligations, nuclear decommissioning, and

capitalized Energy efficiency investment programs approved prior to August 15, 1996 and as defined in the California Assembly Bill No.

1890 approved by the Governor on September 23, 1996.

**Short Start** Generating Units that that have a cycle time less than five hours

(Start-Up Time plus Minimum Run Time is less than five hours) have a Start Up Time less than two hours, and that can be fully optimized with

respect to this cycle time.

<u>Site Control</u> Documentation reasonably demonstrating: (1) ownership of, a

leasehold interest in, or a right to develop a site for the purpose of constructing the Generating Facility; (2) an option to purchase or acquire a leasehold site for such purpose; or (3) an exclusivity or other

business relationship between Interconnection Customer and the entity having the right to sell, lease or grant Interconnection Customer

the right to possess or occupy a site for such purpose.

Scheduling and Logging

system for the ISO of

California (SLIC)

A logging application that allows Market Participants to notify the ISO when a unit's properties change due to physical problems. Users can modify the maximum and minimum output of a unit, as well as the ramping capability of the unit.

**Small Generating Facility** 

A Generating Facility that has a Generating Facility Capacity of no

more than 20 MW.

**Spinning Reserve** 

The portion of unloaded synchronized generating capacity that is immediately responsive to system frequency and that is capable of being loaded in ten minutes, and that is capable of running for at least

two hours.

**Stand Alone Network** 

<u>Upgrades</u>

Network Upgrades that an Interconnection Customer may construct without affecting day-to-day operations of the ISO Controlled Grid or Affected Systems during their construction. The Participating TO, the ISO, and the Interconnection Customer must agree as to what constitutes Stand Alone Network Upgrades and identify them in Appendix A to the Standard Large Generator Interconnection

Agreement.

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Original Sheet No. 528A

Standard Large Generator The form of interconnection agreement applicable to an

<u>Interconnection</u>

Interconnection Request pertaining to a Large Generating Facility.

**Agreement** 

(LGIA)

**Standard Large Generator** 

The ISO Protocol that sets forth the interconnection procedures

**Interconnection** 

applicable to an Interconnection Request pertaining to a Large

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 529 Superseding Original Sheet No. 529

THIRD REPLACEMENT VOLUME NO. II

Procedures Generat

Standby Rate

Generating Facility that is included in the ISO Tariff.

(LGIP)

Standard Ramp (-ing)

A ramp calculated from two consecutive Final Hour Ahead Schedules that results in a straight trajectory between 10 minutes before the start

of an operating hour to 10 minutes after the start of the operating hour

A rate assessed a Standby Service Customer by the Participating TO

that also provides retail electric service, as approved by the Local Regulatory Authority, or FERC, as applicable, for Standby Service which compensates the Participating TO, among other things, for

costs of High Voltage Transmission Facilities.

**Standby Service** Service provided by a Participating TO that also provides retail electric

service, which allows a Standby Service Customer, among other

things, access to High Voltage Transmission Facilities for the delivery of backup power on an instantaneous basis to ensure that Energy may be reliably delivered to the Standby Service Customer in the event of

an outage of a Generating Unit serving the customer's Load.

**Standby Service** A retail End-Use Customer of a Participating TO that also provides

retail electric service that receives Standby Service and pays a

Standby Rate.

Standby Transmission The transmission revenues, with respect to cost of both High Voltage

Revenue Transmission Facilities and Low Voltage Transmission Facilities,

collected directly from Standby Service Customers through charges

for Standby Service.

**Start-Up Cost Charge** The charge determined in accordance with Section 40.12.

**Start-Up Cost Demand** The level of Demand specified in Section 40.12.3.

**Start-Up Cost Invoice** The invoice submitted to the ISO in accordance with Section 40.12.6.

Start-Up Cost Trust The trust account established in accordance with Section 40.12.2.

Account

Customer

<u>Start-Up Costs</u> The cost incurred by a particular Generating Unit from the time of first

fire, the time of receipt of an ISO Dispatch instruction, or the time the unit was last synchronized to the grid, whichever is later, until the time

the generating unit reaches its minimum operating level. Start-Up Costs are determined as the sum of (1) the cost of auxiliary power

used during the start-up and (2) the number that is determined

multiplying the actual amount of fuel consumed by the proxy gas price

Effective: May 31, 2006

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 531 Superseding Original Sheet No. 531

THIRD REPLACEMENT VOLUME NO. II

an hour before the commencement of the Settlement Period.

Supply

The rate at which Energy is delivered to the ISO Controlled Grid measured in units of watts or standard multiples thereof, e.g.,

1,000W=1 KW; 1,000 KW = 1MW, etc.

**Supply Plan** 

A submission by a Scheduling Coordinator for a Resource Adequacy Resource in order to satisfy the requirements of Section 40 of this ISO

Tariff.

**System Emergency** 

Conditions beyond the normal control of the ISO that affect the ability of the ISO Control Area to function normally including any abnormal system condition which requires immediate manual or automatic action to prevent loss of Load, equipment damage, or tripping of system elements which might result in cascading Outages or to restore system operation to meet the minimum operating reliability criteria.

**System Planning Studies** 

Reports summarizing studies performed to assess the adequacy of the ISO Controlled Grid as regards conformance to Reliability Criteria.

**System Reliability** 

A measure of an electric system's ability to deliver uninterrupted

service at the proper voltage and frequency.

**System Resource** 

A group of resources, single resource, or a portion of a resource located outside of the ISO Control Area, or an allocated portion of a Control Area's portfolio of generating resources that are directly responsive to that Control Area's Automatic Generation Control (AGC) capable of providing Energy and/or Ancillary Services to the ISO Controlled Grid.

**System Unit** 

One or more individual Generating Units and/or Loads within a Metered Subsystem controlled so as to simulate a single resource with specified performance characteristics, as mutually determined and agreed to by the MSS Operator and the ISO. The Generating Units and/or Loads making up a System Unit must be in close physical proximity to each other such that the operation of the resources comprising the System Unit does not result in significant differences in flows on the ISO Controlled Grid.

**TAC Area** 

A portion of the ISO Controlled Grid with respect to which Participating TOs' High Voltage Transmission Revenue Requirements are recovered through a High Voltage Access Charge. TAC Areas are listed in Schedule 3 of Appendix F.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Original Sheet No. 531A

**Take-Out Point** 

The metering points at which a Scheduling Coordinator Metered Entity

or ISO Metered Entity takes delivery of Energy.

Tax Exempt Debt

Municipal Tax Exempt Debt or Local Furnishing Bonds.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

First Revised Sheet No. 534

Superseding Original Sheet No. 534

**Transmission Ownership** 

<u>Rights</u>

A non-Participating TO ownership or joint ownership right to transmission facilities within the ISO Control Area that has not executed the Transmission Control Agreement and the transmission facilities are not incorporated into the ISO Controlled Grid.

<u>Transmission Revenue</u> Credit For an Original Participating TO, the proceeds received from the ISO for Wheeling service, FTR auction revenue and Usage Charges, plus the shortfall or surplus resulting from any cost differences between Transmission Losses and Ancillary Service requirements associated with Existing Rights and the ISO's rules and protocols. For a New Participating TO during the 10-year transition period described in Section 4 of Schedule 3 of Appendix F, the proceeds received from the ISO for Wheeling service and Net FTR Revenue, plus the shortfall or surplus resulting from any cost differences between Transmission Losses and Ancillary Service requirements associated with Existing Rights and the ISO's rules and protocols. After the 10-year transition period, the New Participating TO Transmission Revenue Credit shall be calculated the same as the Transmission Revenue Credit for the Original Participating TO.

TRBA (Transmission
Revenue Balancing
Account)

A mechanism to be established by each Participating TO which will ensure that all Transmission Revenue Credits and other credits specified in Sections 6 and 8 of Appendix F, Schedule 3, flow through to transmission customers.

RR (Transmission
Revenue Requirement)

The TRR is the total annual authorized revenue requirements associated with transmission facilities and Entitlements turned over to the Operational Control of the ISO by a Participating TO. The costs of any transmission facility turned over to the Operational Control of the ISO shall be fully included in the Participating TO's TRR. The TRR includes the costs of transmission facilities and Entitlements and deducts Transmission Revenue Credits and credits for Standby Transmission Revenue and the transmission revenue expected to be actually received by the Participating TO for Existing Rights and Converted Rights.

**Trial Operation** 

The period during which Interconnection Customer is engaged in on-

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

Second Revised Sheet No. 536 Superseding First Revised Sheet No. 536

THIRD REPLACEMENT VOLUME NO. II

instructed by the ISO or which the ISO Tariff provides will be paid at

the price for Uninstructed Imbalance Energy.

**Unit Commitment** 

The process of determining which Generating Units will be committed

(started) to meet Demand and provide Ancillary Services in the near

future (e.g., the next Trading Day).

**Un-Recovered Minimum** 

**Load Cost** 

Energy

The Un-Recovered Minimum Load Cost for each hour of Waiver

Denial Period shall be calculated as the difference between: (1) a

resource's Minimum Load Costs as calculated in this Section for the same Settlement Interval and (2) the Imbalance Energy payment for a

resource's minimum load energy in the Settlement Interval.

**Unsecured Credit Limit** 

The level of credit established for a Market Participant or FTR Bidder that is not secured by any form of Financial Security, as provided for in

Section 12 of the ISO Tariff.

**Usage Charge** 

The amount of money, per 1 kW of scheduled flow, that the ISO charges a Scheduling Coordinator for use of a specific Congested Inter-Zonal Interface during a given hour.

Validation, Estimation and

**Editing (VEE)** 

Applies to Meter Data directly acquired by the ISO. Validation is the process of checking the data to ensure that it is contiguous, within predefined limits and has not been flagged by the meter. Estimation and Editing is the process of replacing or making complete Meter Data by using data from redundant meters, schedules, PMS or, if necessary, statistical estimation.

Value Added Network

(VAN)

A data communications service provider that provides, stores and forwards electronic data delivery services within its network and to subscribers on other VANs. The data is mostly EDI type messages.

**Voltage Limits** 

For all substation busses, the normal and post-contingency Voltage Limits (kV). The bandwidth for normal Voltage Limits must fall within the bandwidth of the post-contingency Voltage Limits. Special voltage limitations for abnormal operating conditions such as heavy or light Demand may be specified.

**Voltage Support** 

Services provided by Generating Units or other equipment such as shunt capacitors, static var compensators, or synchronous condensers that are required to maintain established grid voltage criteria. This service is required under normal or System Emergency conditions.

**Waiver Denial Period** 

The period determined in accordance with Section 40.7.6.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

Original Sheet No. 536A

<u>Warning Notice</u> A Notice issued by the ISO when the operating requirements for the

ISO Controlled Grid are not met in the Hour-Ahead Market, or the quantity of Regulation, Spinning Reserve, Non-Spinning Reserve,

Replacement Reserve and Supplemental Energy available to the ISO

does not satisfy the Applicable Reliability Criteria.

**Weekly Peak Demand** 

**Forecast** 

Demand Forecast of the highest Hourly Demand in any hour in a

period beginning at the start of the hour ending 0100 on Sunday and

ending at the end of the hour ending 2400 the following Saturday, in

MW.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

FERC ELECTRIC TARIFF

First Revised Sheet No. 569

THIRD REPLACEMENT VOLUME NO. II

Superseding Original Sheet No. 569

**4.3.3** for the provision of an Ancillary Service or submit a schedule for the self provision of an Ancillary Service unless the Scheduling Coordinator serving that Participating Generator is in possession of a current certificate pursuant to Sections 8.4 and 8.10 of the ISO Tariff.

- 4.4 Obligations relating to Major Incidents
- **4.4.1 Major Incident Reports.** The Participating Generator shall promptly provide such information as the ISO may reasonably request in relation to major incidents, in accordance with Section 4.6.7.3 of the ISO Tariff.
- 4.5 Dispatch and Curtailment. The ISO shall only dispatch or curtail a Net Scheduled QF of the Participating Generator: (a) to the extent the Participating Generator bids Energy or Ancillary Services from the Net Scheduled QF into the ISO's markets or the Energy is otherwise available to the ISO under Section 40.7.4 of the ISO Tariff; or (b) if the ISO must dispatch or curtail the Net Scheduled QF in order to respond to an existing or imminent System Emergency or condition that would compromise ISO Control Area integrity or reliability as provided in Sections 7, 7.3.1, and 11.2.4.2.1 of the ISO Tariff.
- 4.6 Information to Be Provided by Participating Generator. The Participating Generator shall provide to the ISO (a) a copy of the FERC order providing Qualifying Facility status to the Net Scheduled QF listed in Schedule 1, (b) a copy of any existing power purchase agreement with a UDC for the Net Scheduled QF listed in Schedule 1, and (c) a copy or a summary of the primary terms of any agreement for standby service with a UDC or MSS Operator. The Participating Generator shall notify the ISO promptly of any change in the status of any of the foregoing.

#### **ARTICLE V**

#### **PENALTIES AND SANCTIONS**

- Penalties. If the Participating Generator fails to comply with any provisions of this Agreement, the ISO shall be entitled to impose penalties and sanctions on the Participating Generator. No penalties or sanctions may be imposed under this Agreement unless a Schedule providing for such penalties or sanctions has first been filed with and made effective by FERC. Nothing in the Agreement, with the exception of the provisions relating to ADR, shall be construed as waiving the rights of the Participating Generator to oppose or protest any penalty proposed by the ISO to the FERC or the specific imposition by the ISO of any FERC-approved penalty on the Participating Generator.
- **5.2 Corrective Measures.** If the Participating Generator fails to meet or maintain the requirements set forth in this Agreement and/or in the ISO Tariff as limited by the provisions of this Agreement, the ISO shall be permitted to take any of the measures, contained or referenced in the ISO Tariff, which the ISO deems to be necessary to correct the situation.

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

First Revised Sheet No. 829 Superseding Original Sheet No. 829

### D 2.6.1 Tolerance Band and Performance Check

The ISO shall determine the Tolerance Band for each Settlement Interval *o* for PGA resources and dynamically scheduled System Resources based on the data from the Master File as follows:

 $TOLERANCE\_BAND_{i,h,o}$  = Error! Objects cannot be created from editing field codes.

where,

FIX LIM is a fixed MW limit and is initially equal to 5 MW.

TOL\_PERCENT is a fixed percentage and is initially equal to 3%. Pmax<sub>i</sub> is the maximum operating capacity in MW of resource *i* specified in the Master File.

The ISO shall determine the Tolerance Band for each Settlement Interval o for PLA resources as follows:

 $TOLERANCE\_BAND_{i,h,o}$  = Error! Objects cannot be created from editing field codes.

where HAfin<sub>i,h</sub> is the Final Hour Ahead Energy Schedule.

Resources must operate within their relevant Tolerance Band in order to receive any above-Ex Post Price payments. The ISO shall determine the performance status of the resource for each Settlement Interval o. A resource shall have met its performance requirement if its  $UIE_{i,h,o}$  is within its relevant Tolerance Band. A resource meeting its performance requirement in Settlement Interval o will have a PERF\_STAT<sub>i,h,o</sub> = 1. A resource that has not met its performance requirement in Settlement Interval o will have a PERF\_STAT<sub>i,h,o</sub> = 0.

Must-offer resources that produce a quantity of Energy above Minimum Load due to an ISO Dispatch Instruction during a Waiver Denial Period are not subject to the Tolerance Band requirement for purposes of receiving Minimum Load Cost Compensation, as defined in Section 40.8. Accordingly, the PERF\_STAT<sub>i,h,o</sub> for eligible must-offer resources, as defined in Section 40.8, shall be set to 1, irrespective of deviations outside of the Tolerance Band, for the purpose of determining eligibility for Minimum Load Cost Compensation during a Waiver Denial Period. The Tolerance Band shall be used to apply UDP during a Waiver Denial Period.

Non-dynamically scheduled System Resources do not have a Tolerance Band. Non-Participating Load Agreement (PLA) load resources are not subject to the performance requirement.

#### D 2.6.2 Unrecovered Costs Neutrality Allocation

For each Settlement Interval o, the total Unrecovered Costs for Trade Day d shall be allocated pro-rata to each Scheduling Coordinator g based on its Metered Demand, calculated as follows:

Issued by: Charles F. Robinson, Vice President and General Counsel

FERC ELECTRIC TARIFF

THIRD REPLACEMENT VOLUME NO. II

First Revised Sheet No. 833 Superseding Original Sheet No. 833

*UDP\_POS\_AMT*<sub>i,o,h</sub> or *UDP\_NEG\_AMT*<sub>i,o,h</sub> are the penalty amounts in Dollars for either an aggregated or individual resource *i* for Settlement Interval *o* of hour *h*.

The ISO will not calculate UDP settlement amounts for Settlement Intervals when the corresponding Zonal Settlement Interval Ex Post Price is negative or zero.

For an MSS that has elected to follow its own Load, the Scheduling Coordinator for the MSS Operator will be assessed the Uninstructed Deviation Penalty charges based on the Deviation Band and Deviation Price in Section 4.9.9.2 of the ISO Tariff.

### D 2.9 Minimum Load Cost Compensation

The ISO shall calculate a Must-Offer Generator's Minimum Load Cost Compensation (MLCC), pursuant to section 40.8.1 of the ISO Tariff, as the Minimum Load Cost for each resource *i* during Settlement Interval *o* of hour *h*, as defined in section 40.8.4 of the ISO Tariff.

## D 3 Meaning of terms in the formulae

### D 3.1 [Not Used]

### D 3.2 COST\_AT\_STLMT\_PRICE<sub>l.h.o</sub> - \$/MWh

The sum of all dollar amounts from each dispatched bid segment for Energy quantities settled at the Resource-Specific Ex Post Price, for resource i during Settlement Interval o of hour h, and limited to those bid segments with Energy Bid prices below the Maximum Bid Level.

## D 3.3 BID\_COST<sub>i,h,o</sub> - \$/MWh

The sum of all dollar amounts from each dispatched bid portion of Energy quantities settled at the maximum of either the corresponding Energy Bid price for those bids with Energy Bid prices below the Maximum Bid Level or the Bid Floor, for resource i during Settlement Interval o during hour h.

### D 3.4 PRE\_DISP\_ABC\_BQ<sub>i,h,o</sub> - MWh

The pre-dispatched Energy from all Energy Bids with any Energy Bid price above the Maximum Bid Level, for resource i during Settlement Interval o during hour h.

### D 3.5 IIE\_PREDISPATCH\_FOR\_SEGMENT<sub>i,h,o,k,m</sub> - MWh

The pre-dispatched Energy for resource i during Dispatch Interval k of Settlement Interval o of hour h for bid segment m.

D 3.6 [Not Used]

D 3.6.1 [Not Used]

D 3.6.2 [Not Used]

D 3.6.3 [Not Used]

Issued by: Charles F. Robinson, Vice President and General Counsel

Issued on: July 13, 2006

## **CERTIFICATE OF SERVICE**

I hereby certify that I have served the foregoing document upon all parties on the official service list compiled by the Secretary in the above-captioned proceeding, in accordance with the requirements of Rule 2010 of the Commission's Rules of Practice and Procedure (18 C.F.R. § 385.2010).

Dated at Folsom, California this 13th day of July, 2006.

Sidney M. Davies
Sidney M. Davies