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November 15, 2012

VIA ELECTRONIC FILING

Ms. Kimberly D. Bose Secretary Federal Energy Regulatory Commission 888 First Street, NE Washington, DC 20426

California Independent System Operator v. BE CA LLC and J.P. Morgan Ventures Energy Corporation Docket No. EL13- -000

Dear Secretary Bose:

Re:

Please find enclosed for filing in the referenced proceeding a Petition for Declaratory Order and Request for Expedited Treatment ("Petition") and Notice suitable for publication in the Federal Register.

The California Independent System Operator Corporation ("ISO") requests that the Commission: (1) shorten the time for responses to this Petition so that such submissions are due by November 29, 2012; (2) upon consideration of any answers or protests, issue a declaratory order finding that consent by BE CA LLC and J.P. Morgan Ventures Energy Corporation ("J.P. Morgan") is not necessary to either the Reliability Must-Run agreement filed in Docket No. ER13-351 or the synchronous condenser project described in the accompanying Petition; (3) in the event no such answer is filed, determine that there is no objection to this request and to promptly grant the relief requested; and (4) if a substantive answer or protest in opposition is filed, establish the settlement procedures described in the Petition.

In accordance with section 381.302(a) of the Commission's regulations and the Annual Update of Filing Fees posted on the Commission's website, payment of the filing fee associated with the Petition in the amount of \$24,860 is being made electronically as part of this filing.

Kimberly D. Bose Secretary Federal Energy Regulatory Commission Docket No. EL13-November 15, 2012 Page 2 of 2

A copy of this Petition was served on the contacts for the BE CA LLC and J.P. Morgan as listed on the Commission's list of Corporate Officials via certified mail and email:

Ike Gibbs Executive Director - Compliance Director & Assistant General Counsel J.P. Morgan Global Commodities 700 Louisiana Street, Suite 1000 Houston, TX 77002 Telephone: 713-236-3322

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Please do not hesitate to contact the undersigned if you have any questions regarding this matter.

Very Truly Yours,

Counsel for the California Independent

System Operator Corporation

UNITED STATES OF AMERICA BEFORE THE FEDERAL ENERGY REGULATORY COMMISSION

California Independent System Operator Corporation,)
Petitioner)
v.) Docket No. EL13000
BE CA LLC)
and)
J.P. Morgan Ventures Energy Corporation,)
Respondents)

PETITION OF CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION FOR DECLARATORY ORDER AND REQUEST FOR EXPEDITED TREATMENT

In accordance with the provisions of Rules 207(a)(2) and 212 of the Commission's Rules of Practice and Procedure, the California Independent System Operator Corporation ("ISO") respectfully requests that the Commission issue a declaratory order to enforce the exercise of its authority and rights under its tariff to obtain reliability services under a Reliability Must–Run ("RMR") agreement with AES Huntington Beach LLC ("AESHB").

The ISO requests this Order to prevent the need to rely on an unprecedented load shedding scheme if certain transmission outages were to occur during the 2013 summer peak period in Southern California, in light of the anticipated unavailability of the San Onofre Nuclear Generating Station ("SONGS"). Although the ISO and AESHB have executed and filed an RMR agreement with the Commission that would enable the ISO

to avoid this scenario through the provision of needed voltage support, a condition of the effectiveness of the agreement is that consent from BE CA, LLC ("BE CA"), a J.P. Morgan Chase and Co. subsidiary, must be secured if it is required under existing agreements between AES and J.P. Morgan. AESHB is apparently unwilling to proceed with the project if it is exposed to the potential for claims of breach of contract. As a result, AESHB sought to remove uncertainty either by securing consent from J.P. Morgan or an agreement that J.P. Morgan's consent was not required. To date, J.P. Morgan has withheld consent or other acknowledgement that would allow the RMR agreement to become effective. The ISO contends that such consent is not required under the applicable agreements, and requests that the Commission declare that the agreements do not require such consent. That conclusion is compelled by the terms of the applicable agreements and the compelling public interest in the need to avoid reliance on a wide-spread load-shedding scheme.

Huntington Beach Units 3 and 4 ("Huntington Beach 3 and 4" or "Units 3 and 4"), the resources subject to the RMR agreement, must be converted from their current state of being inoperable generating units into synchronous condensers to provide dynamic voltage support. This must occur under a timeline that results in a commercial operation date in June 2013. To meet the June 2013 commercial operation date, work had to begin in October of this year, and construction must commence in early 2013 for the facilities to be operable in time to support reliability in Southern California. The inability to resolve the consent issue in time to allow construction to commence in early 2013 could leave Southern California exposed to reliance on a wide-spread load-

shedding scheme during the summer of 2013 in the event of certain transmission outage contingencies.

It is critical that the Commission act promptly to resolve this matter either on the merits or with the intercession of a settlement judge within the limited time available.

I. <u>EXECUTIVE SUMMARY</u>

Since January 2012, SONGS Units 2 and 3 have been out of service and no date has been established for them to be reactivated. In addition to the loss of significant generating capacity, the absence of SONGS presents reliability challenges particularly during the summer months. Specifically, voltage support is required in the general vicinity of SONGS during peak demand periods to avoid load-shedding in the event of transmission line failures identified in the ISO's contingency planning process.

AESHB operates the Huntington Beach Generation Station which currently consists of four units: Units 1, 2, 3 and 4. Although sharing a common name, these units are separately housed and operate independently of one another. AESHB owns Units 1 and 2. Units 1 and 2, along with other Southern California assets located in the Los Angeles Basin local area, were the subject of a Tolling Agreement between various subsidiaries of AES Corporation ("the AES Subsidiaries") and Williams Energy Company ("Williams"), ¹ and are now controlled by J.P. Morgan under that agreement.

The Tolling Agreement does not apply to Huntington Beach 3 and 4. Huntington Beach Units 3 and 4 were rendered nonoperational in 1995. The AES Corporation later invested the funds necessary to bring Units 3 and 4 back into service in 2002. Although

¹ BE CA succeeded to Williams' interests under the Tolling Agreement. BE CA later merged into J.P. Morgan Ventures Energy Corporation ("JPMVEC"). Unless the context requires otherwise, this pleading refers to BE CA and JPMVEC as "J.P. Morgan."

AESHB retired Huntington Beach 3 and 4 at the end of 2011, during the summer of 2012, the ISO was able to avoid reliability problems by expediting transmission upgrades and by arranging for those two units to return to service, temporarily. However, Huntington Beach 3 and 4 are no longer available for service as generating units because, with the termination of their air permits, the units had to be rendered physically incapable of future operation as generators.

The ISO's most recent local capacity study identified the need for additional voltage support to protect load in the Los Angeles Basin and the San Diego/Imperial Valley local capacity areas. The study identified two projects that together can resolve the present and projected voltage support deficiency: 1) the installation by Southern California Edison ("SCE") of shunt capacitors at three substations to provide static voltage support, and 2) the conversion of Huntington Beach 3 and 4 to synchronous condensers to provide dynamic voltage support. As discussed in detail in the declaration of Robert Sparks, an ISO transmission planning engineer, submitted with this Petition, this solution is the only viable means that the ISO has been able to identify (other than reliance on a load shedding scheme) to meet reliability needs in these local capacity areas in time for the summer of 2013, when the voltage support is most critically needed.

Accordingly, under Section 41.2 of the ISO tariff, the ISO Governing Board designated Huntington Beach 3 and 4 as RMR units, designated Southern California Edison Company and San Diego Gas & Electric Company as the responsible utilities for purposes of cost recovery under a Reliability Must-Run agreement, and authorized ISO management to enter into an RMR agreement for voltage support for the 2013 contract year.

In order to be able to make the financial commitments to Siemens Energy, Inc. ("Siemens"), the vendor of the synchronous conversion project, AESHB, the ISO, Southern California Edison Company and San Diego Gas & Electric Company negotiated significant rates, terms, and conditions to provide the needed voltage support by June 1, 2013. These are reflected in the RMR agreement that AESHB and the ISO jointly filed on November 9, 2012 in Docket No. ER13-351-000.

In most respects, the Reliability Must-Run agreement is consistent with the *pro* forma version in the ISO tariff, but as pertinent here, it also includes conditions precedent to its effectiveness.

One of those conditions relates to securing either waiver of consent or consent from BE CA, to the extent it may be required under the existing agreements between AESHB and BE CA by January 7, 2012, although there is a possibility that such date may be extended, as provided in Schedule B attached to the Reliability Must-Run agreement. Schedule B recognizes that AES Southland Holdings, LLC, an affiliate of AESHB, the entity that has contracted with Siemens Energy Inc. ("Siemens") for the purchase and installation of the synchronous condensers, has a discretionary right to defer the commencement of work on the synchronous condenser project to allow additional time for the matter of consent to be resolved. Under any circumstance, AES Southland Corp.'s rights to defer the Siemens contract are limited, and, as a practical matter, the longer the project is delayed, the less likely the synchronous condensers will be available for summer 2013.

During the course of the negotiations over the Reliability Must-Run agreement AESHB sought consent from J.P. Morgan² to go forward with the synchronous condenser project located at Units 3 and 4. The ISO understands that J.P. Morgan has declined to provide consent so far. Of course, if J.P. Morgan provides or waives such consent, or provides acknowledgement that it has no right to consent, the ISO will have no need to pursue this matter and the ISO will withdraw this petition. In meantime, however, the ISO has no choice but to seek the Commission's confirmation that no such consent right exists under the contracts.

As shown below, neither of the two agreements that govern the relationship between AESHB and J.P. Morgan provide the latter with any right to consent to, or otherwise interfere with, the Reliability Must-Run designation proposed for Huntington Beach 3 and 4. The primary agreement, which was filed with the Commission in 1998, makes no mention of Huntington Beach 3 and 4 and does not include any provisions that properly could be construed to allow BE CA to block this RMR agreement or the synchronous condenser project. An additional, contemporaneously-executed agreement ("Supplemental Agreement") was not filed with the Commission. But while it establishes certain specific consent rights they do not apply to a project of the kind proposed in the Reliability Must-Run agreement. Even if the Supplemental Agreement could be construed to create some consent right, it would be unenforceable because it had never been submitted to the Commission, and if either the Tolling Agreement or the Supplemental Agreement establish an implied right of consent, it should be modified in light of the compelling public interest in maintaining reliability.

² The ISO was not privy to the communications between AESHB and the J.P. Morgan entity and cannot verify which J.P. Morgan entity responded to AESHB's request.

Accordingly, the ISO asks the Commission to confirm that:

- The contracts between AESHB and BE CA do not provide any legal right for BE CA or any other J.P. Morgan entity to consent to, or otherwise interfere with, the Reliability Must-Run designation proposed for Huntington Beach 3 and 4;
- Even if such a right existed, it would be unenforceable because the Commission had never been informed that any J.P. Morgan affiliate had such control over Huntington Beach 3 and 4;
- Any such contract right would have to be modified under section 206 of the Federal Power Act because of the compelling public interest presented by the potential for substantial load-shedding.

Because of the urgent nature of this request, the ISO requests expedited and exceptional treatment of this request in four ways:

- The ISO requests that the Commission determine that BE CA and J.P. Morgan Ventures Energy Corporation ("JPMVEC") are necessary parties to this proceeding and are deemed to be parties under Rules 102(c)(2) and 102(f)(3);
- The ISO requests that the Commission shorten the time for responses to this petition so that they would be due to be filed by November 29, 2012. J.P. Morgan certainly is aware of the issues presented and, it is fair to conclude, has considered the matter of its consent.
- The ISO requests that the Commission act as promptly as possible on the merits of this request before January 7, 2013, to permit the Reliability Must-Run agreement to become effective by its own terms; and
- In the event a substantive answer or protest in opposition to this petition is submitted, the ISO requests that without delaying the Commission's timing for the issuance of a decision on the merits, the Commission also establish accelerated and limited settlement procedures, to ensure that every effort has been expended to try to reach a pragmatic solution to the problem faced by California consumers.

In support of this request, the ISO states as follows:

II. <u>COMMUNICATIONS</u>

Correspondence and communications regarding this pleading should be directed to the following persons:

Nancy Saracino,³ General Counsel Roger Collanton, Deputy General Counsel Sidney M. Davies, **Assistant General Counsel** Burton A. Gross, Assistant General Counsel California Independent System **Operator Corporation** 250 Outcropping Way Folsom, CA 95630 Phone: (916) 351-4400 Fax: (916) 351- 4436 NSaracino@caiso.com RCollanton@caiso.com SDavies@caiso.com BGross@caiso.com

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III. <u>IDENTITY OF RELEVANT ENTITIES</u>

The California ISO is a non-profit public benefit corporation organized under the laws of the State of California, with a principal place of business at 250 Outcropping Way, Folsom, CA 95630. The ISO is the balancing authority responsible for the reliable operation of the electric grid, which comprises the generation and transmission systems of a number of facilities placed under the ISO's operational control. The ISO operates markets for energy and ancillary services under the provisions of the ISO Open Access Transmission Tariff ("ISO tariff").

³ Designated to receive service in accordance with Rule 203(b)(3), 18 C.F.R. § 385.203(b)(3). The ISO also requests that all counsel identified above be included in the service list maintained by the Commission's Secretary.

BE CA is a Delaware corporation and a wholly-owned subsidiary of JPMVEC. BE CA maintains a place of business at 700 Louisiana Street, Suite 1000, Houston, TX 77002. BE CA obtained market-based rate authority in Docket No. ER07-1113-000, BE Allegheny LLC, Docket Nos. ER07-1112-000, et al., by a letter order issued August 9, 2007. BE CA is the successor to Williams Energy Services Company's interest in a tolling agreement with and AESHB that applies to Huntington Beach Units 1, 2 and 5, but not to Huntington Beach Units 3 and 4. BE CA is an affiliate of JPMVEC. BE CA is currently an active participant in ISO markets.

JPMVEC is a Delaware corporation with principal offices in New York, New York, and Houston, Texas. JPMVEC's New York address is 383 Madison Avenue, 10th floor, New York, NY 10017. JPMVEC is an indirect subsidiary of J.P. Morgan Chase and Co. In 2005, the Commission authorized JPMVEC to sell electric energy, capacity, and ancillary services at market-based rates in several regions, including the ISO markets. JPMVEC submits change of status filings to the Commission for itself and its affiliates, including BE CA. JPMVEC is currently a participant in ISO markets, although the Commission temporarily suspended its market-based rate authorization effective April 1, 2013 in an order issued in Docket No. EL12-103-000 on November 14, 2012.

AES Huntington Beach, LLC ("AESHB") is a limited liability company organized under the laws of the State of Delaware and it is a subsidiary of AES Corporation ("AES"). AESHB maintains a place of business at 21730 Newland

⁴ See J.P. Morgan Ventures Energy Corp., 112 FERC ¶ 61,322 (2005).

⁵ 141 FERC ¶ 61,131 (2012).

Street, Huntington Beach, California. As detailed below, AEHSB owns Units 1 and 2 and operates Units 3 and 4 at the Huntington Beach Generating Station in Huntington Beach, California. Huntington Beach Units 1, 2, 3 and 4 are the subjects of Participating Generator Agreements between AESHB and the ISO.

Until the recent retirement of Units 3 and 4, AESHB operated the Huntington Beach Generating Station, as a four-unit (Units 1-4) natural gas fired generating facility with a total generating capacity of approximately 904 MW⁶ located on the southern California coast in the city of Huntington Beach, within the balancing authority area operated by the ISO.⁷ Although the Units are in the same general location, they are housed separately and they operate independently of one another.

IV. BACKGROUND

A. THE SHUT DOWN OF SONGS, THE ISO'S PROJECTIONS OF THE POTENTIAL FOR LOAD SHEDDING AND THE ONLY AVAILABLE REMEDY

After the initial shut down of SONGS, the Nuclear Regulatory Commission ("NRC") confirmed that SONGS Units 2 and 3 will be unavailable until the NRC has completed its review of specified inspections, assessments, and future protocols. ⁸

As recounted in detail in the Declaration of Mr. Robert Sparks, included in Appendix A to this petition, each year the ISO performs a local capacity requirement ("LCR") study to provide information for resource adequacy procurement. ⁹ The

⁶ Huntington Beach Units 1 and 2 each have a nameplate capacity of 226 MW. Huntington Beach Unit 3 has a nameplate capacity of 225 MW, and Huntington Beach Unit 4 has a nameplate capacity of 227 MW.

⁷ The Huntington Beach Generating Station previously also included Unit 5, a multiple jet turbine peaker unit with a nameplate capacity rating of 150 MW.

⁸ See NRC Agency wide Documents Access and Management System Accession Number ML12086A182.

⁹ An LCR determines the minimum amount of resources within a local capacity area (often called the local capacity requirement) needed to address reliability concerns following the occurrence of various

components of the annual LCR analysis are specified in section 40.3.1.2 of the ISO's Tariff and in reliability standards adopted by NERC and WECC. Among other things, the study requires that the ISO plan for contingencies such as the loss of transmission facilities while local generation is out of service, thus ensuring that the ISO can contain potentially widespread and serious system impacts that otherwise might result from the loss of transmission and generation facilities.

The ISO completed and published the results of its 2013 local capacity technical analysis in April 2012. That analysis assumed that SONGS would be operational in the summer of 2013. However, once it became apparent that the SONGS units might not be operational for the summer of 2013, the ISO updated its analysis with an addendum that considered the impact on the local capacity areas in Southern California assuming that the SONGS units remain non-operational throughout 2013. The ISO's analysis assumes that and that all other resources generally would be available, including Huntington Beach Units 1 and 2 and generating units located at the Redondo Beach and Alamitos generating stations, facilities controlled by J.P. Morgan. A copy of the Addendum is included in Appendix B.¹⁰

The ISO's analysis determined that, in the event of an N-1-1 contingency during high load conditions, there would be insufficient reactive power in the vicinity of the SONGS units to prevent potentially serious voltage support issues, including potential voltage collapse, in the absence of the use of a wide-scale load-shedding scheme of unprecedented magnitude.

contingencies on the electric system.

¹⁰ Both the initial 2013 local capacity technical analysis and the August addendum are available on the ISO's website at

http://www.caiso.com/informed/Pages/StakeholderProcesses/LocalCapacityRequirementsProcess.aspx.

In order to avoid the need to rely upon such a load-shedding scheme, the ISO diligently investigated the potential options for enhancing voltage support that potentially could provide the necessary voltage support. As Mr. Sparks demonstrates, while many options were considered, none other than the synchronous condenser combined with other projects feasibly could be implemented to mitigate the risk of load shedding within the relatively short time available, particularly in light of the highly localized nature of the voltage support needed.¹¹

Using Huntington Beach 3 and 4 for generation was not an option because those units were to lose their air permits and as a result, the generators at Huntington Beach 3 and 4 had to be rendered inoperable, as shown in the Order of the South Coast Air Quality Management District attached in Appendix C. 12

The ISO found that the only viable solution to supply needed voltage support is to install the following combination of reactive support facilities that would mitigate both the voltage instability and related low voltage issues in the vicinity of SONGS:

- one 80 MVAR shunt capacitor at Johanna Substation,
- one 80 MVAR shunt capacitor at Santiago Substation,

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¹¹ Appendix A, Sparks Declaration at P 29.

¹² The Clean Air Act requires that states and local jurisdictions, such as the South Coast Air Basin (in which Huntington Beach Units 3 and 4 are located), that have not attained the federal ambient air quality standards, adopt permitting programs for major new sources of air pollution that ensure no net increase in emissions. *See, e.g.*, 42 U.S.C. § 7503(a)(1)(A). In order to obtain a license from the California Energy Commission or a permit to construct from the South Coast Air Quality Management District, the owner/operator of the Walnut Creek Energy Park ("WCEP") either had to provide emission reduction credits to offset air emissions from the proposed WCEP pursuant to the South Coast Air Quality Management District Rule 1303(b)(2), or to demonstrate that it was exempt from the requirement. The owner/operator of WCEP demonstrated that it qualified for an exemption under Rule 1304(a)(2), based on that owner's commitment to retire Huntington Beach 3 and 4 by no later than October 31, 2012. This relationship between WCEP and Huntington Beach 3 and 4 is embodied in the permits and approvals for WCEP.

- two 80 MVAR shunt capacitors at Viejo Substation¹³, and
- the conversion of Huntington Beach 3 and 4 to synchronous condensers capable of producing 290 MVARs of dynamic reactive power.

As Mr. Sparks explains, without this solution the ISO will need to arm a load shedding scheme for Southern California that could result in dropping up to 800 MW of load in densely populated areas of San Diego if certain contingency conditions were to come to pass. ¹⁴ This would represent nearly one-sixth of the total peak load in San Diego. The solution the ISO has identified will also prevent the need to arm a load-shedding scheme for large amounts of additional load in Orange County in order to address voltage support concerns that could also be impacted under other contingencies that the ISO is required to plan for under applicable mandatory reliability standards.

The ISO does not support reliance on a wide-spread load shedding scheme as a suitable response to the voltage stability concerns that its analysis identified.

B. THE ISO'S RELIABILTY MUST-RUN TARIFF AUTHORITY AND THE DESIGNATION OF HUNTINGTON BEACH UNITS 3 AND 4 FOR RELIABILTY SERVICE

Pursuant to Section 41.2 of the ISO tariff, the ISO may at any time, based upon technical analyses of the ISO-controlled grid, designate a generating unit as a Reliability Must-Run unit. The ISO then enters into a Reliability Must-Run contract with the owner or operator pursuant to Section 41.3 of the ISO Tariff, with the rates for service subject to

¹³ The three Substations where the shunt capacitors will be installed are owned and operated by Southern California Edison Company. As Mr. Sparks explains, the shunt capacitors and the synchronous condensers work together to address the voltage support needs in the vicinity of SONGS. Adding shunt capacitors along with the synchronous condensers also will provide important protection against under-voltage conditions in Orange County resulting from a different contingency and, in that context, will avoid the need for additional load shedding schemes in that area. Appendix A, Sparks Declaration at P 12.

¹⁴ Appendix A, Sparks Declaration at P 24.

negotiation between the ISO and the resource owner or ultimate resolution by the Commission. The *pro forma* Reliability Must-Run agreement was approved by the Commission and is included in Schedule G to the ISO Tariff. ¹⁵ The *pro forma* RMR agreement is modified for particular units only as necessary to address the particular circumstances of a given designation.

In response to the ISO's designation of Huntington Beach 3 and 4 for Reliability Must-Run service and after reaching an agreement that provides assurance to AES Southland Holdings, LLC, AESHB's indirect parent company and AESHB that the costs for the conversion to synchronous condensers will be covered, ¹⁶ on October 15, 2012, AES Southland Holdings, LLC entered into an agreement with Siemens for the conversion of Huntington Beach 3 and 4 to synchronous condensers. ¹⁷ The Siemens agreement will be transferred from AES Southland Holdings to AESHB upon receipt of the third party consents or confirmations in connection with any required pre-existing contractual arrangements so that AESHB can proceed with the synchronous condenser project.

The consents or confirmations, if they are required, also are conditions precedent to the effectiveness of the RMR agreement. Subject to AESHB's receipt of the consents

¹⁵ See Cal. Indep. Sys. Operator Corp., 87 FERC ¶ 61,250 (1999).

¹⁶ The ISO, AES, and the responsible utilities, SCE and SDG&E, with the California Public Utilities Commission participating, negotiated related agreements that, collectively, identifies the significant rates, terms, and conditions to be included in an RMR agreement and provides backstop reimbursement for AES in the event costs could not be recovered under an RMR agreement.

¹⁷ Synchronous condensers can provide RMR Service. Schedule E and Schedule G of the *pro forma* Reliability Must-Run agreement provide for voltage support from synchronous condensers. In addition, the Commission previously has allowed synchronous condensers to be subject to the ISO's Reliability Must-Run agreement. *See, e.g., California Independent System Operator Corp.*, 87 FERC ¶ 61,250 (1999) (approving the Reliability Must-Run agreements for many facilities, including units that only had synchronous condensers). Further, a unit that is only capable of providing voltage support and not energy or other types of ancillary services has also been permitted to provide Reliability Must-Run service in other ISO's. *See, e.g., Pittsfield Generating Co., L.P.*, 115 FERC ¶ 61,059 (2006).

or confirmations, Siemens will manufacture and install two synchronous condensers at the Huntington Beach 3 and 4 site with a commercial operation date of June 1, 2013.¹⁸ As synchronous condensers, Huntington Beach 3 and 4 will not require a source of combustion to operate. Therefore, no air emissions credits are required.

Although AESHB and the ISO filed an executed RMR agreement with the Commission on November 9, 2012, because of its uncertainty concerning the consent right, AESHB is apparently unwilling to proceed with the synchronous condenser project if it is exposed to the potential for claims of breach of contract. As a result, AESHB sought to remove uncertainty either by securing consent from J.P. Morgan or an agreement that J.P. Morgan's consent was not required.

Specifically, the article 2.1(a) provides in relevant part:

(a) This Agreement shall become effective on the latest to occur of (1) January 1, 2013, (2) the date it is permitted to become effective by FERC, or (3) the satisfaction of the following conditions precedent as set forth in this Section 2.1(a) on or before the applicable date set forth in each such condition precedent, as such dates may be extended as provided in Schedule B, ¹⁹ in each case on terms and conditions acceptable to Owner in its reasonable discretion:

* * *

- (iii) Receipt, on or before January 7, 2013, of such consent, confirmation or other acknowledgment as may be required from BE CA LLC ("BE CA") under the existing agreements between Owner and BE CA, to the effect that:
 - (x) while reserving on any determination as to whether Owner's participation in the Synchronous Condenser Transaction requires any consent or waiver by BE CA

¹⁸ The Siemens contract, executed on October 15, 2012, requires substantial payments and provides for completion of certain milestones prior to January 7, 2013. Subject to limited rights exercisable by AESHB, the Siemens contract can be terminated if the conditions are not satisfied by January 7, 2013.

¹⁹ Section 2.1(a) of the RMR agreement provides that AESHB has discretion to agree to an extension of the effective date of the RMR.

under such contractual agreements between BE CA and Owner, BE CA agrees that it will not claim that any such participation constitutes a breach or violation of any such contractual arrangement, or

- (y) BE CA confirms that its consent or waiver is not required under such contractual agreements between BE CA and Owner in connection with or as a result of Owner's participation in the Synchronous Condenser Transaction, or
- (z) BE CA consents to Owner's participation in the Synchronous Condenser Transaction for all purposes of such contractual agreements between BE CA and Owner;

C. J.P. MORGAN'S WITHHOLDING OF CONSENT

The ISO is not a party to the contracts between AESHB and J.P. Morgan and has not been provided with specifics of the communications between those parties regarding the consent issue, beyond being told that J.P. Morgan asserted it has consent rights and to date has been unwilling to provide consent or waive it. J.P. Morgan's consent would be necessary only if it has an enforceable right pursuant to a provision of a contract between AESHB and J.P. Morgan.

Based on its own review of these agreements and the Commission's orders respecting them, the ISO submits that there is no such enforceable right. The contracts between AESHB and J.P. Morgan do not apply to Huntington Beach 3 and 4. Even if they did, the Commission has authority to modify any such contract provision without voiding the contract.

J.P. Morgan's failure to provide or waive any consent right has created uncertainty for AESHB and the AES Corporation, which in turn jeopardizes the synchronous condenser project, undermines the ISO's authority to enforce its tariff authority to obtain reliability service and imposes risk for the people of California. The ISO seeks to trigger the removal of that uncertainty by its filing of this request.

D. ROLE OF THE FOREGOING FACTS

The recitation of the foregoing facts provides background information and context about the circumstances in which the ISO and affected consumers have been placed and explains the desirability of urgent Commission attention to this petition. The rulings sought by the ISO, however, do not involve a factual dispute. Rather, they involve the disposition of the narrow legal questions based on the analysis of contracts, tariffs and Commission precedent.

V. BASIS FOR RULINGS SOUGHT

A. THE COMMISSION SHOULD EXERCISE ITS JURISDICTION TO MAKE THE REQUESTED DETERMINATIONS

The Commission should assert its primary jurisdiction to interpret the contracts setting out the terms and conditions of the commercial relationship between AESHB and J.P. Morgan.

The Commission applies a three-part test to determine whether it will exercise primary jurisdiction in any matter, in which it considers: (1) whether the Commission possesses some special expertise which makes the case peculiarly appropriate for Commission decision; (2) whether there is a need for uniformity of interpretation of the type of question raised by the dispute; and, (3) whether the case is important in relation to the regulatory responsibilities of the Commission.²⁰

This is a case in which the issues presented in connection with the contract require the Commission's special expertise. The issues involve determinations respecting questions of the reliability of the interstate transmission grid, matters relating to capacity markets and voltage support that are likely to be foreign to a court, and involve terms that

²⁰ Arkansas Louisiana Gas Co. v. Hall, 7 FERC ¶ 61,175, reh'g denied, 8 FERC ¶ 61,009 (1979) ("Arkla").

express "absolute," rather than "relative" concepts, meaning that the specifics of the terms do not "vary depending on the words used by the contracting parties," and are clearly in the Commission's realm of expertise. ²¹ Also involved is an evaluation of the application of the Reliability Must-Run provisions of the ISO's tariff and whether a commercial agreement between two parties can interfere with the operation of the markets that the Commission regulates.

Moreover, allowing courts to determine cases like this has the potential to impair the uniformity of interpretation of the questions presented that is required by a comprehensive scheme of regulation. The possibility of inconsistencies in judicial rulings from court to court could result in inconsistencies not only between organized markets, but even within an organized market—clearly an unacceptable outcome.

In its consideration of the second *Arkla* factor, the Commission looks to whether the contract interpretation affects others beyond the two parties involved.²² This is not a bilateral commercial dispute that affects no other party. Rather, the agreement in this proceeding affects consumers of electric power throughout Southern California – if the agreements are not interpreted to allow the ISO or AES to designate HB 3 and 4 as RMR, or the conversion of HB 3 and 4 to operate as synchronous condensers, the reliability of service in Southern California is in great jeopardy. Moreover, the case is important in relation to the Commission's regulatory responsibilities. The outcome of this case will

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²¹ Puget Sound Power & Light Co., 74 FERC ¶ 61,192 (1996).

²² See, e.g., BG Energy Merchants, LLC and EXCO Operating Co, LP v. Crosstex LIG, LLC, 136 FERC ¶ 61,098 (2011) (stating that there was no need for uniformity of interpretation because there was no showing that it would "affect any parties other than the parties to the Agreements"); Niagara Mohawk Power Corp. v. Rochester Gas and Elec. Corp., 98 FERC ¶ 61,037 (2002); Puget Sound Power & Light Co., 74 FERC ¶ 61,192 (1996) (declining to exercise primary jurisdiction over a contractual dispute because "[a]n interpretation of this language will not impinge significantly on the operations of public utilities across the nation").

have a direct and immediate effect on the reliability of service provided on the intestate grid, a function at the core of the Commission's regulatory responsibilities.

Moreover, the Commission already has determined not only that the general kind of agreement at issue in the petition must be before the Commission in pursuit of its regulatory program; it has held that to be so for this particular contract. The Commission required the Tolling Agreement to be filed in its entirety with the Commission (over the parties' objections) in order "to allow the Commission to evaluate the reasonableness of the charges and to provide for ongoing monitoring of the marketer's ability to exercise market power." ²³

This latter finding demonstrates the necessity of the Commission's involvement in the interpretation of contract terms that affect the operation of jurisdictional markets, in contrast to interpreting contracts because of a purely bilateral contract dispute that affects only the commercial interests of the contracting parties.

Moreover, as discussed below other portions of the relief requested require the Commission's peculiar expertise and the evaluation of Commission-approved ISO tariff. A court could not become involved without interfering with the Commission's jurisdiction.

Determining whether a commercial contract for the sale of wholesale power is consistent with or subject to the ISO's tariff is a subject for the Commission's expertise in light of the fact that the Commission establishes the rules of how organized markets operate. The Commission, not a court, should be making determinations regarding the justness and reasonableness of contracts under section 206 of the Federal Power Act.

 $^{^{23}}$ AES Huntington Beach, LLC, 83 FERC ¶61,100 (1998), reh'g denied, 87 FERC ¶ 61,221 (1999).

Plainly put, this is a case that involves issues uniquely within the Commission's competence to address and is not the kind of case a court should or could consider.

B. J.P. MORGAN HAS NO RIGHTS REGARDING HUNTINGTON BEACH 3 AND 4 UNDER THE TOLLING AGREEMENT

AESHB and J.P. Morgan are parties to two agreements regarding generation facilities in California, but neither agreement gives J.P. Morgan the right to consent to the conversion of Huntington Beach 3 and 4 to synchronous condensers. As shown below, these agreements do not apply to Huntington Beach 3 and 4 and do not impose any consent right for non-covered units that could prevent this transaction from going forward.

1. Tolling Agreement Background

On May 1, 1998, various named subsidiaries of AES Corporation, including AESHB, entered into a Capacity Sale and Tolling Agreement and a Supplemental Agreement with Williams Energy Services Company ("Williams"). ²⁴ The Tolling Agreement and the Supplemental Agreement are attached hereto as Appendix D. The agreements are publicly available on the website of the California Department of Water Resources. ²⁵

When the Tolling Agreement was submitted to the Commission for its approval on a non-public basis, the Commission required the agreement to be filed publicly. A

²⁴ A public version of the Tolling Agreement was filed with the Commission on July 15, 1999 in Docket No. ER98-2184-000, *et al. See AES Huntington Beach, L.L.C., et al.*, 87 FERC ¶ 61,221 at 61,877 (1999) ("We will deny rehearing and reaffirm that the AES Companies must file their long-term service agreements, including the Tolling Agreement, in unredacted, non-confidential form."). Appended to the Tolling Agreement are other Agreements between AES and Williams including a Supplemental Agreement executed contemporaneously with the Tolling Agreement.

http://www.cers.water.ca.gov//pdf_files/power_contracts/williams/111902wllmsPPA.pdf.

public version of the Tolling Agreement was filed with the Commission on July 15, 1999 in Docket No. ER98-2184-000, et.al. ²⁶

The Supplemental Agreement, which was executed by the parties to it on a contemporaneous basis, states that the two agreements constitute the "entire agreement" between the parties. To the best of the ISO's knowledge, the Supplemental Agreement was not filed with the Commission.

The AES subsidiaries were granted approval by the Commission for the transfer to Williams of control of facilities specified in the Tolling Agreement that were subject to RMR agreements.²⁷ As is clear from the contract listing of the Facilities to which the Tolling Agreement applies (Schedule A), this did not include HB Units 3 and 4.

In 2007, the Tolling Agreement was assigned to BE CA with the approval of the Commission. The Commission's approval of transfer of the Tolling Agreement to BE CA was based on the representation that BE CA did not possess anti-competitive control over other actual or potential resources besides those actually covered by the Tolling Agreement. As recounted in the Commission's order, BE CA had stated that:

The Commission requires an applicant for market-based rates to show that it cannot erect barriers to entry by exercising control over resources such as potential generating sites or fuel supplies that would be required by potential future competitors. Neither Applicant nor its affiliates control any interstate fuel transportation systems that could be used to impede downstream generators from gaining access to low-cost gas supplies in the relevant geographic markets. Applicant and its affiliates do not have dominant control over equipment supplies such as gas turbines. Applicant and its

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²⁶ See AES Huntington Beach, L.L.C., et al., 87 FERC ¶ 61,221 at 61,877 (1999). "We will deny rehearing and reaffirm that the AES Companies must file their long-term service agreements, including the Tolling Agreement, in unredacted, non-confidential form." Id.

²⁷ AES Alamitos, L.L.C., 84 FERC ¶ 62,130 (1998).

<u>affiliates also do not own potential generating sites in the</u> relevant markets.

Based on these facts, Applicant and its affiliates cannot erect barriers to entry that would prevent competitors from participating in the relevant markets.

BA CE Application, July 29, 2007, Docket No. EC07-1117-000 (emphasis supplied), *approved*, Letter Order, August 9, 2007 (unpublished).

2. Nature of the Relationship Created by the Tolling Agreement: It Does Not Establish Any Consent Right Regarding HB 3 and 4

The Tolling Agreement specifies the terms and conditions under which AES Subsidiaries, including AESHB²⁸ are to sell and make available, on an exclusive basis, Dependable Capacity of specific generating units.²⁹ The Agreement establishes an exclusive relationship between the AES Subsidiaries and J.P. Morgan but only for those generating units specifically covered by the Agreement. Huntington Beach Units 3 and 4 are not included within the exclusive relationship.

Specifically, section 2.3 of the Tolling Agreement provides, in part, as follows:

Exclusive Nature of Agreement. The relationship between [J.P. Morgan] and the AES Subsidiaries with respect to the Facilities, their Capacity, and the Fuel Conversion Services is exclusive. The AES Subsidiaries shall not offer, sell or make available any Unit's Capacity, perform Fuel Conversion Services or, except pursuant to Section 8.3, dispatch any Unit to or for any Person other than [J.P. Morgan] or its successor or permitted assigns; provided, however, that the use of Capacity and associated electric energy by the AES Subsidiaries for the station power needs of the Facilities is permitted.

The Tolling Agreement in turn defines "Facilities" as "the electric generating facilities described on Schedule A . . . and includes all associated Interconnection

²⁸ Other AES Subsidiaries included among the parties to the Tolling Agreement are AES Alamitos, LLC and AES Redondo Beach, LLC.

²⁹ Tolling Agreement, Section 2.1.

Facilities, and Protective Apparatus." Schedule A identifies Units 1, 2 and 5³⁰ at the Huntington Beach Generating Station, but not Units 3 and 4. The Agreement makes clear that J.P. Morgan's rights at Huntington Beach under the Agreement are limited to Units 1, 2, and 5, 31 and do not encompass any entitlements or rights regarding Units 3 and 4 – the Units which AESHB seeks to convert to synchronous condenser operations and over which J.P. Morgan purports to exercise consent rights.

3. The Tolling Agreement Restricts Impairment of Dependable Capacity at the Units to Which it Applies

The Tolling Agreement also does not include any applicable consent provisions for J.P. Morgan. The only "consent" provision in the Tolling Agreement that ISO has identified appears in Section 4.5. Specifically, Section 4.5 provides:

The AES Subsidiaries will not permit the Dependable Capacity of the Facilities to be reduced except (i) with the consent of [J.P. Morgan], which may be withheld in [J.P. Morgan's] sole and absolute discretion if such reduction would have an adverse effect on the economic benefit to be derived by [J.P. Morgan] from the Facilities or on the [ISO's] designation of the Facilities as must-run, or (ii) as permitted pursuant to Section 4.1.

This provision does not provide a consent right for Units 3 and 4. Rather, this provision protects J.P. Morgan against an action by AES Subsidiaries that would cause a reduction in the generating capabilities of any of the "Facilities" covered by the Agreement – i.e., HB Units 1, 2, or 5 or the other covered generating facilities located at Redondo Beach or Alamitos.³² This protection has no application to Huntington Beach 3

³⁰ "Unit" is defined as "each of the fourteen (14) generating units comprising part of the Facilities and described on Schedule A."

³¹ Unit 5 is no longer operating.

³² Section 1.29 of the Tolling Agreement defines "Dependable Capacity" to mean "in respect of each Unit, the total net MW generating capability of such Unit"

and 4 because the Tolling Agreement does not apply to those Units and because the conversion of Huntington Beach 3 and 4 to operate as synchronous condensers will not have any effect on the available capacity for any unit that is covered by the Tolling Agreement.

Neither the ISO's designation of Units 3 and 4 as Reliability Must-Run units nor the conversion of the units to operate as synchronous condensers affects the "Dependable Capacity" of Units 1, 2 and 5 or any other Unit encompassed by the Tolling Agreement.

4. The Representation and Warranty Does Not Create a Consent Right

The only other provision of the Tolling Agreement that might be interpreted as restricting AES' ability to convert operations at Units 3 and 4 to synchronous condensers is Section 13.1(l) of the Tolling Agreement which is a representation and warranty of the AES Subsidiaries that states:

13.1 By AES. As of the date hereof and as of the Effective Date, each of the AES Subsidiaries hereby represents, warrants and covenants as follows:

* * *

The AES Subsidiaries' assets consist, and at all times during the Term will consist, solely of the Facilities and assets reasonably related thereto, and each of the AES Subsidiaries will engage only in the activities and transactions contemplated by, or reasonably related to the performance of their obligations under this Agreement.

On its face, this provision does not require any type of consent for Units 3 and 4 to be converted to synchronous condensers, nor does this provision prevent AESHB from owning or operating Units 3 and 4. Section 13.1(l) is a Representation, Warranty and Covenant made by AES Subsidiaries "[a]s of the date hereof and as of the Effective Date

..."³³ despite the fact that it refers to the present and the future. Because the representation is binding only "as of the Effective Date," any future activities (whether or not consistent with the representation) cannot give rise to a claim for breach of warranty. By its own terms it has no continuing validity beyond the effective date of the Agreement.

Moreover, as with the rest of the Tolling Agreement, Section 13.1(l) is limited in its applicability to the Facilities covered by the Agreement and cannot be interpreted to prevent AESHB from owning or operating Units 3 and 4. Both parties undoubtedly knew when the Tolling Agreement was executed that AESHB was also the owner of Units 3 and 4, and any other interpretation necessarily would mean that the representation was false when made and that at its inception, the contract already was invalid, an untenable conclusion.

The Commission applies general principles of contract interpretation in construing contracts.³⁴ One such recurring principle, concerning the enforceability of agreements, is as follows:

[W]hen the words of the contract can be interpreted either in a way which would cause the contract to be valid or in a way which would result in invalidity, courts have chosen the former interpretation. This preference is based upon the judicial belief that the parties intend their agreement to be valid rather than invalid, lawful rather than unlawful, and honest and effective rather than fraudulent and voidable.

Arthur Linton Corbin, 5-24 Corbin on Contracts § 24.22 (2012). 35 Interpreting the

³³ Section 13.1. By contrast the same limitation does not appear in Section 13.2 applicable to WESCO.

 $^{^{34}}$ See, e.g., KN Energy, Inc., 59 FERC ¶ 61,332, at p. 62,219 n.10 (1992) (citing Arthur Linton Corbin, 3 Corbin on Contracts § 559, (1963 ed. & Supp. 1990)).

³⁵ See also Cole v. Burns Int'l Sec. Servs., 105 F.3d 1465, 1485 (D.C. Cir. 1997) (abrogated in part on other grounds as stated in Munoz v. Green Country Imps., LLC, Docket No. 12-CV-322, 2012 U.S. Dist. LEXIS

representation to have been false when made violates this principle because it would have rendered the Agreement potentially invalid and voidable.

The Restatement Second of Contracts provides,

[A]n interpretation which gives a reasonable, lawful, and effective meaning to all the terms is preferred to an interpretation which leaves a part unreasonable, unlawful, or of no effect.³⁶

The generally-applicable contract interpretation principles described above apply equally under New York law, which governs the Tolling Agreement (and the Supplemental Agreement). The Court of Appeals of New York has explained, "We have long and consistently ruled against any construction which would render a contractual provision meaningless or without force or effect." Federal courts sitting in New York have applied the same principle. 38

AES assumed ownership of the facilities located at Huntington Beach 3 and 4 at the time the Tolling Agreement took effect. As the owner and operator of the entire Huntington Beach facility, AESHB necessarily was engaged at that time in various activities involving Huntington Beach 3 and 4, including maintenance, security, and oversight of the units, activities required even while the units were nonoperational. Ownership and related activity at Huntington Beach 3 and 4 neither was prohibited nor

^{142937,} at *4-5 (N.D. Okla., Oct. 3, 2012)).

³⁶ Rest. (Second) of Contracts § 203 (1981); *see Midwest Indep. Transmission Sys. Operator*, 138 FERC ¶ 61,055, at n.37 (2012) (applying Section 203 of the Restatement (Second) of Contracts, and explaining that "the Restatement (Second) of Contracts provides a generally applicable order of preference for evidence reviewed in interpreting contracts.").

³⁷ Ronnen v. Ajax Elec. Motor Corp., 671 N.E.2d 534, 536 (N.Y. 1996) (citations omitted); see also Yoi-Lee Realty Corp. v. 177th St. Realty Assocs., 208 A.D.2d 185, 190 (N.Y. App. Div. 1st Dept. 1995) ("contracts should be construed to give force and effect to their provisions and not in a manner so as to render them meaningless.") (citations omitted).

³⁸ See Conzo v. Fire Dep't of the City of New York, 438 F. Supp. 2d 432, 435 (S.D.N.Y. 2006) (citing the Restatement (Second) of Contracts§ 203; Galli v. Metz, 973 F.2d 145, 149 (2d Cir. 1992); Eastman Kodak Co. v. STWB Inc., 232 F. Supp. 2d 74, 91 (S.D.N.Y. 2002)).

"reasonably related to the performance of [the AES Subsidiaries'] obligations under this Agreement."

Interpreting the representation set forth in section 13.1(l) of the Tolling Agreement to constitute a source of a right of consent for J.P. Morgan would be inconsistent with BE CA's representations to the Commission in the proceeding in which the Tolling Agreement was assigned to it. As noted above, BE CA represented that it did not own or control other generating sites or resources that may be needed in the relevant market. BE CA's representation and the Commission's conclusion would not have been correct if the Tolling Agreement created a right to control future operations of resources at Huntington Beach 3 and 4.

The synchronous condenser project does not violate the provisions of Section 13.1(1) of the Tolling Agreement when that provision is given its proper meaning. The limitation on AES Subsidiaries' activities to those "contemplated by, or reasonably related to the performance of their obligations under" the Tolling Agreement is properly understood as a provision that prevents AESHB from engaging in activities (or owning assets) at the facilities actually covered by the Agreement that are not reasonably related to the services AESHB provides at those facilities. The provision prevents extraneous activities at the covered facilities that could interfere with AESHB's ability to reliably perform the services actually covered by the Agreement.

The activities that are the subject of Section 13.1(1) of the Tolling Agreement are those that are "related to" the performance of AES's obligations which are set forth in its Article II. Article II consists of Sections 2.1, 2.2 and 2.3. Sections 2.1 and 2.2 provide:

³⁹ See 2007 BE CA Application and Letter Order, supra p. 20.

- 2.1 <u>Capacity</u>. Subject to the terms and conditions herein, during the Term the AES Subsidiaries shall sell and make available to [J.P. Morgan] on an exclusive basis, and [J.P. Morgan] shall purchase and pay for, the Dependable Capacity.
- 2.2 <u>Services</u> Subject to the terms and conditions herein, during the Term the AES Subsidiaries shall perform for [J.P. Morgan], on an exclusive basis, and [J.P. Morgan] shall purchase and pay for, Fuel Conversion Services.

As discussed above, Section 2.3 is the provision that establishes an exclusive right for J.P. Morgan, but only as to the output of the "Facilities" actually covered by the Agreement.

The activities at Huntington Beach 3 and 4 are not occurring at any of the Facilities actually covered by the Agreement. But even if the provision somehow could be read to implicitly govern activities at non-covered facilities (such as Huntington Beach 3 and 4) without making BE CA's representations to the Commission false, the provision still would have no relevance because operations at Huntington Beach 3 and 4 have no impact on AES's ability to perform its obligations for the physically separate units covered by the Tolling Agreement.

For these reasons, Section 13.1(l) of the Tolling Agreement cannot be read to create consent rights for J.P. Morgan that can block the synchronous condenser project at Huntington Beach 3 and 4. The ISO requests that the Commission issue an order declaring that under the Tolling Agreement, J.P. Morgan's consent for AES to enter into the RMR Agreement is not necessary.

C. THE CONTEMPORANEOUSLY EXECUTED SUPPLEMENTAL AGREEMENT CANNOT CREATE A CONSENT RIGHT FOR J.P. MORGAN.

As noted above, the AES Subsidiaries and Williams apparently executed a Supplemental Agreement on the same date as the Tolling Agreement. The provisions of the Supplemental Agreement that might be construed to provide opportunities for the exercise of control by J.P. Morgan are narrowly circumscribed so that any such control applies only to the addition of generating capacity. But generating capacity does not include voltage support.

Section 2.1 of the Supplemental Agreement provides:

2.1 AES Additions. Subject to the provisions of Section 2.3, neither the AES Subsidiaries nor any of their respective Affiliates (including The AES Corporation ("AES")) will add Capacity to the Facilities or acquire, construct, own, lease or operate, directly or indirectly, any assets with generating Capacity (a) within the service area on the load side of Edison's Del Amo, Serrano and Santiago substations except (A) with the consent of [J.P. Morgan], which may be withheld in [J.P. Morgan] 's sole and absolute discretion if such additional Capacity would have an adverse effect on the economic benefit (including cashflow and profit) to be derived by [J.P. Morgan] from the Facilities or on the ISO's designation of the Facilities as must-run or (B) as permitted in respect of existing Units pursuant to the provisions of Section 4.1 of the Tolling Agreement and Section 2.5 hereof: or (b) within the service area on the Los Angeles load side of Edison's Sylmar, Renaldi, Vincent, Lugo, Devers and San Onofre substations including at the nuclear plant located at San Onofre) (which service area's current configuration is shown on Schedule 2.1 and which service area excludes the service area described in clause (a)(ii) of this Section), without first complying with the provisions of Section 2.4 hereof.

Section 2.4, in turn, requires AES Subsidiaries to offer J.P. Morgan a "Right Of First Offer" before such "Capacity" may be constructed.

Section 2.1 cannot form the basis for J.P. Morgan's withholding consent. By its terms, Section 2.1 of the Supplemental Agreement purports to restrict AES Subsidiaries from acquiring, constructing, owning, leasing or operating any assets with generating "Capacity" in a geographically described area that includes the Huntington Beach location without first offering to sell that Capacity to J.P. Morgan. The Supplemental Agreement incorporates the definition of "Capacity" in the Tolling Agreement, which is limited to "the MW output level that a generating unit is capable of continuously producing." ⁴⁰

Section 2.1 is inapplicable because the synchronous condensers will not provide any generating capacity at all. To the contrary, the units will provide only reactive support in the form of MVARs, without providing any MWs or MWhs.

Rather than supporting a right to block any activity at Huntington Beach 3 and 4 (absent consent), these provisions of the Supplemental Agreement reinforce the conclusion that the parties never intended such a restriction. Although Section 2.1 does contemplate a consent role–although only with respect to additional capacity and not for MVARs – the provision specifically contemplates that an AES Subsidiary may "add Capacity" either at or near the facilities covered by the Agreement. This arrangement would, however, be entirely forbidden if Section 13.1(1) of the Tolling Agreement meant that an AES Subsidiary never could own or operate any facilities other than the facilities specifically identified in the Tolling Agreement.

Because the Supplemental Agreement was executed contemporaneously with the Tolling Agreement and the parties agreed that the two agreements constitute the "entirety of

⁴⁰ Tolling Agreement, section 1.17. The first "Whereas" clause of Supplemental Agreement explains that, absent a separate definition, capitalized terms in the Supplemental Agreement "have the meaning given in the Tolling Agreement."

the agreement between the parties"⁴¹ they must be interpreted to harmonize their provisions. Under New York law, courts have considered that "[g]enerally, separate writings are construed as one agreement if they relate to the same subject matter and are executed simultaneously."⁴² Even instruments that are not signed contemporaneously also should be interpreted together, if "the parties assented to all the promises as a whole, so that there would have been no bargain whatever if any promise or set of promises had been stricken."⁴³

That result can only be achieved if the restrictions set forth in Supplemental Agreement are interpreted to apply only to the Facilities that are included in Schedule A of the Tolling Agreement. Schedule A does not include Huntington Beach 3 and 4. Otherwise, the Tolling Agreement would provide AESHB with authority to engage in activities that were at the same time prohibited under the Supplemental Agreement.

Finally, the fact that JPMVEC has not included HB 3 and 4 in any listing of the facilities over which it and its affiliates exercise control during 2012 supports the conclusion that Supplemental Agreement does not provide J.P. Morgan with any right to block activities at those units. Appendix E includes the 2012 asset appendices filed as part of JPMVEC's notices of change in status. None of these Asset Appendices make any mention of Huntington Beach Units 3 and 4. Certainly, if the Supplemental Agreement had created a form of control over facilities of which the Commission

⁴¹ Supplemental Agreement, Section 6.1.

⁴² Commander Oil Corp. v. Pass & Seymour, Inc., 991 F.2d 49, 53 (2d Cir. 1993) (citing Carvel Corp. v. Diversified Mgmt. Grp., Inc., 930 F.2d 228, 233 (2d Cir. 1991) (citing Nau v. Vulcan Rail & Constr. Co., 36 N.E.2d 106, 110 (N.Y. 1941)); Rudman v. Cowles Communications, Inc., 30 N.Y.2d 1, 13 (N.Y. 1970).

⁴³ *Id.* (quoting 6 Williston, Contracts, § 863 (3rd ed. 1970), and citing *Williams v. Mobil Oil Corp.*, 445 N.Y.S.2d 172, 175 (2d Dep't 1981)); *see also TVT Records v. The Island Def Jam Music Grp.*, 412 F.3d 82, 89 (2d Cir. 2005) ("Under New York law, 'all writings which form part of a single transaction and are designed to effectuate the same purpose [must] be read together, even though they were executed on different dates and were not all between the same parties.") (quoting *This is Me, Inc. v. Taylor*, 157 F.3d 139, 143 (2d Cir. 1998), and stet. *Nau v. Vulcan Rail & Constr. Co.*, 36 N.E.2d 106 (1941)).

previously was unaware, it would have been incumbent on JPMVEC to mention HB 3 and 4 in its Asset Appendix filings.

If the Supplemental Agreement created a form of control over facilities of which the Commission previously was unaware, any such control provisions would not be enforceable until it was approved by the Commission.

The ISO respectfully requests that the Commission issue an order declaring that under the Supplemental Agreement J.P. Morgan's consent for AESHB to enter into the RMR agreement or engage in the synchronous condenser project is not necessary.

D. THERE IS A COMPELLING PUBLIC INTEREST TO MODIFY ANY PROVISION OF A JURISDICTIONAL AGREEMENT THAT WOULD INTERFERE WITH THE SYNCHRONOUS CONDENSER PPROJECT.

The ISO has not identified any portion of a jurisdictional agreement between AESHB and J.P. Morgan that would confer on J.P. Morgan a right to exercise or withhold consent. If such a right is identified in any substantive answer to this petition, however, that the contractual provision should be modified to permit the RMR agreement and the synchronous condenser project at Huntington Beach 3 and 4 to go forward without further delay.

Although a properly filed jurisdictional contract is presumed to be just and reasonable for the parties subject to its terms, the presumption may be overcome upon the Commission's initial or subsequent consideration of a filing of the agreement if the Commission determines that the contract's terms impose an "excessive burden on consumers or otherwise seriously harms the public interest." The presumptions of justness and reasonableness can be overcome by a compelling public interest. If the

⁴⁴ Morgan Stanley Capital Group, Inc. v. Public Utility District No. 1, 554 U.S. 527, 553 (2008).

presumption has been overcome, the Commission is empowered to modify a jurisdictional contract after it declares the contract unjust and unreasonable.

The Commission already determined that the Tolling Agreement is a jurisdictional agreement. If the Supplemental Agreement also is jurisdictional and it creates any independent consent rights, it would not be enforceable until filed and it would be subject to modification under *Mobile-Sierra*. If it is not jurisdictional, its terms certainly cannot be interpreted to interfere with or trump the Commission-approved ISO tariff.

The Commission may look to the "totality of the circumstances" in making this determination. ⁴⁵ The Supreme Court has confirmed that consideration of the "excessive burden" that may attend a contract extends to any excessive burden on any third party over the life of the contract – not just at the time of the contract's execution or when the contract is reviewed. ⁴⁶ Thus, even if the contract may have been just and reasonable when signed, it may cause an "excessive burden" to consumers at the time of a later Commission's review. Any provision of the Tolling Agreement or the Supplemental Agreement that can be used to impair the reliability of service to the public must be subject to review to determine if it excessively burdens the public interest.

A provision of the Tolling Agreement or Supplemental Agreement that is interpreted to require J.P. Morgan's consent for AESHB to fulfill its obligations under the ISO tariff and RMR agreement would be contrary to the public interest for an additional and independent reason. Such a provision would give J.P. Morgan the right to severely

⁴⁵ Id. at 549 n. 4. See also United Gas Pipe Line Co. v. Mobile Gas Service Corp., 350 U.S. 332 (1956); FPC v. Sierra Pacific Power Co., 350 U.S. 348 (1956).

⁴⁶ *Id.* at 545 (holding that the definition of what it means for a rate to satisfy the just-and-reasonable standard in the contract context applies regardless of when the contract is reviewed).

limit the development of new projects or facilities that are outside the scope of the Agreements, thereby restricting market entry by other persons and enhancing opportunities for J.P. Morgan to exercise market power to the detriment of California consumers.

When the Commission required the Tolling Agreement to be filed it was in part "to provide for ongoing monitoring of the marketer's ability to exercise market power."

The notion that the Tolling Agreement and the Supplemental Agreement could create a right to exercise such undisclosed control cannot be reconciled with the disclosures provided to the Commission and provides an independent reason to ensure that no such inconsistency can be sustained. There is a compelling public interest in ensuring that conduct conforms to the market power disclosures upon which the Commission bases its decisions.

Moreover, here the grid operated by the ISO confronts the possibility of cascading voltage collapses in the absence of the use of a wide-scale load-shedding scheme of unprecedented magnitude. If a jurisdictional contract provision interferes with the synchronous condenser project, the ISO will need to arm a load shedding scheme for Southern California that could result in dropping up to 800 MW of load in densely populated areas of San Diego if certain contingency conditions were to come to pass. To put it in concrete terms, that amounts to nearly one-sixth of the total load in San Diego. The voltage support provided by the package of upgrades that includes the synchronous condensers also will avoid the need to arm large amounts of additional load in Orange County. These are densely populated areas that rely on electric power for their hospitals,

⁴⁷ AES Huntington Beach, LLC, 83 FERC ¶ 61,100 at 61,483.

their gas pumps, their traffic and street lights, their air conditioning, their education and their commerce.

The only possible analysis is that a contract provision that interferes with the ISO's reliability obligations imposes a severe and compelling burden on electricity consumers in Southern California and that cannot be permitted.

The *Mobile-Sierra* doctrine is equally applicable to terms and conditions of contracts, as to the rates applied to services. Both are subject to evaluation under sections 205 and 206 of the Federal Power Act. ⁴⁸ The Commission previously has modified a negotiated contract in which the terms and conditions of the contract caused reliability concerns. ⁴⁹

In *Arizona Corporation Commission*, the D.C. Circuit upheld a series of Commission decisions to convert contracts from full-requirements contracts to contract demand arrangements. In upholding the Commission's decisions, the D.C. Circuit noted that "[t]he Commission did not merely protect El Paso from an "improvident bargain," as petitioners allege, but exercised its *Mobile-Sierra* authority to prevent "the imposition of an excessive burden" on third parties." The court noted that the "main factual question" in determining whether the Commission was justified in modifying the terms of the contracts was whether the contracts affected reliability of service. ⁵¹

⁴⁸ See, e.g., Section 206(a) of the FPA: "...the Commission shall determine the just and reasonable rate, charge, classification, rule, regulation, practice, or contract to be thereafter observed and in force, and shall fix the same by order." 16 U.S.C. § 824e(a).

⁴⁹ El Paso Natural Gas Co., 99 FERC ¶ 61,244 (2002); El Paso Natural Gas Co., 100 FERC ¶ 61,285 (2002); El Paso Natural Gas Co., 104 FERC ¶ 61,045 (2003), affirmed sub. nom. Arizona Corp. Comm'n v. FERC, 397 F.3d 952 (D.C. Cir. 2005).

⁵⁰ Arizona Corp. Comm'n, 397 F.3d 952, 953-954 (D.C. Cir. 2005) (citation omitted).

⁵¹ *Id.* at 954.

If the Commission determines that there is a contract provision that would require J.P. Morgan's consent, the burden it would impose on the responsible utilities and their customers who would be affected by the load-shedding described above provides ample justification to reform the provision to insure reliable service.

V. REQUEST FOR ACCELERATED SETTLEMENT PROCEDURE

Because of the urgent circumstances described above, the ISO also requests that the Commission direct the implementation of distinctive settlement procedures.

In many traditional cases when the Commission refers a matter to the Chief Administrative Law Judge for designation of settlement judge, the parties are asked if they are able to agree on a settlement judge who, whether or not there is agreement (which itself can consume a week or more), convenes a settlement conference ten or more days later. Scheduling flexibility is frequently observed. The delay that attends these features of the settlement process is not compatible with the urgency of the present circumstances.

The ISO requests that the Commission designate a Settlement Judge in its notice of this filing who is directed to convene a settlement conference not later than December 4, 2012 if any answer or protest disputing this petition is filed. At that settlement conference representatives of the ISO and J.P. Morgan, and any other interested party should be required to appear in person; and as provided in Rule 601 (b)(2) and (3), representatives must be authorized to act on behalf of their principal with respect to matters to be addressed at the conference. The ISO requests that the Commission state that failure of a representative to possess such capacity at the time of the conference will be deemed to constitute a failure to attend the conference and such

failure will constitute a waiver of all objections to any agreement reached at the conference by the parties who are properly represented.

The purpose of this expedited settlement procedure, among other things, will be to determine if a pragmatic consensual arrangement can be reached that will avoid the risks that the delays associated with an order on the merits and a possible rehearing application could cause.

The ISO submits that in light of the nature of the controversy and the awareness of the parties of the consequences of their decisions, one session--not to exceed two days--of candid discussion in the presence of one of the Commission's designated Settlement Judges should (and must) be sufficient to know whether this controversy will end then and there or will require a Commission order on the merits.

The ISO and AES, along with SCE, and SDG&E, have achieved a consensus on the rates terms and conditions reflected in the RMR filing. The ISO, AES, SCE and SDG&E have entered into a related backstop agreement in order to ensure the synchronous condenser contract would be effective as of October 15, 2012, which ensures the commercial operations date of June 2013. These agreements have been entered into only after consideration of alternatives and concluding that there were no other viable options. Indeed, the ISO believes this to be the only practical and immediate means to address of the reliability needs in the brief time available. AES was not able to obtain consent from J.P. Morgan. The ISO has not been able to resolve the consent issue through discussions with either AES or J.P. Morgan. The ISO believes that the settlement judge procedures proposed here may afford the interested parties a chance to resolve whatever concerns that may be preventing J.P. Morgan or its

affiliates from providing consent or waiving whatever consent rights they believe they hold.

VI. CONCLUSION

WHEREFORE, in consideration of the foregoing, the ISO respectfully requests that the Commission: (1) shorten the time for responses to this request so that such submissions are due by November 29, 2012; (2) upon consideration of any such answers or protests issue a declaratory order finding that J.P. Morgan's consent is not necessary to either the RMR agreement filed in Docket No.ER13-351 or the synchronous condenser project described above; (3) in the event no such answer is filed, determine that there is no objection to this request and to promptly grant the

relief requested; and (4) if a substantive answer or protest in opposition is filed, establish the settlement procedures described herein while also proceeding to move forward with expediting consideration of the legal issues presented in this petition.

Respectfully submitted,

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Deputy General Counsel

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Counsel to the California Independent System Operator Corporation

Washington, D.C. November 15, 2012

APPENDIX A

Declaration of Mr. Robert Sparks

UNITED STATES OF AMERICA BEFORE THE FEDERAL ENERGY REGULATORY COMMISSION

Docket No. EL13-___-000

California Independent System Operator Corporation

		Petitioner) v.)
	BE (CA LLC
	and	d ,
	J.P.	Morgan Ventures Energy Corp.
		DECLARATION OF ROBERT SPARKS
1	I, Ro	bert Sparks, do hereby declare and state:
2		
3	1.	My name is Robert Sparks. I am employed by the California Independent
4		System Operator Corporation as Manager, Regional Transmission. My
5		business address is 250 Outcropping Way, Folsom, California.
6		
7	2.	I am a licensed Professional Electrical Engineer in the State of California.
8		I hold a Master of Science degree in Electrical Engineering from Purdue
9		University, and a Bachelor of Science degree in Electrical Engineering
10		from California State University, Sacramento. I have worked in

Transmission Planning and Transmission Operations Engineering for 23 years, approximately 8 years at Pacific Gas & Electric Company and 15 years at the California ISO.

5 A. Purpose and Summary of Declaration.

The purpose of my declaration is to describe the basic reliability need, and associated engineering analysis, that has given rise to the ISO's conclusion that synchronous condensers should be installed at the site of Huntington Beach units 3&4 (HB 3&4) before the Summer of 2013 in order to meet transmission reliability needs in the Southern California.

4. My declaration first provides an overview of the transmission planning analysis that resulted in a determination that measures to obtain voltage support for the Summer of 2013 were warranted. In addition to describing the planning process, this portion of my declaration describes the applicable transmission planning requirements and identifies the specific scenario under which the ISO has determined that there is a risk of voltage collapse absent further measures. My declaration next summarizes various alternatives that the ISO considered as potential measures to address this reliability need for the Summer of 2013, including the use of synchronous condensers at HB 3&4 site, and describes the basis for the ISO's conclusion that synchronous condensers, together with the development of certain other reactive power

resources, are the only clearly viable means (other than a wide-spread load shedding scheme) to address the reliability need that had been identified for Summer 2013. My declaration further describes the alternative of increased reliance on a load shedding scheme to meet the established reliability need and explains the basis for the ISO's determination that reliance on such a scheme would be inadvisable here.

7 B. The ISO's Planning Process for Summer 2013 and Determination of a 8 Reliability Need for Reactive Power.

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The ISO has an annual process that it follows to evaluate whether local capacity areas within its balancing authority area have sufficient resources to meet applicable reliability criteria. Each year the ISO performs a local capacity technical (LCT) study for the purposes of providing information for resource adequacy procurement. An LCT determines the minimum amount of resources within a local capacity area (often called the local capacity requirement) needed to address reliability concerns following the occurrence of various contingencies on the electric system. The contingencies that are studied are identified in the ISO's federallyapproved tariff and applicable reliability standards adopted by NERC and WECC. Among other parameters, the study requires that the ISO plan for contingencies such as the loss of transmission facilities while local generation is out of service. This planning approach ensures that the ISO can contain potentially widespread and serious system impacts that might otherwise result from the loss of transmission and generation facilities.

6. A local capacity area is a geographic area that does not have sufficient transmission import capability to serve the customer demand in the area without the operation of generation located within that area. There must be sufficient generation in that area available for ISO operators to serve load in the area under stressed system conditions such as during high demand periods; during outages of up to two transmission lines used to import power into the area; during outages of up to two local generating units; and during outages of one generating unit and one transmission line.

7.

The ISO performed its local capacity technical analysis for 2013 in two stages. First, the ISO completed and published the results of its 2013 local capacity technical analysis in April 2012. In that analysis, the ISO assumed that the San Onofre Nuclear Generating Station (SONGS) units 2&3 would be operational in 2013. As it became more apparent, however, that one or both of the SONGS units may not be operational for the summer of 2013, the ISO undertook to update that analysis with an addendum that considered the impact on the local capacity areas in Southern California assuming that the SONGS units remain non-operational throughout 2013. The ISO published this addendum addressing the impact of the absence of SONGS in August 2012. The ISO presented the results of this analysis stakeholders on August 29, 2012 during a stakeholder webconference. The initial 2013 local capacity

technical analysis and the August addendum are available on the ISO's

website at

http://www.caiso.com/informed/Pages/StakeholderProcesses/LocalCapaci

tyRequirementsProcess.aspx.

8.

The ISO's analysis in the August addendum identified an important need for reactive power in the Summer of 2013 assuming that the SONGS units are not operational. Specifically, the ISO's analysis determined that, in the event of an N-1-1 contingency during high load conditions, there would be insufficient reactive power in the vicinity of the SONGS units to prevent potentially serious voltage support issues, including potential voltage collapse, in the absence of the use of a wide-scale load-shedding scheme of unacceptable magnitude.

9.

To understand the nature of this need for voltage support, it is helpful to understand the contingencies under consideration. The most critical N-1-1 contingency for the LA Basin and San Diego sub-areas is the loss of the Imperial Valley-Miguel 500 kV line followed by the loss of the Imperial Valley-Suncrest 500 kV line or vice versa. If this loss were to occur during a high load period such as can occur on a hot summer day, a sequence of events can occur that creates serious voltage stability concerns for the 230 kV transmission facilities in the vicinity of SONGS as well as a low voltage problem at the site of the SONGS facility itself.

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Under this scenario, the loss of these two lines completely interrupts the flow of approximately 2100 MW of power from Imperial County and Arizona into the San Diego load area. Almost instantaneously this 2100 MW of power would surge through parallel 500 kV and 230 kV transmission facilities that serve the Los Angeles load area and then connect this load area to the San Diego load area through 230 kV transmission facilities that all funnel through the SONGS 230 kV switchyard. The 500 kV transmission facilities that would experience this power surge are series compensated, which would allow those facilities to handle the surge of power much better than the 230 kV facilities without encountering voltage support problems. The 230 kV facilities at and in the immediate vicinity of SONGS, however, would experience a potentially severe deficiency in reactive power support if the SONGS units are not operating. This would occur as a result of the loss of both the reactive power and the generation that SONGS provides when operating. The SONGS units produce up to 1100 MVAR of reactive power when running, which would not be available to provide the voltage support necessary to handle this power surge. The absence of the generation normally provided by SONGS also would increase the amount of imported power flowing over the two transmission lines at issue in this N-1-1 scenario during a period of peak demand in Southern California and thus would result in a larger power surge across the parallel transmission facilities than would otherwise be the case.

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The ISO's study identified two related but distinct voltage issues under this scenario. First, the power surge identified above would result in posttransient voltage instability (i.e., the risk of voltage collapse) for certain 230 kV transmission facilities located in the vicinity of SONGS that connect the Los Angeles and San Diego load areas. Second, the power surge would result in a low voltage concern at the SONGS switchyard. To ensure power quality, the voltage at the SONGS switchyard must be maintained above 218 kV, which is the minimum allowable voltage level specified in the Appendix E of the Transmission Control Agreement (TCA)¹ and as required by the NERC NUC-001 Standards². This voltage level is required even when the units are not operating in order to ensure the quality of the power delivered to the facility for the operation of pumps and other critical operations that continue to occur when the units are not producing power. Dispatching all available local generation capacity would help to mitigate these voltage impacts. However, even assuming that all available generation capacity has been dispatched, it was found that both of these voltage impacts still would exist in the N-1-1 contingency identified above.

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¹ TCA: http://www.caiso.com/Documents/TransmissionControlAgreement-Updatedas-Dec3 2010.pdf .

² The NERC NUC-001 Standards require that the post-contingency voltage at San Onofre 230 kV switchyard be recovered to a minimum of 218 kV after a major contingency in less than 80 seconds.

1 12. After reviewing various ideas for mitigating this problem, the number of options that could actually be implemented by summer of 2013 was 2 limited. As discussed below, the only clearly viable option that has been 3 identified (other than reliance on a wide-spread load shedding scheme in 4 densely populated areas) that would mitigate both of the identified voltage 5 6 concerns is to install reactive support facilities in the vicinity of SONGS. 7 The following combination of reactive support facilities was found to mitigate both the voltage instability concern and the low voltage concern: 8 9 one 80 MVAR shunt capacitor at Johanna Substation, one 80 MVAR shunt capacitor at Santiago Substation, two 80 MVAR shunt capacitors at 10 Viejo Substation, and conversion of the Huntington Beach units 3 and 4 11 that are scheduled to be shut down to synchronous condensers capable of 12 producing 290 MVARs of dynamic reactive power. 13

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The ISO's studies further confirmed that the optimal location for adding reactive support was in the immediate vicinity of SONGS. This conclusion was not surprising, given that without SONGS in operation, the amount of reactive support available in this area is reduced by approximately 1100 MVAR.

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- C. The ISO's Analysis of Options to Address the Reactive Power Need for Summer 2013.
- 14. In connection with preparing the August addendum, the ISO performed ananalysis of its possible options for addressing this reliability-related need

for additional reactive power. The ISO has considered various potential alternative means for addressing this need in close collaboration with the affected load serving entities in Southern California and other stakeholders. As a result of this analysis, the ISO has concluded that the most viable option involves installing synchronous condensers at the site of HB 3&4, which will no longer be available as generating units by the Summer of 2013 due to the loss of its air permits, and shunt capacitors at several substations in the local area close to where the reactive power need exists. The ISO described this option in its August 2012 addendum to its 2013 Local Capacity Technical Analysis discussed above.

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The synchronous condensers will work together with the shunt capacitors to address voltage support issues in the areas. The synchronous condensers and shunt capacitors both provide reactive power in the location where it is needed, but they differ in the manner in which they introduce voltage support to the grid. Shunt capacitors are a static reactive resource that provides an amount of reactive power that is a function of the square of the voltage whenever they are switched into service. In other words as the voltage at the location where the device is connected declines, the amount of the reactive power provided by the shunt capacitor also declines and this is an unfortunate property of shunt capacitors. Synchronous condensers are a dynamic reactive resource that is synchronized with the grid and is capable of providing a

continuously adjustable amount of reactive power as conditions warrant.

In contrast to the shunt capacitor, the reactive power produced by a synchronous condenser is not dependent on the voltage where the device is connected to the network, and the amount of reactive power produced by the synchronous condenser is continuously controllable.

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A combination of dynamic synchronous condensers and static shunt capacitors will work together to effectively meet the fast voltage recovery need at the SONGS 230 kV bus without causing further operational concerns, such as capacitor "hunting" and resulting slow response times. The shunt capacitors would be mechanically switched into service in nominal 80 MVAR increments to compensate for reactive power losses caused by the 2100 MW surge of power described above. In addition to the four new shunt capacitors there are approximately a dozen existing shunt capacitors that may also be switched into service in the surrounding vicinity. Switching in these capacitors can create temporary high voltages, which can in turn result in having to switch one or more of the capacitors out. At the same time, the transformer taps serving the load may be changing, which can gradually draw more reactive power, thereby causing the need to switch more capacitors in. The switching of capacitors in and out is referred to as hunting and can create unstable system performance and possibly voltage collapse. Because the synchronous condensers are continuously controllable and fast acting devices, they work to minimize the capacitor hunting issue by ensuring that the optimal amount of voltage

support is supplied at all times. Due to its proximity to the SONGS
switchyard, the Huntington Beach site is a highly effective location for
providing the dynamic reactive power needed for this purpose. It is,
moreover, the only viable location that has been identified.

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The ISO evaluated, in consultation with SCE and SDG&E, other potential options besides installing synchronous condensers for meeting the reactive power need for Summer 2013. The other potential options, however, ultimately did not prove to be feasible in light of the relatively short time available for implementation and the highly localized nature of the voltage support need.

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14 18. The ISO explored various potential alternatives, including: (1)

15 acceleration of in-service dates for new generation already under

16 development such as El Segundo repowering project and Sentinel

17 generation project; (2) other potential transmission upgrades; (3)

18 employing shunt capacitors alone; and (4) installing static VAR

19 compensators. None of these potential options proved viable.

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21 **19.** Accelerating generation proved non-viable because there were no projects that could potentially meet the specific need. There are two new generation projects under development in Southern California in the

surrounding vicinity of SONGS, but their publicly available in-service dates were initially provided as August 2013 which is towards the end of the summer peak load period. The ISO immediately discussed the potential to accelerate the completion of these generation projects with their developers, and found out that the El Segundo project in-service date may be accelerated. We also studied the benefits of having these projects in service for the entire summer peak load period. However, it was found that due to the location of the generation relative to the location of SONGS, this potential alternative was not significantly effective at mitigating the reactive power deficiency identified above.

20. The ISO performed a similar analysis regarding potential transmission upgrades with the same result. Specifically, the ISO considered whether any transmission projects currently under development could be accelerated or any expedited reconfiguration projects could be identified to meet the identified need in time for Summer 2013. None were identified that met the need within the necessary timeframe.

21. The ISO also considered various options that depended entirely on the installation and use of new shunt capacitors. However, there were no existing substations in the SONGS vicinity that could physically fit additional capacitor installations other than the four locations in the plan described above. In addition, the hunting issue was also identified as

described above, which caused the ISO to conclude that an all shunt capacitor option did not reliably meet the identified need.

The ISO also investigated whether any alternative may exist that involved the installation of a static VAR compensator that would provide continuous control similar to the synchronous condensers. The ISO determined, however, in consultation with SCE that it was not viable to install a static VAR compensator at an appropriate location within the short time frame at issue here.

23. In addition to these alternatives, the ISO has more generally considered whether a voltage contingency such as this one could be addressed by existing demand response programs or other demand response. The ISO has not been able to identify any such demand response options that would be capable of addressing the contingencies at issue here.

- D. Load Shedding as a Potential Alternative.
- **24.** If the synchronous condensers and shunt capacitors are not installed by
 19 the Summer of 2013, the ISO would need to increase its reliance of load
 20 shedding schemes in order to be in a position to address the voltage
 21 issues arising in the event of the N-1-1 contingency discussed above.
 22 Specifically, in that context the ISO's only option, consistent with
 23 applicable reliability standards, would be to increase its reliance on a load

shedding scheme that could potentially result in the loss of a large amount of load in a densely populated area. Without the recommended reactive support, the only way to prevent a widespread system disturbance resulting in uncontrolled loss of load in Southern California and Southwestern states would be to arm an automatic load shedding scheme designed to interrupt up to 800 MW of load at pre-determined substations. This scheme would be activated for the loss of Imperial Valley-Miguel 500 kV line followed Imperial Valley-Suncrest 500 kV line or vice versa (N-1-1).

25. This load shedding scheme would substantially exceed the load shedding schemes that the ISO has typically allowed for in any similar transmission planning context. Although the ISO has load shedding schemes, they are generally limited to sub-transmission contingencies that drop a small amount of load in low population density areas. None of these load shedding schemes are relied upon in the long-term transmission plan in order to reliably serve load in high population density areas from the high voltage transmission system.

25. The ISO does not support increased reliance on load shedding schemes in this particular context. The ISO has reviewed the design of the San Diego and Southern California transmission system and expected system impacts of shedding load as a mitigation measure for this N-1-1 outage.
The risk of this outage and the impacts of interrupting San Diego load are

not the best choice in light of the available alternative of installing relatively low cost reactive support in the vicinity of SONGS as described above.

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26. The ISO has reviewed the system design of the San Diego and Southern 4 California transmission system and determined that it faces certain 5 significant vulnerabilities. In particular, there is a history of frequently 6 7 occurring fires in the location of the facilities that constitute the N-1-1 contingency, which suggests an increased risk that the contingency could 8 9 come to pass. Based on information documented in a study performed by SDG&E, over a period of 13 years there were 11 fires in the area where 10 the two transmission lines are only four to eight miles apart. A substantial 11 12 fire in those areas could potentially result in an outage of both lines. causing precisely the N-1-1 outage at issue here. 3 One of those eleven 13

27. The transmission lines at issue in this N-1-1 scenario are also potentially at increased risk of outage because they are connected to Imperial Valley Substation, which is an electrical hub for three different utilities and therefore is inherently exposed to potential seams issues. SDG&E, CFE, and IID all have major tie-lines emanating from Imperial Valley Substation. As a major meeting point for these utilities, Imperial Valley Substation is potentially vulnerable to human coordination errors due to

fires spanned an area that would have taken out both lines together.4.

³ Performance Category Upgrade Request for Imperial Valley - Miguel 500 kV and Imperial Valley - Central 500 kV Double Line Outage Probability Analysis Seven Step Process Document Final Report Prepared By San Diego Gas & Electric Transmission Planning dated December 19, 2007

miscommunication or inconsistent practices for taking clearances and designing protection systems. Although the affected parties take precautions to avoid such problems, facilities located at a major seam between multiple utilities are inherently more susceptible to such issues, thereby increasing the potential risk of line outages and the N-1-1 outage in particular.

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The ISO has also reviewed the impact to the load that would need to be tripped and has determined that it is located in high density population areas, which means that the potential impact of dropping the load could be high. The electric utility industry seeks to avoid dropping load in high population density areas whenever possible. Based on discussions with other ISOs and RTOs, the ISO has confirmed that, as is the case for the California ISO, transmission systems are generally designed to avoid controlled load shedding in high density population areas in the case of a category C event, such as the N-1-1 contingency at issue here. Highly populated areas are more dependent on reliable electric service (for traffic lights, elevators, commercial buildings, hospitals, etc.) and therefore are more severely impacted as a result of load shedding. Safety issues, in particular, are substantially increased when widespread load loss occurs in areas where a high concentration of people live. In light of these potential impacts, the ISO does not support reliance on a wide-spread load shedding scheme as the means for addressing the voltage stability concerns at issue here.

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29. The solution of adding shunt capacitors along with synchronous condensers also would address other localized voltage issues that impact potential load shedding. The shunt capacitors that are an integral part of this consolidated solution to the low voltage problems in the vicinity of SONGS will also provide important protection against undervoltage conditions in Orange County resulting from a different contingency involving the potential loss of transmission facilities between Ellis Substation and the Johanna and Santiago Substations. A load shedding safety net was temporarily put in place in the Summer of 2012 for this and certain other contingencies that potentially could affect up to 2200 MW of load in Orange County. Although these contingencies were not directly studied in the 2013 local capacity technical analysis discussed above, it is my understanding that those contingencies also would be addressed by this solution and thus should result in the removal this additional load shedding risk to Orange County. If the synchronous condenser and shunt capacitor solution is not implemented in time for Summer 2013, there may be certain options to re-size this safety net and reduce its potential impact for Summer 2013. The solution of installing these voltage support resources, however, should eliminate the need for this safety net entirely.

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I declare under penalty of perjury that the foregoing facts are true and correct to the best of my knowledge and belief.

24 Dated

Dated: November 15, 2012

Robert Sparks

APPENDIX B

2013 Local Capacity Technical Analysis Addendum to the Final Report and Study Results:

Absence of San Onfre Nuclear Generating Station (SONGS)



2013 LOCAL CAPACITY TECHNICAL ANALYSIS

ADDENDUM TO THE FINAL REPORT AND STUDY RESULTS

Absence of San Onofre Nuclear Generating Station (SONGS)

August 20, 2012

Local Capacity Technical Study Overview and Results

I. Executive Summary

This Addendum to the 2013 Local Capacity Technical Analysis, dated April 30, 2012 includes the results and recommendations of the 2013 Local Capacity Technical (LCT) Study in the absence of the San Onofre Nuclear Generating Station (SONGS). The results and recommendations affect the LA Basin and San Diego-Imperial Valley local areas.

This Addendum does not change the 2013 LCR allocations already provided to Load Serving Entities (LSEs) based on the 2013 Local Capacity Technical (LCT) Study report dated April 30, 2012. Instead, the ISO issues these results and recommendations to provide Load Serving Entities (LSEs) with advance notice of LCR needs in the absence of SONGS in order to facilitate a more informed 2013 Resource Adequacy (RA) procurement. It is also the intention of the ISO to mitigate any reliability conditions that will remain, even if the LSEs procured all the available resources in these local areas. These results, in the absence of SONGS, will also provide a basis to allocate the costs of any ISO procurement needed to mitigate reliability conditions notwithstanding the resource adequacy procurement of LSEs.¹

Please note that these studies assume that both SONGS units 2 and 3 are completely unavailable for operation in 2013. At the time this study was completed, SONGS was on an extended forced outage and the expected date that it would return to service was undetermined.

This study includes the most updated data available on July 15, 2012, namely the 2012 Net Qualifying Capacity (NQC) list and the California Energy Commission (CEC) adopted load forecast that was published in June 2012.

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¹ For information regarding the conditions under which the CAISO may engage in procurement of local capacity and the allocation of the costs of such procurement, please see Sections 41 and 43 of the current CAISO Tariff, at: http://www.caiso.com/238a/238acd24167f0.html.

Below is a comparison of the LCR need with and without SONGS:

2013 Local Capacity Requirements with SONGS

	Quali	ifying Ca	apacity		R Need Ba ategory E		2013 LCR Need Based on Category C with operating procedure			
Local Area Name	QF/ Muni (MW)	Market (MW)	Total (MW)	Existing Capacity Needed	Deficien cy	Total (MW)	Existing Capacity Needed**	Deficien cy	Total (MW)	
LA Basin	4452	8675	13127	10295	0	10295	10295	0	10295	
San Diego/ Imperial Valley	158	3991	4149	2938	0	2938	2938	144*	3082	
Total	4610	12666	17276	13233	0	13233	13233	144	13377	
Local Sub-Area Name										
Ellis	0	458	458	0	0	0	0	0	0	
Western	3457	6118	9575	N/A	0	N/A	5540	0	5540	
San Diego	158	2911	3069	2192	0	2192	2570	0	2570	

2013 Local Capacity Requirements without SONGS

	Quali	fying Ca	apacity	2013 LCF C	R Need Bategory E		2013 LCR Need Based on Category C with operating procedure			
Local Area Name	QF/ Muni (MW)	Market (MW)	Total (MW)	Existing Capacity Needed	Deficien cy	Total (MW)	Existing Capacity Needed**	Deficien cy	Total (MW)	
LA Basin	2206	7710	9916	9745	0	9745	9916	1241	11157	
San Diego/ Imperial Valley	158	3991	4149	3385	0	3385	3385	467*	3852	
Total	2364	11701	14065	13130	0	13130	13301	1708	15009	
Local Sub-Area Name										
Ellis	0	458	458	0	0	0	458	360	818	
Western	1211	5153	6364	N/A	0	N/A	4597	0	4597	
San Diego	158	2911	3069	2462	0	2462	3069	467	3536	

^{*} San Diego-Imperial Valley area is not "overall deficient". Resource deficiency values result from a few deficient sub-areas; and since there are no resources that can mitigate this deficiency the numbers are carried forward into the total area needs.

^{**} Since "deficiency" cannot be mitigated by any available resource, the "Existing Capacity Needed" will be split among LSEs on a load share ratio during the assignment of local area resource responsibility.

N/A - It is feasible that Western sub-area has Category B needs however they are smaller than the Category C needs and overall irrelevant due to high Category B need in the entire LA Basin.

Compared to the final 2013 Local Capacity Technical (LCT) report, the total available capacity in the LA Basin has decreased by 3,211 MW, representing the capacity from SONGS, El Segundo # 3 retirement and El Segundo Repower (because of the in-service date delay from June1 to August 2013). The Ellis sub-area requirements have increased significantly by 818 MW, while the Western sub-area LCR needs have decreased by about 943 MW. Overall the LA Basin LCR needs are now driven by a new overlapping Category C contingency in the San Diego's electric system, due to voltage support needs that arise in the area. Without SONGS in operation, the LA Basin reflects a net increase of 862 MW in LCR need. The need for existing resources has decreased, however, by 379 MW due to the retirement or shut-down of other units. Basically, all existing available resources are needed for LCR in this area and additional deficiencies exist. For further details please see pages 5-19 below.

The total available capacity remains unchanged in the San Diego-Imperial Valley LCR area. The San Diego sub-area requirements have increased significantly, by 966 MW, and the San Diego-Imperial Valley area requirements have increased also by 447 MW, due to voltage support needs in the absence of SONGS. Overall for the San Diego-Imperial Valley LCR area, the additional resources needed for LCR has increased by 447 MW; however, there is a shift of sub-area needs and all available existing resources in the San Diego sub-area are now required for LCR. For further details, please see pages 19-27 below.

Even though resource procurement is the responsibilities of the LSEs in the area, the ISO is proposing mitigation for all new deficiencies created due to the absence of SONGS as a contingency plan for summer 2013. This mitigation is described in chapter II below.

II. Mitigation Plan for LA Basin and San Diego-Imperial Valley LCR areas and sub-areas due to the absence of SONGS

Ellis sub-area:

The following transmission upgrade plan has been identified which mitigates the identified reliability concerns in this sub-area:

Barre-Ellis 230k V lines reconfiguration from 2 to 4 circuits.

In addition to the mitigation measures needed for the adjacent LCR areas described below, reconfiguring the Barre-Ellis 230 kV lines from 2 to 4 circuits prior to next summer will mitigate the identified reliability concern in this sub-area, which is the loss of the Imperial Valley-North Gila 500 kV line followed by the loss of the Barre – Ellis #1 or #2 230 kV lines. Re-configuring the Barre-Ellis lines from 2 to 4 circuits will mitigate this issue by allowing three of the new Barre–Ellis circuits to remain in operation under this contingency.

LA Basin area and San Diego sub-area – common mitigation plan:

The following upgrade plan has been identified which mitigates the identified reliability concerns in this common area:

Install shunt capacitors (1 x 80 MVAR each) at Johanna and Santiago, (2 x 80 MVAR) at Viejo Substation (or 1 x 80 MVAR at Talega as an alternate location for the second 1 x 80 MVAR at Viejo) and convert Huntington Beach units 3 and 4 to synchronous condensers.

Together these projects will mitigate the post-transient voltage stability concerns in the San Diego sub-area and low voltage concern in the LA Basin LCR area². A mixture of dynamic (i.e., synchronous condensers) and static (shunt capacitors) reactive support is required in order to satisfy fast voltage recovery need at the SONGS 230 kV

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² The NERC NUC-001 Standards require that the post-contingency voltage at San Onofre 230 kV switchyard be recovered to a minimum of 218 kV after a major contingency in less than 80 seconds.

bus without causing further operational concerns (i.e., capacitor "hunting" issue and slow response time if only static reactive support is installed).

Huntington Beach units 3 and 4, as generating units, will no longer be available due to lack of air emission credits, however due to their proximity to San Onofre switchyard they are best suited for dynamic voltage support which they can still provide without air emission credits or water permits by being converted to synchronous condensers.

As an added benefit, the shunt capacitors eliminate the need for a new SPS in the Johanna-Santiago area that is required to protect against voltage instability for the loss of 230 kV double circuit tower line (DCTL) of Ellis-Johanna and Ellis-Santiago when generating resources in the San Diego area are at medium to low output level. As a second benefit, this alternative will reduce the single contingency resource need to 3,069 MW in the San Diego-Imperial Valley LCR area. This amount of LCR need is equivalent to the need based on meeting Category C contingency requirement for the San Diego sub-area, effectively reducing the procurement target in the SDG&E service area by 316 MW.

The reduction in SDG&E service area need will consequently increase the LA Basin single contingency need to the point where a new small 83 MW deficiency exists. Mitigation for this new single contingency deficiency is twofold:

- 1. Some units at Imperial Valley (not required for local RA without SONGS and these mitigation measures) may be under un RA contract therefore satisfying this need, and
- 2. The ISO has received Demand Response (DR) program information from the Participating Transmission Owners (PTOs). It is possible that about 48 MW in Orange County and another 252 MW in the South of Lugo area could be used if available within 30 minutes of a transmission line loss or overload. If possible, the ISO will rely on them for the first part of summer 2013 until El Segundo Repower or Sentinel become commercially operational in August 2013 in order to mitigate this single contingency need that causes South of Lugo loading concerns. However, even if available within 30 minutes, these DR programs and the new generating resources are insufficient in mitigating the double contingency need as addressed above, however.

III. Local Capacity Requirement Study Results

1. LA Basin Area

Area Definition

The transmission tie lines into the LA Basin Area are:

- 1) San Onofre San Luis Rey #1, #2, & #3 230 kV Lines
- 2) San Onofre Talega #1 & #2 230 kV Lines
- 3) Lugo Mira Loma #2 & #3 500 kV Lines
- 4) Lugo Rancho Vista #1 500 kV line
- 5) Sylmar Eagle Rock 230 kV Line
- 6) Sylmar Gould 230 kV Line
- 7) Vincent Mesa Cal 230 kV Line
- 8) Vincent Rio Hondo #1 & #2 230 kV Lines
- 9) Eagle Rock Pardee 230 kV Line
- 10) Devers Palo Verde 500 kV Line
- 11) Mirage Coachely 230 kV Line
- 12)Mirage Ramon 230 kV Line
- 13) Mirage Julian Hinds 230 kV Line

These sub-stations form the boundary surrounding the LA Basin area:

- 1) San Onofre is in San Luis Rey is out
- 2) San Onofre is in Talega is out
- 3) Mira Loma is in Lugo is out
- 4) Rancho Vista is in Lugo is out
- 5) Eagle Rock is in Sylmar is out
- 6) Gould is in Sylmar is out
- 7) Mesa Cal is in Vincent is out
- 8) Rio Hondo is in Vincent is out
- 9) Eagle Rock is in Pardee is out
- 10) Devers is in Palo Verde is out
- 11) Mirage is in Coachely is out
- 12) Mirage is in Ramon is out
- 13) Mirage is in Julian Hinds is out

This study includes the new CEC forecast posted June 2012. Total 2013 busload within the defined area is 19,300 MW with 133 MW of losses and 27 MW of pumps resulting in total load + losses + pumps of 19,460 MW. However, the electrically "defined area" is not aligned with the geographic substations included in the CEC demand forecast, and the load modeled in the base cases represents a 1-in-10 level or 20,460 MW (based on

the adopted CEC forecast).

Total units and qualifying capacity available in the LA Basin area:

MKT/SCHED RESOURCE ID	BUS #	BUS NAME	kV	NQC	UNIT ID	LCR SUB-AREA NAME	NQC Comments	CAISO Tag
ALAMIT_7_UNIT 1	24001	ALAMT1 G	18	174.56	1	Western		Market
ALAMIT_7_UNIT 2	24002	ALAMT2 G	18	175.00	2	Western		Market
ALAMIT_7_UNIT 3	24003	ALAMT3 G	18	332.18	3	Western		Market
ALAMIT_7_UNIT 4	24004	ALAMT4 G	18	335.67	4	Western		Market
ALAMIT_7_UNIT 5	24005	ALAMT5 G	20	497.97	5	Western		Market
ALAMIT_7_UNIT 6	24161	ALAMT6 G	20	495.00	6	Western		Market
ANAHM_2_CANYN1	25211	CanyonGT	13.8	49.40	1	Western		MUNI
ANAHM_2_CANYN2	25212	CanyonGT	13.8	48.00	2	Western		MUNI
ANAHM_2_CANYN3	25213	CanyonGT	13.8	48.00	3	Western		MUNI
ANAHM_2_CANYN4	25214	CanyonGT	13.8	49.40	4	Western		MUNI
ANAHM_7_CT	25203	ANAHEIMG	13.8	40.64	1	Western	Aug NQC	MUNI
ARCOGN_2_UNITS	24011	ARCO 1G	13.8	54.28	1	Western	Aug NQC	QF/Selfgen
ARCOGN_2_UNITS	24012	ARCO 2G	13.8	54.28	2	Western	Aug NQC	QF/Selfgen
ARCOGN_2_UNITS	24013	ARCO 3G	13.8	54.28	3	Western	Aug NQC	QF/Selfgen
ARCOGN_2_UNITS	24014	ARCO 4G	13.8	54.28	4	Western	Aug NQC	QF/Selfgen
ARCOGN 2 UNITS	24163	ARCO 5G	13.8	27.14	5	Western	Aug NQC	QF/Selfgen
ARCOGN 2 UNITS	24164	ARCO 6G	13.8	27.15	6	Western	Aug NQC	QF/Selfgen
BARRE_2_QF	24016	BARRE	230	0.00		Western	Not modeled	QF/Selfgen
BARRE 6 PEAKER	29309	BARPKGEN	13.8	45.38	1	Western		Market
BRDWAY 7 UNIT 3	29007	BRODWYSC	13.8	65.00	1	Western		MUNI
BUCKWD 7 WINTCV	25634	BUCKWIND	115	0.15	W5	None	Aug NQC	Wind
CABZON_1_WINDA1	29290	CABAZON	33	11.29	1	None	Aug NQC	Wind
CENTER_2_QF	24203	CENTER S	66	18.10		Western	Not modeled Aug NQC	QF/Selfgen
CENTER_2_RHONDO	24203	CENTER S	66	1.91		Western	Not modeled	QF/Selfgen
CENTER_6_PEAKER	29308	CTRPKGEN	13.8	44.57	1	Western		Market
CENTRY_6_PL1X4	25302	CLTNCTRY	13.8	36.00	1	None	Aug NQC	MUNI
CHEVMN_2_UNITS	24022	CHEVGEN1	13.8	0.00	1	Western, El Nido	Aug NQC	QF/Selfgen
CHEVMN_2_UNITS	24023	CHEVGEN2	13.8	0.00	2	Western, El Nido	Aug NQC	QF/Selfgen
CHINO_2_QF	24024	CHINO	66	7.83		Western	Not modeled Aug NQC	QF/Selfgen
CHINO_2_SOLAR	24024	CHINO	66	0.00		Western	Not modeled	Market
CHINO_6_CIMGEN	24026	CIMGEN	13.8	25.29	1	Western	Aug NQC	QF/Selfgen
CHINO_6_SMPPAP	24140	SIMPSON	13.8	27.15	1	Western	Aug NQC	QF/Selfgen
CHINO_7_MILIKN	24024	CHINO	66	1.37		Western	Not modeled Aug NQC	Market
COLTON_6_AGUAM1	25303	CLTNAGUA	13.8	43.00	1	None	_	MUNI
CORONS_6_CLRWTR	24210	MIRALOMA	66	14.00		None	Not modeled	MUNI
CORONS_6_CLRWTR	24210	MIRALOMA	66	14.00		None	Not modeled	MUNI
DEVERS_1_QF	24815	GARNET	115	1.51	QF	None	Aug NQC	QF/Selfgen
DEVERS_1_QF	25632	TERAWND	115	2.94	QF	None	Aug NQC	QF/Selfgen
DEVERS_1_QF	25633	CAPWIND	115	0.56	QF	None	Aug NQC	QF/Selfgen
DEVERS_1_QF	25634	BUCKWIND	115	1.73	QF	None	Aug NQC	QF/Selfgen
DEVERS_1_QF	25635	ALTWIND	115	1.35	Q1	None	Aug NQC	QF/Selfgen
DEVERS_1_QF	25635	ALTWIND	115	2.50	Q2	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25636	RENWIND	115	0.59	Q1	None	Aug NQC	QF/Selfgen

DEVERS 1 QF	25636	RENWIND	115	2.28	Q2	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25636	RENWIND	115	0.27	W1	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25637	TRANWIND	115	6.68	QF	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25639	SEAWIND	115	2.01	QF	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25640	PANAERO	115	1.79	QF	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25645	VENWIND	115	1.53	EU	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25645	VENWIND	115	3.58	Q1	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25645	VENWIND	115	2.41	Q2	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25646	SANWIND	115	0.80	Q1	None	Aug NQC	QF/Selfgen
DEVERS 1 QF	25646	SANWIND	115	2.68	Q2	None		QF/Selfgen
					QZ		Aug NQC Not modeled	-
DMDVLY_1_UNITS	25425	ESRP P2	6.9	1.39		None	Aug NQC	QF/Selfgen
DREWS_6_PL1X4	25301	CLTNDREW	13.8	36.00	1	None	Aug NQC	MUNI
DVLCYN_1_UNITS	25603	DVLCYN3G	13.8	67.15	3	None	Aug NQC	MUNI
DVLCYN_1_UNITS	25604	DVLCYN4G	13.8	67.15	4	None	Aug NQC	MUNI
DVLCYN_1_UNITS	25648	DVLCYN1G	13.8	50.35	1	None	Aug NQC	MUNI
DVLCYN_1_UNITS	25649	DVLCYN2G	13.8	50.35	2	None	Aug NQC	MUNI
ELLIS_2_QF	24197	ELLIS	66	0.00		Western, Ellis	Not modeled Aug NQC	QF/Selfgen
ELSEGN_7_UNIT 3	24047	ELSEG3 G	18	0.00	3	Western, El Nido	Retired	Market
ELSEGN_7_UNIT 4	24048	ELSEG4 G	18	335.00	4	Western, El Nido		Market
ETIWND_2_FONTNA	24055	ETIWANDA	66	0.81		None	Not modeled Aug NQC	QF/Selfgen
ETIWND_2_QF	24055	ETIWANDA	66	14.86		None	Not modeled Aug NQC	QF/Selfgen
ETIWND_2_SOLAR	24055	ETIWANDA	66	0.00		None	Not modeled Aug NQC	Market
ETIWND 6 GRPLND	29305	ETWPKGEN	13.8	42.53	1	None	J	Market
ETIWND_6_MWDETI	25422	ETI MWDG	13.8	10.37	1	None	Aug NQC	Market
ETIWND_7_MIDVLY	24055	ETIWANDA	66	1.54		None	Not modeled Aug NQC	QF/Selfgen
ETIWND_7_UNIT 3	24052	MTNVIST3	18	320.00	3	None	J	Market
ETIWND_7_UNIT 4	24053	MTNVIST4	18	320.00	4	None		Market
GARNET_1_UNITS	24815	GARNET	115	0.71	G1	None	Aug NQC	QF/Selfgen
GARNET_1_UNITS	24815	GARNET	115	0.25	G2	None	Aug NQC	QF/Selfgen
GARNET_1_UNITS	24815	GARNET	115	0.51	G3	None	Aug NQC	QF/Selfgen
GARNET_1_UNITS	24815	GARNET	115	0.25	PC	None	Aug NQC	QF/Selfgen
GARNET_1_WIND	24815	GARNET	115	0.66	W2	None	Aug NQC	Wind
GARNET_1_WIND	24815	GARNET	115	0.66	W3	None	Aug NQC	Wind
GLNARM_7_UNIT 1	29005	PASADNA1	13.8	22.30	1	Western		MUNI
GLNARM_7_UNIT 2	29006	PASADNA2	13.8	22.30	1	Western		MUNI
GLNARM_7_UNIT 3	29005	PASADNA1	13.8	44.83		Western	Not modeled	MUNI
GLNARM_7_UNIT 4	29006	PASADNA2	13.8	42.42		Western	Not modeled	MUNI
HARBGN_7_UNITS	24062	HARBOR G	13.8	76.28	1	Western		Market
HARBGN_7_UNITS	24062	HARBOR G	13.8	11.86	HP	Western		Market
HARBGN_7_UNITS	25510	HARBORG4	4.16	11.86	LP	Western		Market
HINSON_6_CARBGN	24020	CARBOGEN	13.8	21.46	1	Western	Aug NQC	Market
HINSON_6_LBECH1	24078	LBEACH1G	13.8	65.00	1	Western		Market
HINSON_6_LBECH2	24170	LBEACH2G	13.8	65.00	2	Western		Market
HINSON_6_LBECH3	24171	LBEACH3G	13.8	65.00	3	Western		Market
HINSON_6_LBECH4	24172	LBEACH4G	13.8	65.00	4	Western		Market
HINSON 6 SERRGN	04400	LOCDDCOCK	1400	20.20	1 4	11/	A NOC	OF/Calfaran
HNTGBH 7 UNIT 1	24139 24066	SERRFGEN HUNT1 G	13.8 13.8	28.38 225.75	1	Western Western, Ellis	Aug NQC	QF/Selfgen Market

HNTGBH_7_UNIT 2	24067	HUNT2 G	13.8	225.80	2	Western, Ellis		Market
INDIGO_1_UNIT 1	29190	WINTECX2	13.8	42.00	1	None		Market
INDIGO_1_UNIT 2	29191	WINTECX1	13.8	42.00	1	None		Market
INDIGO_1_UNIT 3	29180	WINTEC8	13.8	42.00	1	None		Market
INLDEM_5_UNIT 1	29041	IEEC-G1	19.5	335.00	1	Valley	Aug NQC	Market
INLDEM_5_UNIT 2	29042	IEEC-G2	19.5	335.00	1	Valley	Aug NQC	Market
JOHANN_6_QFA1	24072	JOHANNA	230	0.00		Western, Ellis	Not modeled Aug NQC	QF/Selfgen
LACIEN_2_VENICE	24337	VENICE	13.8	4.45	1	Western, El Nido	Aug NQC	MUNI
LAFRES_6_QF	24073	LA FRESA	66	2.55		Western, El Nido	Not modeled Aug NQC	QF/Selfgen
LAGBEL_6_QF	24075	LAGUBELL	66	10.60		Western	Not modeled Aug NQC	QF/Selfgen
LGHTHP_6_ICEGEN	24070	ICEGEN	13.8	46.55	1	Western	Aug NQC	QF/Selfgen
LGHTHP_6_QF	24083	LITEHIPE	66	1.10		Western	Not modeled Aug NQC	QF/Selfgen
MESAS_2_QF	24209	MESA CAL	66	1.06		Western	Not modeled Aug NQC	QF/Selfgen
MIRLOM_2_CORONA				2.35		None	Not modeled Aug NQC	QF/Selfgen
MIRLOM_2_TEMESC				2.49		None	Not modeled Aug NQC	QF/Selfgen
MIRLOM_6_DELGEN	24030	DELGEN	13.8	29.78	1	None	Aug NQC	QF/Selfgen
MIRLOM_6_PEAKER	29307	MRLPKGEN	13.8	43.18	1	None		Market
MIRLOM_7_MWDLKM	24210	MIRALOMA	66	4.60		None	Not modeled Aug NQC	MUNI
MOJAVE_1_SIPHON	25657	MJVSPHN1	13.8	6.00	1	None	Aug NQC	Market
MOJAVE_1_SIPHON	25657	MJVSPHN1	13.8	6.00	2	None	Aug NQC	Market
MOJAVE_1_SIPHON	25657	MJVSPHN1	13.8	6.00	3	None	Aug NQC	Market
MTWIND_1_UNIT 1	29060	MOUNTWND	115	7.08	S1	None	Aug NQC	Wind
MTWIND_1_UNIT 2	29060	MOUNTWND	115	2.76	S2	None	Aug NQC	Wind
MTWIND_1_UNIT 3	29060	MOUNTWND	115	2.88	S3	None	Aug NQC	Wind
OLINDA_2_COYCRK	24211	OLINDA	66	3.13		Western	Not modeled	QF/Selfgen
OLINDA_2_QF	24211	OLINDA	66	0.78	1	Western	Aug NQC	QF/Selfgen
OLINDA_7_LNDFIL	24201	BARRE	66	4.50		Western	Not modeled Aug NQC	QF/Selfgen
PADUA_2_ONTARO	24111	PADUA	66	0.91		None	Not modeled Aug NQC	QF/Selfgen
PADUA_6_MWDSDM	24111	PADUA	66	7.70		None	Not modeled Aug NQC	MUNI
PADUA_6_QF	24111	PADUA	66	0.74		None	Not modeled Aug NQC	QF/Selfgen
PADUA_7_SDIMAS	24111	PADUA	66	1.05		None	Not modeled Aug NQC	QF/Selfgen
PWEST_1_UNIT				0.15		Western	Not modeled Aug NQC	Market
REDOND_7_UNIT 5	24121	REDON5 G	18	178.87	5	Western		Market
REDOND_7_UNIT 6	24122	REDON6 G	18	175.00	6	Western		Market
REDOND_7_UNIT 7	24123	REDON7 G	20	505.96	7	Western		Market
REDOND_7_UNIT 8	24124	REDON8 G	20	495.90	8	Western		Market
RHONDO_2_QF	24213	RIOHONDO	66	2.54		Western	Not modeled Aug NQC	QF/Selfgen
RHONDO_6_PUENTE	24213	RIOHONDO	66	0.00		Western	Not modeled Aug NQC	Market
RVSIDE_2_RERCU3	24299	RERC2G3	13.8	48.50	1	None		MUNI
RVSIDE_2_RERCU4	24300	RERC2G4	13.8	48.50	1	None		MUNI

RVSIDE 6 RERCU1	24242	RERC1G	13.8	48.35	1	None		MUNI
RVSIDE_6_RERCU2	24243	RERC2G	13.8	48.50	1	None		MUNI
RVSIDE_6_SPRING	24244	SPRINGEN	13.8	36.00	1	None		Market
SANTGO_6_COYOTE	24133	SANTIAGO	66	6.08	1	Western, Ellis	Aug NQC	Market
SBERDO_2_PSP3	24921	MNTV-CT1	18	129.71	1	None		Market
SBERDO_2_PSP3	24922	MNTV-CT2	18	129.71	1	None		Market
SBERDO_2_PSP3	24923	MNTV-ST1	18	225.08	1	None		Market
SBERDO_2_PSP4	24924	MNTV-CT3	18	129.71	1	None		Market
SBERDO_2_PSP4	24925	MNTV-CT4	18	129.71	1	None		Market
SBERDO_2_PSP4	24926	MNTV-ST2	18	225.08	1	None		Market
SBERDO_2_QF	24214	SANBRDNO	66	0.14		None	Not modeled Aug NQC	QF/Selfgen
SBERDO_2_SNTANA	24214	SANBRDNO	66	0.27		None	Not modeled Aug NQC	QF/Selfgen
SBERDO_6_MILLCK	24214	SANBRDNO	66	1.28		None	Not modeled Aug NQC	QF/Selfgen
SONGS_7_UNIT 2	24129	S.ONOFR2	22	0.00	2	Western	Not available	Nuclear
SONGS_7_UNIT 3	24130	S.ONOFR3	22	0.00	3	Western	Not available	Nuclear
TIFFNY_1_DILLON				5.63		Western	Not modeled Aug NQC	Wind
VALLEY_5_PERRIS	24160	VALLEYSC	115	7.94		Valley	Not modeled Aug NQC	QF/Selfgen
VALLEY_5_REDMTN	24160	VALLEYSC	115	2.00		Valley	Not modeled Aug NQC	QF/Selfgen
VALLEY_7_BADLND	24160	VALLEYSC	115	0.54		Valley	Not modeled Aug NQC	Market
VALLEY_7_UNITA1	24160	VALLEYSC	115	1.34		Valley	Not modeled Aug NQC	Market
VERNON_6_GONZL1				5.75		Western	Not modeled	MUNI
VERNON_6_GONZL2				5.75		Western	Not modeled	MUNI
VERNON_6_MALBRG	24239	MALBRG1G	13.8	42.37	C1	Western		MUNI
VERNON_6_MALBRG	24240	MALBRG2G	13.8	42.37	C2	Western		MUNI
VERNON_6_MALBRG	24241	MALBRG3G	13.8	49.26	S3	Western		MUNI
VILLPK_2_VALLYV	24216	VILLA PK	66	4.10		Western	Not modeled Aug NQC	QF/Selfgen
	24216	VILLA PK	66	0.00		Western	Not modeled Aug NQC	MUNI
VISTA_6_QF	24902	VSTA	66	0.17	1	None	Aug NQC	QF/Selfgen
WALNUT_6_HILLGEN	24063	HILLGEN	13.8	47.07	1	Western	Aug NQC	QF/Selfgen
WALNUT_7_WCOVCT	24157	WALNUT	66	3.43		Western	Not modeled Aug NQC	Market
WALNUT_7_WCOVST	24157	WALNUT	66	2.98		Western	Not modeled Aug NQC	Market
WHTWTR_1_WINDA1	29061	WHITEWTR	33	8.26	1	None	Aug NQC	Wind
ARCOGN_2_UNITS	24018	BRIGEN	13.8	0.00	1	Western	No NQC - hist. data	Market
HINSON_6_QF	24064	HINSON	66	0.00	1	Western	No NQC - hist. data	QF/Selfgen
INLAND_6_UNIT	24071	INLAND	13.8	30.30	1	None	No NQC - hist. data	QF/Selfgen
MOBGEN_6_UNIT 1	24094	MOBGEN	13.8	20.20	1	Western, El Nido	No NQC - hist. data	QF/Selfgen
NA	24324	SANIGEN	13.8	6.80	D1	None	No NQC - hist. data	QF/Selfgen
NA	24325	ORCOGEN	13.8	0.00	1	Western, Ellis	No NQC - hist. data	QF/Selfgen

NA	24327	THUMSGEN	13.8	40.00	1	Western	No NQC - hist. data	QF/Selfgen
NA	24328	CARBGEN2	13.8	15.2	1	Western	No NQC – hist. data	Market
NA	24329	MOBGEN2	13.8	20.2	1	Western, El Nido	No NQC – hist. data	QF/Selfgen
NA	24330	OUTFALL1	13.8	0.00	1	Western, El Nido	No NQC - hist. data	QF/Selfgen
NA	24331	OUTFALL2	13.8	0.00	1	Western, El Nido	No NQC - hist. data	QF/Selfgen
NA	24332	PALOGEN	13.8	3.60	D1	Western, El Nido	No NQC - hist. data	QF/Selfgen
NA	24341	COYGEN	13.8	0.00	1	Western, Ellis	No NQC - hist. data	QF/Selfgen
NA	24342	FEDGEN	13.8	0.00	1	Western	No NQC - hist. data	QF/Selfgen
NA	24839	BLAST	115	45.00	1	None	No NQC – hist. data	QF/Selfgen
NA	29021	WINTEC6	115	45.00	1	None	No NQC – hist. data	Wind
NA	29023	WINTEC4	12	16.50	1	None	No NQC – hist. data	Wind
NA	29060	SEAWEST	115	44.40	S1	None	No NQC – hist. data	Wind
NA	29060	SEAWEST	115	22.20	S2	None	No NQC – hist. data	Wind
NA	29060	SEAWEST	115	22.40	S3	None	No NQC – hist. data	Wind
NA	29260	ALTAMSA4	115	40.00	1	None	No NQC – hist. data	Wind
NA	29338	CLEARGEN	13.8	0.00	1	None	No NQC - hist. data	QF/Selfgen
NA	29339	DELGEN	13.8	0.00	1	None	No NQC - hist. data	QF/Selfgen
NA	29951	REFUSE	13.8	9.90	D1	Western	No NQC - Pmax	QF/Selfgen
NA	29953	SIGGEN	13.8	24.90	D1	Western	No NQC - Pmax	QF/Selfgen
HNTGBH_7_UNIT 3	24167	HUNT3 G	13.8	0.00	3	Western, Ellis	Retired	Market
HNTGBH_7_UNIT 4	24168	HUNT4 G	13.8	0.00	4	Western, Ellis	Retired	Market
New unit	29201	EME WCG1	13.8	100	1	Western	No NQC - Pmax	Market
New unit	29202	EME WCG2	13.8	100	1	Western	No NQC - Pmax	Market
New unit	29203	EME WCG3	13.8	100	1	Western	No NQC - Pmax	Market
New unit	29204	EME WCG4	13.8	100	1	Western	No NQC - Pmax	Market
New unit	29205	EME WCG5	13.8	100	1	Western	No NQC - Pmax	Market

Major new projects modeled:

- 1. Walnut Creek Energy Center
- 2. Huntington Beach #3 and #4 retirement
- 3. Del Amo Ellis 230 kV line loops into Barre 230 kV substation

- 4. Recalibrate arming level for Santiago SPS
- 5. El Segundo #3 retirement

El Segundo Repowering (630 MW) and Sentinel (850 MW) have not been relied upon since the publicly announced commercial operating date is August 2013 (based on CEC web site http://www.energy.ca.gov/sitingcases/all_projects.html).

Critical Contingency Analysis Summary

LA Basin Overall:

The most critical contingency for the LA Basin is the loss of Imperial Valley-Miguel 500 kV line followed Imperial Valley-Suncrest 500 kV line or vice versa, which would result in voltage below the minimum allowable (218 kV) at the San Onofre 230 kV switchyard as specified in the Appendix E of the Transmission Control Agreement (TCA)³ as required by the NERC NUC-001 Standards. This limiting contingency establishes an LCR of 11,157 MW in 2013 (includes 810 MW of QF, 230 MW of Wind and 1166 MW of Muni generation as well as 1241 MW of deficiency) as the minimum generation capacity necessary for reliable load serving capability within this area.

The most critical single contingency for the LA Basin is the loss of Alamitos Unit #5 followed by Palo Verde-Devers 500 kV line, which would cause the South of Lugo flow to exceed its 6400 MW path rating limit. This limiting contingency establishes an LCR of 9,745 MW for 2013 (includes 810 MW of QF, 230 MW of Wind and 1166 MW of Muni generation as well as 83 MW of deficiency).

Effectiveness factors:

The following table has units that have at least 5% effectiveness to the abovementioned South of Lugo constraint within the LA Basin area:

Gen Bus	Gen Name	Gen ID	MW Eff Fctr (%)
24052	MTNVIST3	3	76

³ TCA: http://www.caiso.com/Documents/TransmissionControlAgreement-Updatedas-Dec3_2010.pdf

24053	MTNVIST4	4	76
24071	INLAND	1	75
25422	ETI MWDG	1	75
29305	ETWPKGEN	1	75
29041	IEEC-G1	1	74
29042	IEEC-G2	2	74
24242	RERC1G	1	74
24243	RERC2G	1	74
24244	SPRINGEN	1	74
25301	CLTNDREW	1	74
25302	CLTNCTRY	1	74
25303	CLTNAGUA	1	74
24299	RERC2G3	1	74
24300	RERC2G4	1	74
24921	MNTV-CT1	1	72
24922	MNTV-CT2	1	72
24923	MNTV-ST1	1	72
24924	MNTV-CT3	1	72
24925	MNTV-CT4	1	72
24926	MNTV-ST2	1	72
29307	MRLPKGEN	1	72
29338	CLEARGEN	1	71
29339	DELGEN	1	71
24026	CIMGEN	D1	71
24140	SIMPSON	D1	71
24030	DELGEN	1	71
24815	GARNET	QF	71
24815	GARNET	W3	71
29190	WINTECX2	1	70
29191	WINTECX1	1	70
29180	WINTEC8	1	70
29023	WINTEC4	1	70
29021	WINTEC6	1	70
24839	BLAST	1	70
25648	DVLCYN1G	1	70
25649	DVLCYN2G	2	70
25603	DVLCYN3G	3	70
25604	DVLCYN4G	4	70
25632	TERAWND	QF	70
25634	BUCKWND	QF	70
25635	ALTWIND	Q1	70
25635	ALTWIND	Q2	70
25637	TRANWND	QF	70

25645	VENWIND	EU	70
25645	VENWIND	Q2	70
25645	VENWIND	Q1	70
25646	SANWIND	Q2	70
29060	MOUNTWND	S1	70
29060	MOUNTWND	S3	70
29060	MOUNTWND	S2	70
29061	WHITEWTR	1	70
29290	CABAZON	1	70
25639	SEAWIND	QF	69
25640	PANAERO	QF	69
29260	ALTAMSA4	1	69
25633	CAPWIND	QF	66
25657	MJVSPHN1	1	66
25658	MJVSPHN2	2	66
25659	MJVSPHN3	3	66
25203	ANAHEIMG	1	62
25211	CanyonGT 1	1	60
25212	CanyonGT 2	2	60
25213	CanyonGT 3	3	60
25214	CanyonGT 4	4	60
29309	BARPKGEN	1	58
24066	HUNT1 G	1	58
24067	HUNT2 G	2	58
24133	SANTIAGO	1	58
24325	ORCOGEN	1	58
24341	COYGEN	1	57
24005	ALAMT5 G	5	53
24161	ALAMT6 G	6	53
24063	HILLGEN	D1	53
29201	EME WCG1	1	53
29203	EME WCG3	1	53
29204	EME WCG4	1	53
29205	EME WCG5	1	53
29202	EME WCG2	1	53
24001	ALAMT1 G	1	50
24002	ALAMT2 G	2	50
24003	ALAMT3 G	3	50
24004	ALAMT4 G	4	50
29953	SIGGEN	D1	48
24018	BRIGEN	1	46
24011	ARCO 1G	1	44
24012	ARCO 2G	2	44

24013	ARCO 3G	3	44
24014	ARCO 4G	4	44
24163	ARCO 5G	5	44
24164	ARCO 6G	6	44
24020	CARBGEN1	1	44
24064	HINSON	1	44
24070	ICEGEN	D1	44
24170	LBEACH12	2	44
24171	LBEACH34	3	44
24094	MOBGEN1	1	44
24062	HARBOR G	1	44
25510	HARBORG4	LP	44
24062	HARBOR G	HP	44
24139	SERRFGEN	D1	44
24170	LBEACH12	1	44
24171	LBEACH34	4	44
24327	THUMSGEN	1	44
24328	CARBGEN2	1	44
24022	CHEVGEN1	1	41
24023	CHEVGEN2	2	41
24330	OUTFALL1	1	41
24331	OUTFALL2	1	41
24332	PALOGEN	D1	41
24333	REDON1 G	R1	41
24334	REDON2 G	R2	41
24335	REDON3 G	R3	41
24336	REDON4 G	R4	41
24337	VENICE	1	41
24047	ELSEG3 G	3	41
24048	ELSEG4 G	4	41
24121	REDON5 G	5	41
24122	REDON6 G	6	41
24123	REDON7 G	7	41
24124	REDON8 G	8	41
24329	MOBGEN2	1	41
29209	BLY1ST1	1	40
29207	BLY1CT1	1	40
29208	BLY1CT2	1	40
24342	FEDGEN	1	39
29951	REFUSE	D1	37
24241	MALBRG3G	S3	37
24240	MALBRG2G	C2	37
24239	MALBRG1G	C1	37

29005	PASADNA1	1	29
29006	PASADNA2	1	29
29007	BRODWYSC	1	29
29308	CTRPKGEN	1	19

Valley Sub-Area:

The most critical contingency for the Valley sub-area is the loss of Palo Verde – Devers 500 kV line and Valley – Serrano 500 kV line or vice versa, which would result in voltage collapse. This limiting contingency establishes a LCR of 670 MW (includes 10 MW of QF generation) in 2013 as the generation capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

The generators inside the sub-area have the same effectiveness factors.

Western Sub-Area:

The most critical contingency for the Western sub-area is the loss of Serrano-Villa Park #2 230 kV line followed by the loss of the Serrano-Lewis 230 kV line or vice versa, which would result in thermal overload of the remaining Serrano-Villa Park 230 kV line. This limiting contingency establishes a LCR of 4,597 MW (includes 623 MW of QF, 6 MW of Wind and 582 MW of Muni generation) in 2013 as the generation capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

The following table has units that have at least 5% effectiveness to the abovementioned constraint:

			MW Eff Fctr
Gen Bus	Gen Name	Gen ID	(%)
29309	BARPKGEN	1	29
25203	ANAHEIMG	1	28
25211	CanyonGT 1	1	27
25212	CanyonGT 2	2	27
25213	CanyonGT 3	3	27
25214	CanyonGT 4	4	27
24066	HUNT1 G	1	25

24067	HUNT2 G	2	25
24325	ORCOGEN	1	24
24005	ALAMT5 G	5	23
24161	ALAMT6 G	6	23
24001	ALAMT1 G	1	22
24002	ALAMT2 G	2	22
24003	ALAMT3 G	3	22
24004	ALAMT4 G	4	22
24133	SANTIAGO	1	18
24341	COYGEN	1	18
24011	ARCO 1G	1	17
24012	ARCO 2G	2	17
24013	ARCO 3G	3	17
24014	ARCO 4G	4	17
24018	BRIGEN	1	17
24020	CARBGEN1	1	17
24064	HINSON	1	17
24070	ICEGEN	D1	17
24170	LBEACH12	2	17
24171	LBEACH34	3	17
24062	HARBOR G	1	17
25510	HARBORG4	LP	17
24062	HARBOR G	HP	17
24139	SERRFGEN	D1	17
24170	LBEACH12	1	17
24171	LBEACH34	4	17
24173	LBEACH5G	R5	17
24174	LBEACH6G	R6	17
24327	THUMSGEN	1	17
24328	CARBGEN2	1	17
24079	LBEACH7G	R7	17
24080	LBEACH8G	R8	17
24081	LBEACH9G	R9	17
24163	ARCO 5G	5	17
24164	ARCO 6G	6	17
24094	MOBGEN1	1	16
29308	CTRPKGEN	1	16
24329	MOBGEN2	1	16
24330	OUTFALL1	1	16
24331	OUTFALL2	1	16
24332	PALOGEN	D1	16
24022	CHEVGEN1	1	15
24023	CHEVGEN2	2	15

24048	ELSEG4 G	4	15
24333	REDON1 G	R1	15
24334	REDON2 G	R2	15
24335	REDON3 G	R3	15
24336	REDON4 G	R4	15
24337	VENICE	1	15
29953	SIGGEN	D1	15
24047	ELSEG3 G	3	15
24121	REDON5 G	5	15
24122	REDON6 G	6	15
24123	REDON7 G	7	15
24124	REDON8 G	8	15
29951	REFUSE	D1	14
24342	FEDGEN	1	14
24241	MALBRG3G	S3	14
24240	MALBRG2G	C2	14
24239	MALBRG1G	C1	14
29005	PASADNA1	1	11
29006	PASADNA2	1	11
29007	BRODWYSC	1	11
24063	HILLGEN	D1	7
29201	EME WCG1	1	7
29203	EME WCG3	1	7
29204	EME WCG4	1	7
29205	EME WCG5	1	7
29202	EME WCG2	1	7

There are numerous other combinations of contingencies in the area that could overload a significant number of 230 kV lines in this sub-area but have less LCR need. As such, anyone of them (combination of contingencies) could become binding for any given set of procured resources. As a result, effectiveness factors may not be the best indicator towards informed procurement.

Ellis sub-area

The most critical contingency for Ellis sub-area is the loss of the Imperial Valley-North Gila 500 kV line followed by the loss of the Barre – Ellis #1 or #2 230 kV lines, which overload the remaining line. This limiting contingency establishes an LCR of 818 MW in 2013 (which includes 6 MW of QF generation as well as 360 MW of deficiency) as the

minimum capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

The generators inside the sub-area have the same effectiveness factors.

El Nido sub-area

The most critical contingency for the El Nido sub-area is the loss of the La Fresa – Hinson 230 kV line followed by the loss of the La Fresa – Redondo #1 and #2 230 kV lines, which would cause voltage collapse. This limiting contingency establishes an LCR of 386 MW in 2013 (which includes 47 MW of QF and 4 MW of MUNI generation) as the minimum capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

The generators inside the sub-area have the same effectiveness factors.

Changes to study results compared to SONGS being operational:

The load forecast is essentially the same. The total available capacity has decreased by 3,211 MW (2246 MW SONGS + 335 MW El Segundo # 3 + 630 MW El Segundo Repower). The Ellis sub-area LCR needs have increased significantly, by 818 MW, due to the additional flow through this sub-area required to serve San Diego load in absence of SONGS. The Western sub-area LCR needs have decreased by about 943 MW mainly due to the fact that there are other units in this sub-area with higher effectiveness factors than SONGS that are now required and that have not been previously accounted for, due to unit dispatch methodology (see final 2013 LCR manual for order in which units are turned on). The LA Basin single contingency need has decreased by a total of 550 MW, mainly due to the difference between P max of SONGS and Alamitos #5 (new worst-case resource outage) and due to higher LCR needs in the San Diego-Imperial Valley area and has partly (increased) due to the smaller effectiveness factors relative to South of Lugo path for units required to replace SONGS. The LA Basin has a new multiple contingency requirement due to voltage support issues that arise in the area, without SONGS, for outages in San Diego's system. For mitigation of new deficiencies please see chapter II.

LA Basin Overall Requirements:

2013	QF/Wind (MW)	Muni (MW)	Nuclear (MW)	Market (MW)	Max. Qualifying Capacity (MW)
Available generation	1040	1166	0	7710	9916

2013	Existing Generation Capacity Needed (MW)	Deficiency (MW)	Total MW LCR Need
Category B (Single) ⁴	9,745	0	9,745
Category C (Multiple) ⁵	9,916	1,241	11,157

2. San Diego-Imperial Valley Area

Area Definition

The transmission tie lines forming a boundary around the Greater San Diego-Imperial Valley area include:

- 1) Imperial Valley North Gila 500 kV Line
- 2) Otay Mesa Tijuana 230 kV Line
- 3) San Onofre San Luis Rey #1 230 kV Line
- 4) San Onofre San Luis Rey #2 230 kV Line
- 5) San Onofre San Luis Rey #3 230 kV Line
- 6) San Onofre Talega #1 230 kV Line
- 7) San Onofre Talega #2 230 kV Line
- 8) Imperial Valley El Centro 230 kV Line
- 9) Imperial Valley Dixieland 230 kV Line
- 10) Imperial Valley La Rosita 230 kV Line

The substations that delineate the Greater San Diego-Imperial Valley area are:

- 1) Imperial Valley is in North Gila is out
- 2) Otay Mesa is in Tijuana is out
- 3) San Onofre is out San Luis Rey is in
- 4) San Onofre is out San Luis Rey is in
- 5) San Onofre is out San Luis Rey is in

4

⁴ A single contingency means that the system will be able the survive the loss of a single element, however the operators will not have any means (other than load drop) in order to bring the system within a safe operating zone and get prepared for the next contingency as required by NERC transmission operations standards.

⁵ Multiple contingencies means that the system will be able the survive the loss of a single element, and the operators will have enough generation (other operating procedures) in order to bring the system within a safe operating zone and get prepared for the next contingency as required by NERC transmission operations standards.

- 6) San Onofre is out Talega is in
- 7) San Onofre is out Talega is in
- 8) Imperial Valley is in El Centro is out
- 9) Imperial Valley is in Dixieland is out
- 10) Imperial Valley is in La Rosita is out

Study includes the new CEC adopted forecast that was posted in June 2012. The total 2013 busload within the defined area: 4990 MW with 134 MW of losses resulting in total load + losses of 5124 MW.

Total units and qualifying capacity available in this area:

MKT/SCHED RESOURCE ID	BUS #	BUS NAME	kV	NQC	UNIT ID	LCR SUB-AREA NAME	NQC Comments	CAISO Tag
BORDER_6_UNITA1	22149	CALPK_BD	13.8	48.98	1	San Diego		Market
CBRLLO_6_PLSTP1	22092	CABRILLO	69	2.23	1	San Diego	Aug NQC	QF/Selfgen
CCRITA_7_RPPCHF	22124	CHCARITA	138	3.69	1	San Diego	Aug NQC	QF/Selfgen
CHILLS_1_SYCENG	22120	CARLTNHS	138	0.26	1	San Diego	Aug NQC	QF/Selfgen
CHILLS_7_UNITA1	22120	CARLTNHS	138	1.31	2	San Diego	Aug NQC	QF/Selfgen
CPSTNO_7_PRMADS	22112	CAPSTRNO	138	4.73	1	San Diego	Aug NQC	QF/Selfgen
CRSTWD_6_KUMYAY	22915	KUMEYAAY	34.5	6.70	1	San Diego	Aug NQC	Wind
DIVSON_6_NSQF	22172	DIVISION	69	34.41	1	San Diego	Aug NQC	QF/Selfgen
EGATE_7_NOCITY	22204	EASTGATE	69	0.21	1	San Diego	Aug NQC	QF/Selfgen
ELCAJN_6_LM6K	23320	EC GEN2	13.8	48.10	1	San Diego, El Cajon		Market
ELCAJN_6_UNITA1	22150	CALPK_EC	13.8	45.42	1	San Diego, El Cajon		Market
ELCAJN_7_GT1	22212	ELCAJNGT	12.5	16.00	1	San Diego, El Cajon		Market
ENCINA_7_EA1	22233	ENCINA 1	14.4	106.00	1	San Diego		Market
ENCINA_7_EA2	22234	ENCINA 2	14.4	104.00	1	San Diego		Market
ENCINA_7_EA3	22236	ENCINA 3	14.4	110.00	1	San Diego		Market
ENCINA_7_EA4	22240	ENCINA 4	22	300.00	1	San Diego		Market
ENCINA_7_EA5	22244	ENCINA 5	24	330.00	1	San Diego		Market
ENCINA_7_GT1	22248	ENCINAGT	12.5	14.50	1	San Diego		Market
ESCNDO_6_PL1X2	22257	ESGEN	13.8	35.50	1	San Diego		Market
ESCNDO_6_UNITB1	22153	CALPK_ES	13.8	48.04	1	San Diego		Market
ESCO_6_GLMQF	22332	GOALLINE	69	39.92	1	San Diego, Esco	Aug NQC	QF/Selfgen
KEARNY_7_KY1	22377	KEARNGT1	12.5	16.00	1	San Diego, Mission		Market
KEARNY_7_KY2	22373	KEARN2AB	12.5	15.02	1	San Diego, Mission		Market
KEARNY_7_KY2	22373	KEARN2AB	12.5	15.02	2	San Diego, Mission		Market
KEARNY_7_KY2	22374	KEARN2CD	12.5	15.02	1	San Diego, Mission		Market
KEARNY_7_KY2	22374	KEARN2CD	12.5	13.95	2	San Diego, Mission		Market
KEARNY_7_KY3	22375	KEARN3AB	12.5	14.98	1	San Diego, Mission		Market
KEARNY_7_KY3	22375	KEARN3AB	12.5	16.05	2	San Diego,		Market

ĺ	1	I				Mission		
KEARNY 7 KY3	22376	KEARN3CD	12.5	14.98	1	San Diego,		Market
INCARRIT_I_RTS	22370	REARINGOD	12.0	14.50	<u>'</u>	Mission		Market
KEARNY_7_KY3	22376	KEARN3CD	12.5	14.98	2	San Diego, Mission		Market
LAKHDG_6_UNIT 1	22625	LKHODG1	13.8	20.00	1	San Diego, Bernardo		Market
LARKSP_6_UNIT 1	22074	LRKSPBD1	13.8	46.00	1	San Diego		Market
LARKSP_6_UNIT 2	22075	LRKSPBD2	13.8	46.00	1	San Diego		Market
LAROA1_2_UNITA1	20187	LRP-U1	16	165	1	None		Market
LAROA2_2_UNITA1	22996	INTBST	18	157	1	None		Market
LAROA2_2_UNITA1	22997	INTBCT	16	165	1	None		Market
MRGT_6_MEF2	22487	MFE_MR2	13.8	47.90	1	San Diego, Mission, Miramar		Market
MRGT_6_MMAREF	22486	MFE_MR1	13.8	48.00	1	San Diego, Mission, Miramar		Market
MRGT_7_UNITS	22488	MIRAMRGT	12.5	18.55	1	San Diego, Mission, Miramar		Market
MRGT_7_UNITS	22488	MIRAMRGT	12.5	17.45	2	San Diego, Mission, Miramar		Market
MSHGTS_6_MMARLF	22448	MESAHGTS	69	3.19	1	San Diego, Mission	Aug NQC	QF/Selfgen
MSSION_2_QF	22496	MISSION	69	0.74	1	San Diego	Aug NQC	QF/Selfgen
NIMTG_6_NIQF	22576	NOISLMTR	69	35.59	1	San Diego	Aug NQC	QF/Selfgen
OGROVE_6_PL1X2	22628	PA99MWQ1	13.8	49.95	1	San Diego, Pala		Market
OGROVE_6_PL1X2	22629	PA99MWQ2	13.8	49.95	2	San Diego, Pala		Market
OTAY_6_PL1X2	22617	OYGEN	13.8	35.50	1	San Diego		Market
OTAY_6_UNITB1	22604	OTAY	69	2.80	1	San Diego	Aug NQC	QF/Selfgen
OTAY_7_UNITC1	22604	OTAY	69	2.65	3	San Diego	Aug NQC	QF/Selfgen
OTMESA_2_PL1X3	22605	OTAYMGT1	18	185.06	1	San Diego		Market
OTMESA_2_PL1X3	22606	OTAYMGT2	18	185.06	1	San Diego		Market
OTMESA_2_PL1X3	22607	OTAYMST1	16	233.48	1	San Diego		Market
PALOMR_2_PL1X3	22262	PEN_CT1	18	162.39	1	San Diego		Market
PALOMR_2_PL1X3	22263	PEN_CT2	18	162.39	1	San Diego		Market
PALOMR_2_PL1X3	22265	PEN_ST	18	240.83	1	San Diego		Market
PTLOMA_6_NTCCGN	22660	POINTLMA	69	1.65	2	San Diego	Aug NQC	QF/Selfgen
PTLOMA_6_NTCQF	22660	POINTLMA	69	16.70	1	San Diego	Aug NQC	QF/Selfgen
SAMPSN_6_KELCO1	22704	SAMPSON	12.5	0.72	1	San Diego	Aug NQC	QF/Selfgen
SMRCOS_6_UNIT 1	22724	SANMRCOS	69	0.47	1	San Diego	Aug NQC	QF/Selfgen
TERMEX_2_PL1X3	22981	IV GEN1	18	281	1	None		Market
TERMEX_2_PL1X3	22982	IV GEN2	18	156	1	None		Market
TERMEX_2_PL1X3	22983	IVGEN3	18	156	1	None		Market
NA	22444	MESA RIM	69	0.00	1	San Diego	No NQC - hist. data	QF/Selfgen
NA	22592	OLD TOWN	69	0.00	1	San Diego	No NQC - hist. data	QF/Selfgen
NA	22602	OMWD	69	0.00	1	San Diego	No NQC - hist. data	QF/Selfgen
NA	22708	SANLUSRY	69	0.00	1	San Diego	No NQC - hist. data	QF/Selfgen
NA	22916	PFC-AVC	0.6	0.00	1	San Diego	No NQC - hist. data	QF/Selfgen
LAKHDG_6_UNIT 2	22626	LKHODG2	13.8	20.00	2	San Diego, Bernardo	No NQC - Pmax	Market

Major new projects modeled:

- 1. Sunrise Power Link Project (Southern Route)
- 2. Eastgate Rose Canyon 69kV (TL6927) reconductor
- 3. New Imperial Valley-Dixieland 230 kV line
- 4. East County 500 kV substation (ECO)
- 5. Lake Hodges unit # 2

Critical Contingency Analysis Summary

El Cajon Sub-area:

The most critical contingency for the El Cajon sub-area is the loss of the El Cajon-Jamacha 69 kV line (TL624) followed by the loss of Miguel-Granite-Los Coches 69 kV line (TL632), which would thermally overload the El Cajon – Los Coches 69 kV line (TL631). This limiting contingency establishes a LCR of 83 MW (including 0 MW of QF generation) in 2013 as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

The most critical single contingency for this sub-area is the loss of Miguel-Granite-Los Coches 69 kV line (TL632) with El Cajon Energy Center already out of service, which would thermally overload the El Cajon – Los Coches 69 kV line (TL631). This limiting contingency establishes a LCR of 53 MW (including 0 MW of QF generation) in 2013.

Effectiveness factors:

All units within this sub-area (El Cajon Peaker, El Cajon GT and El Cajon Energy Center) have the same effectiveness factor.

Rose Canyon Sub-area

This sub-area has been eliminated due to TL6927, Eastgate-Rose Canyon 69 kV reconductor which is already in-service.

Mission Sub-area

The most critical contingency for the Mission sub-area is the loss of Mission - Kearny 69 kV line (TL663) followed by the loss of Mission – Mesa Heights 69kV line (TL676), which would thermally overload the Mission - Clairmont 69kV line (TL670). This limiting contingency establishes a local capacity need of 126 MW (including 3 MW of QF generation) in 2013 as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

Miramar Energy Facility units and Miramar GTs (Cabrillo Power II) are 8% effective, Miramar Landfill unit and all Kearny peakers are 32% effective.

Bernardo Sub-area:

The most critical contingency for the Bernardo sub-area is the loss of Artesian - Sycamore 69 kV line followed by the loss of Poway-Rancho Carmel 69 kV line, which would thermally overload the Felicita Tap-Bernardo 69 kV line (TL689). This limiting contingency establishes a LCR of 110 MW (including 0 MW of QF generation and 70 MW of deficiency) in 2013 as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

All units within this sub-area (Lake Hodges) are needed so there is no effectiveness factor required.

Esco Sub-area

The most critical contingency for the Esco sub-area is the loss of Poway-Pomerado 69 kV line (TL6913) followed by the loss of Esco - Escondido 69kV line (TL6908) which would thermally overload the Bernardo – Rancho Carmel 69 kV line (TL633). This limiting contingency establishes a LCR of 114 MW (including 40 MW of QF generation and 74 MW of deficiency) in 2013 as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

Only unit within this sub-area (Goal line) is needed so no effectiveness factor is required.

Pala Sub-area

The most critical contingency for the Pala sub-area is the loss of Pendleton – San Luis Rey 69 kV line (TL6912) followed by the loss of Lilac - Pala 69kV line (TL6932) which would thermally overload the Melrose – Morro Hill Tap 69 kV line. This limiting contingency establishes a LCR of 43 MW (including 0 MW of QF generation) in 2013 as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

Effectiveness factors:

All units within this sub-area (Orange Grove) have the same effectiveness factor.

Miramar Sub-area

The most critical contingency for the Miramar sub-area is the loss of Otay Mesa – Miguel Tap – Silvergate 230kV line (TL23042) followed by the loss of Sycamore 230/138 kV Bank #60, which would thermally overload the Sycamore - Scripps 69 kV line (TL6916). This limiting contingency establishes a LCR of 97 MW (including 0 MW of QF generation) in 2013 as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

The most critical single contingency for this sub-area is the loss of Otay Mesa – Miguel Tap – Silvergate 230kV line (TL23042) with Miramar Energy Facility #1 or #2 out of service, which would thermally overload the Sycamore - Scripps 69 kV line (TL6916). This limiting contingency establishes a LCR of 86 MW (including 0 MW of QF generation) in 2013.

Effectiveness factors:

All units within this sub-area (Miramar Energy Facility and Miramar GTs) have the same

effectiveness factor.

San Diego Sub-area:

The most limiting contingency for San Diego sub-area is the loss of Imperial Valley-Suncrest 500 kV line followed by the loss of ECO-Miguel 500 kV line. The limiting constraint is the post-transient voltage instability. This contingency establishes an LCR of 3,536 MW in 2013 (includes 151 MW of QF generation and 7 MW of Wind as well as 467 MW of deficiency) as the minimum generation capacity necessary for reliable load serving capability within this sub-area.

The most limiting single contingency in the San Diego sub-area is a (G-1/N-1) contingency described by the outage of ECO-Miguel 500 kV line with Otay Mesa Combined-Cycle Power Plant (603 MW) already out of service. The limiting constraint is post-transient voltage instability. This contingency establishes an LCR of 2,462 MW in 2013 (includes 151 MW of QF generation and 7 MW of Wind).

Effectiveness factors:

All units within this area have the same effectiveness factor. Units outside of this area are not effective.

San Diego Sub-area Requirements:

 2013
 QF (MW)
 Wind (MW)
 Market (MW)
 Max. Qualifying Capacity (MW)

 Available generation
 151
 7
 2911
 3069

2013	Existing Generation Capacity Needed (MW)	Deficiency (MW)	Total MW LCR Need
Category B (Single) ⁶	2,462	0	2,462
Category C (Multiple) ⁷	3,069	467	3,536

_

⁶ A single contingency means that the system will be able the survive the loss of a single element, however the operators will not have any means (other than load drop) in order to bring the system within a safe operating zone and get prepared for the next contingency as required by NERC transmission operations standards.

Multiple contingencies means that the system will be able the survive the loss of a single element, and the operators will have enough generation (other operating procedures) in order to bring the system within a safe operating zone and get prepared for the next contingency as required by NERC

San Diego-Imperial Valley Area Overall:

The most limiting contingency in the San Diego-Imperial Valley area is described by the outage of 500 kV Southwest Power Link (SWPL) between Imperial Valley and North Gila Substations over-lapping with an outage of the Otay Mesa Combined-Cycle Power plant (603 MW) while maintaining post-transient voltage stability. This limiting contingency establishes a local capacity need of 3,385 MW in 2013 (includes 151 MW of QF generation and 7 MW of Wind) as the minimum capacity necessary for reliable load serving capability within this area.

It is worth mentioning that Imperial Valley – Dixieland 230kV line was modeled between IID and ISO. There were no additional upgrades modeled between CFE and ISO control areas at Imperial Valley 230 kV bus in 2013 base case. The ISO acknowledges that the LCR needs for the San Diego-Imperial Valley area will decrease as additional transmission is constructed between the IID/CFE systems and Imperial Valley and more power is flowing in real-time from these control areas into the ISO control area.

Effectiveness factors:

All units within this area have the same effectiveness factor. Units outside of this area are not effective.

Changes to study results compared to SONGS being operational:

The load forecast went up by 10 MW. The total available capacity is the same. The San Diego sub-area requirements have increased significantly, by 966 MW, due to the voltage support issues that arise in the area without SONGS for outages in San Diego's system. The San Diego-Imperial Valley area requirements have increased also, by 447 MW, due to the same voltage support issues. For mitigation of new deficiencies and potential reduction in the San Diego-Imperial Valley area LCR, in the absence of SONGS, please see chapter II.

transmission operations standards.

San Diego-Imperial Valley Area Overall Requirements:

2013	QF (MW)	Wind (MW)	Market (MW)	Max. Qualifying Capacity (MW)
Available generation	151	7	3991	4149

2013	Existing Generation Capacity Needed (MW)	Deficiency (MW)	Total MW LCR Need
Category B (Single) ⁸	3,385	0	3,385
Category C (Multiple) ⁹	3,385	467 ¹⁰	3,852

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⁸ A single contingency means that the system will be able the survive the loss of a single element, however the operators will not have any means (other than load drop) in order to bring the system within a safe operating zone and get prepared for the next contingency as required by NERC transmission operations standards.

⁹ Multiple contingencies and a single element, however the loss of a single element, however the operators will not have any means (other than load drop) in order to bring the system within a safe operators and get prepared for the next contingency as required by NERC transmission operations standards.

⁹ Multiple contingencies means that the system will be able the survive the loss of a single element, and the operators will have enough generation (other operating procedures) in order to bring the system within a safe operating zone and get prepared for the next contingency as required by NERC transmission operations standards.

¹⁰ San Diego-Imperial Valley area is not "overall deficient". Resource deficiency values result from a few deficient sub-areas; and since there are no resources that can mitigate this deficiency the numbers are carried forward into the total area needs.

APPENDIX C

Order of the South Coast Air Quality Management District

September 18, 2012

Mr. Larry Kostrzewa Vice President Walnut Creek Energy, LLC 3 MacArthur Place, Suite 100 Santa Ana, CA 92707

Ms. Jenifer Morris Lee Vice President Edison Mission Huntington Beach, LLC 3 MacArthur Place, Suite 100 Santa Ana, CA 92707

Subject:

Edison Mission Huntington Beach, LLC (ID 167432)

Revised Permanent Retirement Plan for Huntington Beach Units 3 and 4

Dear Mr. Kostrzewa & Ms. Lee:

The South Coast Air Quality Management District (AQMD) has received your revised permanent retirement plan for Edison Mission Huntington Beach (EMHB) Units 3 and 4, located at 21730 Newland Street, Huntington Beach, CA 92646 (ID 167432), dated September 7, 2012. This revised retirement plan was submitted to address the comments and suggestions provided by the AQMD in our letter dated June 29, 2012. Your purpose in proposing the retirement plan is to allow the transfer of emission offsets from EMHB Units 3 and 4 to the new Walnut Creek Energy, LLC's (WCE's) Walnut Creek Energy Park (WCEP) project (ID 146536) and to comply with Condition F52.1 of the WCEP's Facility Permit. As explained in details in your revised retirement plan, you have proposed the following measures to permanently retire EMHB Units 3 and 4:

- Flange the gas supply lines in the gas yard and remove the valves
- Sever the fuel supply lines to each unit and fill with a minimum of two cubic yards of concrete
- Remove hopper sections, sever every other header supply line, and pierce headers
- Remove 12 burners and all 24 fuel nozzles from each unit
- Gouging the main steam and reheat vertical lines and pierce pipes' horizontal runs
- Remove the combustion control cards, flame scanner panels, and CEMS control panels
- Remove main boiler feedwater pump for each unit

The AQMD appreciates your submittal of the above-described revised retirement plan and has conducted a thorough review of your retirement plan to determine if your proposed measures

will be sufficient to ensure your intent that EMHB Units 3 and 4 can no longer be operated and to ensure permanent retirement of Units 3 and 4. After a detailed review of your revised retirement plan, AQMD staff has determined that this revised plan is acceptable. As a result, the revised retirement plan for EMHB Units 3 and 4 is hereby approved by AQMD subject to the following condition:

 By October 25, 2012, EMHB shall submit to AQMD a detailed schedule which provides the start and completion dates of each of the measures that are proposed in the revised retirement plan to permanently retire EMHB Units 3 and 4.

Please note that, as specified in Condition F52.1 of the WCEP's Facility Permit, the operations of all equipment covered under Permits to Construct for the WCEP project shall not be started until the AQMD has verified that all measures proposed in the revised retirement plan have been successfully implemented, the Permits to Operate for EMHB Units 3 and 4 have been surrendered, and AQMD has also received a notarized letter from EMHB, indicating that Units 3 and 4 are permanently shut down and any re-start or operation of the units will require new Permits to Construct and be subject to all requirements of nonattainment New Source Review and the Prevention of Significant Deterioration programs.

However, WCE has filed applications and proposed revisions to the Facility Permit for WCEP project to, amongst other things, allow operation of certain equipment at WCEP project before EMHB units 3 and 4 have been permanently retired and Permits to Operate have been surrendered to AQMD. The AQMD is presently evaluating this proposal and upon completion of processing of applications for the proposed revisions AQMD will determine which equipment may be allowed to operate before the full implementation of the revised retirement plan and permanent shut down of EMHB Units 3 and 4 and revise the Facility Permit for WCEP project, accordingly.

Please contact the undersigned at 909-396-2662 (mnazemil@aqmd.gov) if you have any questions regarding this letter.

Sincerely,

Mohsen Nazemi, P.E.
Deputy Executive Officer

Engineering and Compliance

MN:BLY

cc: Barry Wallerstein, AQMD Kurt Wiese, AQMD Barbara Baird, AQMD Brian Yeh, AQMD Pedro Pizarro, Edison Mission Energy Crystal Needham, Edison Mission Energy Weikko Wirta, AES Huntington Beach Stephen O'Kane, AES Gerardo Rios, USEPA Joan Walter, California Energy Commission

APPENDIX D

Tolling Agreement and Supplemental Agreement

CAPACITY SALE AND TOLLING AGREEMENT

by and among

AES ALAMITOS, L.L.C.,

AES HUNTINGTON BEACH, L.L.C.,

AES REDONDO BEACH, L.L.C.

and

WILLIAMS ENERGY SERVICES COMPANY

Dated as of May 1, 1998

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CAPACITY SALE AND TOLLING AGREEMENT

THIS CAPACITY SALE AND TOLLING AGREEMENT (together with the Schedules hereto, this "Agreement"), made and entered into this 15th day of May 1998, by and among AES Alamitos, L.L.C., a limited liability company organized and existing under the laws of the State of Delaware, AES Huntington Beach, L.L.C., a limited liability company organized and existing under the laws of the State of Delaware, and AES Redondo Beach, L.L.C., a limited liability company organized and existing under the laws of the State of Delaware (collectively, the "AES Subsidiaries"), on the one hand, and Williams Energy Services Company, a corporation organized and existing under the laws of the State of Delaware ("WESCO"), on the other (each of (a) the AES Subsidiaries and (b) WESCO are hereinafter sometimes referred to as a "Party" and sometimes collectively referred to as the "Parties").

ARTICLE I DEFINITIONS

For purposes of this Agreement, the following definitions shall apply unless the context clearly indicates otherwise. All capitalized terms used in this Agreement that are not defined in this Article I shall have the definitions contained elsewhere herein, including the Appendices hereto.

- engaged in or approved by a significant portion of the electric utility industry during the relevant time period, or any of the practices, methods and acts which, in exercise of reasonable judgment in light of the facts known at the time a decision is made, that could have been expected to accomplish a desired result at reasonable cost consistent with good business practices, reliability, safety and expedition. Accepted Electrical Practices are not intended to be limited to the optimum practices, methods or acts to the exclusion of others, but rather to those practices, methods and acts generally accepted or approved by a significant portion of the electric utility industry in the relevant region, during the relevant time period, as described in the immediately preceding sentence.
- 1.2 Additional Ancillary Services Payment means the payment to be made by WESCO to the AES Subsidiaries in respect of each Unit pursuant to Section 5.3.
 - 1.3 AES Guaranty means a guaranty in the form attached hereto as Schedule 19.2.
- 1.4 Affiliate means, with respect to any specified Person, any other Person directly or indirectly controlling or controlled by or under direct or indirect common control with such specified Person. For purposes of this definition, "control" (including, with correlative meanings, the terms "controlling," "controlled by" and "under common control with"), as used with respect to any Person, shall mean the possession, directly or indirectly, of the power to direct or cause the direction of the management or policies of such Person, whether through the ownership of voting securities, by agreement or otherwise.

- 1.5 Ancillary Services shall include automatic generating control, spinning reserve, non-spinning reserve, replacement reserve, voltage support and black starts and any and all similar or related services capable of being provided by the Facilities, to the extent commonly sold or saleable (or used or usable) in the electric power generation or transmission industry from time to time.
- 1.6 Annual Availability means, with respect to any Unit in any Contract Year, the average of the hourly Availabilities for such Unit for such Contract Year, excluding Planned Outage Hours.
- 1.7 Approvals means all approvals, permits, licenses, consents or other authorizations from, or filings with, Governmental Authorities or other third parties.
- 1.8 Availability means, with respect to any Unit in any hour and expressed as a percentage, the amount of net MW declared available in an Availability Notice delivered by the AES Subsidiaries in accordance with the terms of this Agreement, divided by such Unit's Dependable Capacity.
- 1.9 Availability Bonus means, as of each date on which a Fixed Payment is due, the greater of (i) zero and (ii) the balance in the Bonus Pool as of such date.
- 1.10 Availability Notice means a Notice stating the Availability per hour per Unit, not to exceed Dependable Capacity and not to be less than such Unit's minimum load on automatic generating control as set forth in Schedule 6, delivered to WESCO by the AES Subsidiaries and effective until delivery of a subsequent Availability Notice.
- 1.11 Availability Shortfall means, with respect to any Unit in any month and expressed as a percentage, the greater of (i) zero and (ii)(A) Guaranteed Availability minus Year-to-Date Availability, divided by (B) Guaranteed Availability.
- 1.12 Beginning Requested Dispatch Hour means the first clock hour, or portion of a clock hour, during which the Facilities are scheduled to deliver Net Electric Energy or provide Ancillary Services during a Dispatch Period.
- 1.13 Bonus Pool means the notional amount, calculated in respect of each Unit pursuant to the provisions of Section 4.4 hereof, from which the Availability Bonus is derived.
- 1.14 Btu means the quantity of heat required to raise the temperature of one pound of pure water from 59°F. to 60°F, at a constant pressure of 14.73 psia.
- 1.15 Business Day means any day on which Federal Reserve member banks in New York, New York are open for business; and a Business Day shall commence at 8:00 a.m. and close at 5:00 p.m., local time, at the location of each Party's principal place of business, or at such other location as the context may require.

- 1.16 California Power Exchange or PX means the non-profit public benefit corporation responsible for conducting a competitive auction for electric power in California, as described in Article 4 of Chapter 2.3 of Part 1 of Division 1 of the California Public Utilities Code, or any successor to the functions thereof.
- 1.17 Capacity or capacity means the MW output level that a generating unit is capable of continuously producing.
- 1.18 Cash Flow Available for Debt Service means for any period, calculated on a cash basis, all Project Revenues received or projected to be received, as the case may be, by the AES Subsidiaries during the relevant period, minus all Operation and Maintenance Costs paid or projected to be paid during such period.
- 1.19 Cold Start means the Start-up of a Unit after its breaker(s) has been open for at least the number of hours defining a Cold Start for such Unit, as set forth in Schedule 5.4.
- 1.20 Consumer Price Index means Consumer Price Index for all Urban Consumers (CPI-U): Selected areas, all items index, under the category West Urban, Size A, as compiled by the U.S. Department of Labor, Bureau of Labor Statistics.
- 1.21 Contract Anniversary Date means the last day of the twelfth full calendar month beginning on or after the Effective Date, and each anniversary thereof.
- 1.22 Contract Year means each period of twelve months ending on a Contract Anniversary Date, except that the first Contract Year shall also include any portion of the month between the Effective Date and the end of the month in which the Effective Date occurs.
- 1.23 Credit Agreement means any credit agreement and all related collateral security documentation, if any, whether entered into simultaneously with the Sale or thereafter, relating to (a) any indebtedness of the AES Subsidiaries or (b) any indebtedness of any Affiliate of the AES Subsidiaries secured by the assets of the AES Subsidiaries or by which the assets of the AES Subsidiaries may be encumbered, in either case the proceeds of which, directly or indirectly, are used to finance the acquisition of the Facilities.
- 1.24 Day or day means a period of twenty-four (24) consecutive hours, beginning at 12:01 a.m., local time, at the Delivery Point; provided, however, that on the Day on which Pacific Daylight Time becomes effective, the period shall be twenty-three (23) consecutive hours, and on the Day on which Pacific Standard Time becomes effective, the period shall be twenty-five (25) consecutive hours; provided, however, if FERC or the ISO should modify the beginning time for a day, the beginning and ending time for a Day under this Agreement shall be revised to correspond to the time established by FERC or the ISO, as the case may be
- 1.25 Debit Factor means for each Unit in each Contract Year, the number, not to exceed 1.0, equivalent to:

 $(GA + 5\%) \times 0.05$

100% - (GA + 5%)

where "GA" is such Unit's Guaranteed Availability for such Contract Year.

- 1.26 Debt Service means for any period, the sum that must be paid for such period pursuant to the applicable financing documents for (a) principal payments on the loans made pursuant to such financing documents, (b) interest payments on such loans (net of payments under any interest rate protection agreements), (c) withholding taxes and breakage costs and (d) fees required to be paid to the lenders pursuant to such financing documents.
- 1.27 Debt Service Coverage Ratio means for any period, the ratio of (a) Cash Flow Available for Debt Service to (b) Debt Service.
- 1.28 Delivery Point means each of the physical point(s) set forth on Schedule B, as the same may be amended or supplemented from time to time, at which Net Electric Energy, Ancillary Services, Gas or fuel oil is, or is deemed to be, delivered or provided and measured, as required by the context.
- 1.29 Dependable Capacity means, in respect of each Unit, the total net MW generating capability of such Unit, initially as set forth in Schedule 4.1 and thereafter as adjusted in accordance with the provisions of Article IV.
- 1.30 Designated Months means the months (or portions thereof) of January, February, June, July, August, September and December or such months of a year (or portions thereof), not to exceed seven in aggregate, specified by WESCO pursuant to Section 9.10(a).
- 1.31 Dispatch means the dispatch of Net Electric Energy or Ancillary Services from the Unit or Units.
- 1.32 Dispatch Notice means a Notice delivered to the AES Subsidiaries by or on behalf of WESCO directing the Dispatch of a Unit or Units in the form set forth as part of Schedule 8.2 and effective until the delivery of a subsequent Dispatch Notice. A Dispatch Notice shall specify if it is being delivered pursuant to a directive of the ISO.
- 1.33 Dispatch Period means a period of time during which WESCO has requested delivery of Net Electric Energy or the provision of Ancillary Services starting with a Beginning Requested Dispatch Hour and concluding with an Ending Requested Dispatch Hour. A Dispatch Period may continue for more than one calendar day.
 - 1.34 Dollars or \$ means United States dollars.
 - 1.35 Edison means Southern California Edison Company.
- 1.36 Effective Date means the date on which all conditions to the obligations of the AES Subsidiaries and WESCO specified in Article XXII are satisfied or waived.

- 1.37 Electric Metering Equipment means electric meters and associated equipment including, without limitation, metering transformers and meters for measuring kilowatt-hours and reactive volt-ampere hours, including check meters, if any, utilized in determining the amount of Net Electric Energy or Ancillary Services delivered or provided by the AES Subsidiaries at the Delivery Point, but shall not include any check meters that WESCO may install, own and maintain.
- 1.38 Ending Requested Dispatch Hour means the last clock hour, or portion of a clock hour, during which the Facilities are scheduled to deliver Net Electric Energy or provide Ancillary Services during a Dispatch Period.
 - 1.39 Existing Indebtedness has the meaning specified in Section 13.1(m).
- 1.40 Facilities means the electric generating facilities described on Schedule A hereto and includes all associated Interconnection Facilities and Protective Apparatus.
- 1.41 FERC means the Federal Energy Regulatory Commission or any successor agency thereto.
- 1.42 Fixed Payment means the payment to be made by WESCO to the AES. Subsidiaries in respect of each Unit pursuant to Section 5.1.
- 1.43 Forced Derating means the reduction of any Unit's load due to an unplanned component failure or other condition that requires the load on the Unit be reduced before 22:00 PPT on the first Friday at least seven (7) Days after the Day on which such failure or condition occurs.
- 1.44 Forced Outage means the removal of any Unit from service for emergency reasons or due to an unplanned component failure or other condition requiring removal before 22:00 PPT on the first Friday at least seven (7) Days after the Day on which such failure or condition occurs.
- 1.45 Fuel Conversion Services means operation of the Facilities by the AES Subsidiaries to combust gas and/or fuel oil in order to generate and deliver at the Delivery Point Net Electric Energy or to provide at the Delivery Point Ancillary Services.
- 1.46 Gas or gas means merchantable natural gas that meets or exceeds the specifications set forth in Section 8.4(b) hereof.
- 1.47 Gas Metering Equipment means gas meters and associated equipment, including check meters, if any, utilized in determining the amount of Gas consumed by the Facilities, but shall not include any check meters that WESCO may install, own and maintain.
- 1.48 Governmental Authority means any federal, state, local or municipal governmental body; any governmental, regulatory or administrative agency, commission, body or

other authority exercising or entitled to exercise any administrative, executive, judicial, legislative, policy, regulatory or taxing authority or power; or any court or governmental tribunal.

- 1.49 Guaranteed Availability means in respect of each Unit in each month or Contract Year, the minimum Availability of such Unit, expressed as a percentage and set forth in respect of such Unit in Schedule 4.2 hereto.
- 1.50 Guarantor means The AES Corporation or Williams Holdings of Delaware, Inc., as required by the context.
- 1.51 Heat Rate means, in respect of each Unit the amount of energy expressed in Btu's per net kWh (HHV) determined in respect of such Unit from the Heat Rate curve for such Unit in Schedule 6 hereto.
- 1.52 Holiday means each of New Year's Day, Memorial Day, Independence Day, Labor Day, Thanksgiving Day and Christmas Day, as designated from time to time by the North American Electric Reliability Council, or any other day that may be from time to time designated by the North American Electric Reliability Council as a holiday.
- 1.53 Hot Start means the Start-up of a Unit after its breaker(s) has been open for no more than the number of hours defining a Hot Start for such Unit, as set forth in Schedule 5.4.
- 1.54 Hourly Gas Price means, in respect of each hour of a Day, the price per MMBtu of Gas calculated pursuant to the following formula:

Hourly Gas Price = $[(A+B+C)/3] \times 1.013 + D + E + (FxGxH) + I$

Where:

- A: the midpoint of the price range published for Gas to flow on such Day as Gas Daily's California Border (Topock/Daggett-SW gas to end-users) daily Gas price.
- B: the price published for Gas to flow on such Day as Btu's Daily North American Spot Natgas Southern California Border Topock daily gas price.
- C: the price published for Gas to flow on such Day as NGI's Daily Gas Price Index's Southern California Border (avg) daily gas price.
- D: Applicable Firm Intrastate Transmission Service Charge as set forth in SoCal Gas Tariff Schedule No. GT-F.
- E: Interstate Transition Cost Surcharge as set forth in SoCal Gas Tariff Schedule No. GT-F.

- F: SoCal Gas Monthly Weighted Average Cost of Gas as set forth in SoCal Gas Tariff Schedule G-CS.
- G: Imputed Franchise Fee Factor as set forth in SoCalGas Tariff Schedule No. G-MSUR.
- H: Surcharge Percentage, Outside the City of Los Angeles as set forth in SoCal Gas Tariff Schedule No. G-MSUR.
- I: State Regulatory Fee as set forth in SoCal Gas Tariff Schedule No. G-SRF.

If, for any reason, any of the above Gas price indices ceases to be published or is substantially changed so that the formula does not adequately reflect the delivered market price in the geographic region in which the relevant Delivery Points are located, then either Party may provide the other with Notice to such effect and the Parties shall determine an alternative index or indices or alternative method or methods for determining the Hourly Gas Price. The substitute index or indices shall be recognized in the industry as a measure of daily prices for Gas to flow in the geographical region in which the relevant Delivery Points are located. Until a substitute index is agreed upon or determined pursuant to arbitration in accordance with Article XII, the Hourly Gas Price shall be computed as described above. Following agreement, or arbitration, the Hourly Gas Price shall be adjusted retroactively to the date agreed upon by the Parties, or in the event of arbitration, the date on which arbitration was invoked by written notice, to reflect the substitute index. Changes in SoCal Gas tariff rates or charges (nondiscounted basis) applicable to the intrastate transmission to the Facilities of gas used to generate electricity shall be reflected in the Hourly Gas Price.

- 1.55 Imbalance Charges shall mean any scheduling penalties, imbalance penalties, overpull or unauthorized overrun penalties, operational flow order penalties, cash out charges, banking charges or similar penalties, fees or charges assessed by a Transporter for failure to satisfy the Transporter's balance and/or nomination requirements.
- equipment, devices and apparatus directly or indirectly required and installed to interconnect and deliver Net Electric Energy or provide Ancillary Services from the Facilities to the Delivery Point including, but not limited to, electric transmission and/or distribution lines, transformation, switching, Electric Metering Equipment, any other metering equipment, communications, and safety equipment, including, but not limited to, equipment required to protect (i) the electrical system to which the Facilities are connected and its customers from faults occurring at the Facilities, and (ii) the Facilities from faults occurring on the electrical system to which the Facilities are connected or on other electrical systems to which such electrical system is directly or indirectly connected.
- 1.57 Interest Rate means for any calendar month, the highest "Prime Rate" as published in The Wall Street Journal under the heading "Money Rates" on the first day in such month on which such information is published.

- 1.58 ISO means California Independent System Operator Corporation or any successor to the functions thereof.
 - 1.59 kW means kilowatt.
 - 1.60 kWh means kilowatt-hour.
- 1.61 Lender means any Person which provides debt or equity capital, loans, credit or credit support, acts as counterparty on any interest rate or currency hedging arrangements, or provides other financing, to the AES Subsidiaries in respect of the acquisition, of the Facilities; such term also includes any such Person which acts in the capacity of Lender in connection with any refinancing by the AES Subsidiaries of such financing.
- 1.62 Lien means any lien, charge, claim, pledge, security interest or encumbrance of any nature whatsoever.
- 1.63 Maintenance Derating means the reduction of any Unit's load due to removal of a component for scheduled repairs that can be deferred until 22:00 PPT on the first Friday at least seven (7) Days later, but requires a reduction of such Unit's load prior to the next Planned Outage.
- 1.64 Maintenance Outage means the removal of a Unit from service to perform work on specific components that can be deferred until 22:00 PPT on the first Friday at least seven (7) Days later, but which requires that the Unit be removed from service before the next Planned Outage.
- 1.65 Major Maintenance Cycle means, in respect of each Unit, the period of time specified therefor in Schedule 4.2.
- 1.66 Market Transactions, if a Unit is the subject of a MRA, has the meaning ascribed thereto in the MRAs, and otherwise means all transactions in Net Electric Energy, Dependable Capacity or Ancillary Services associated with such Unit.
 - 1.67 MMBtu means one million Btu's
- 1.68 Mobil Contract means that certain Refinery Gas Sale and Purchase Agreement dated as of August 7, 1980, between Edison and Mobil.
 - 1.69 Mobil means Mobil Oil Corporation.
- 1.70 Month or month means the period beginning at 12:01 a.m., local time, on the first Day of each calendar month and ending at the same hour on the first Day of the next succeeding calendar month.

- 1.71 Monthly Availability means, with respect to any Unit in any month, the average of the hourly Availabilities for such Unit for such month, excluding Planned Outage Hours.
- 1.72 MRA means the Master Must Run Agreements applicable to a Unit or Units, including the applicable appendices thereto, any amendments thereof and any successor agreements between the parties thereto relating to the Facilities.
- 1.73 MRA B means (i) the terms of agreement attached to an MRA as Appendix B thereto or (ii) any other MRA requiring the refund of revenues from Market Transactions to the ISO or another Governmental Authority.
 - 1.74 MW means megawatt.
 - 1.75 MWh means megawatt-hour.
- 1.76 Net Electric Energy means the amount of electric energy measured in kWh, generated by each Facility (or by an individual Unit, if the context so requires), and delivered to WESCO at the Delivery Point.
 - 1.77 New Indebtedness has the meaning specified in Section 13.1(m).
- 1.78 New Taxes means (i) any Taxes or modifications therein enacted and effective after the Effective Date, including, without limitation, that portion of any Taxes or New Taxes that constitutes an increase in the rate thereof (but excluding an increase in the value of the base upon or from which computed), or (ii) any law, order, rule or regulation, or interpretation thereof, enacted and effective after the Effective Date resulting in application of any Taxes to a new or different class of Persons.
- 1.79 Non-Availability Discount means, as of the end of each month, if a Unit's Year-to-Date Availability shall be less than its Guaranteed Availability, the amount computed in accordance with the following formula:

where: "GA" is Guaranteed Availability; "YTDA" is Year-to-Date Availability; "FP" is the Fixed Payment for such Unit (\$\forall k\text{Wyr.}); "M" is the number of months elapsed in the then-current Contract Year; "DC" is Unit Dependable Capacity; and the Shortfall Factor applicable to the amount of Availability Shortfall is determined from Schedule 4.3. The term "Availability Shortfall" refers to (i) GA minus YTDA, divided by (ii) GA.

1.80 Nonmarket Transactions has the meaning ascribed thereto in the MRAs.

- 1.81 Notice means a communication from one Party to the other Party conforming to the requirements of Article XXI.
 - 1.82 Off-Peak Times means each hour not during Peak Times.
- 1.83 Oil Metering Equipment means all meters and associated equipment, including check meters, if any, utilized in determining the amount of fuel oil utilized by the Facilities.
- Operation and Maintenance Costs means, for any period, all actual costs and 1.84 expenses that are incurred and paid for by the AES Subsidiaries, including, but not limited to (i) payments due under any of the Project Documents, (ii) costs of salaries and employee compensation costs, (iii) costs for materials, fuel, supplies, inventories, consumables, utility services and emission credits, (iv) premiums for insurance, (v) Taxes, (vi) costs of settlement of pending or threatened claims or any related fines, judgments or other costs (including legal fees) associated with such claims, (vii) maintenance, operation and repair costs, (viii) capital expenditures, including all costs of major inspections, unscheduled or scheduled major maintenance of the Facilities and all work on account of extraordinary equipment failures and contingencies (including overhaul costs (other than overhaul costs paid from deposits to any major maintenance reserve account)), in each case to the extent such costs are not paid for by proceeds from insurance, (ix) payments under operating leases, (x) legal, accounting and other professional fees, (xi) costs and fees incurred to obtain and maintain all Approvals and (xii) amounts deposited in any major maintenance reserve account. Operation and Maintenance Costs do not include Debt Service, payments with respect to subordinated loans or non-cash charges, including depreciation or non-cast obsolescence charges or reserves therefor, amortization of intangibles or other similar bookkeeping entries.
- 1.85 Peak Times means each hour between 6 a.m. Prevailing Pacific Time and 10 p.m. Prevailing Pacific Time on any day during Designated Months other than a Sunday or a Holiday.
- 1.86 Person means any individual, Governmental Authority, corporation, limited liability company, partnership, limited partnership, trust, association or other entity.
- 1.87 Permitted Lien means any Lien (i) for current taxes not delinquent, (ii) for an immaterial amount or in connection with any immaterial matter, in either case arising in the ordinary course of business and which, together with all other Liens described in this clause (ii), does not materially affect or interfere with the present or intended value or use of the affected property or (iii) securing the loans extended to the AES Subsidiaries on the Effective Date or any permitted refinancings thereof.
- 1.88 Planned Outage means the removal of a Unit from service to perform work on specific components that is scheduled in advance and has a predetermined start date and duration (e.g., annual overhaul, inspections, testing).
- 1.89 Planned Outage Schedule means the schedule deliverable by the AES Subsidiaries to WESCO pursuant to Section 9.10(c).

- 1.90 Planned Outage Hours means, in respect of each Unit in each Contract Year, the number of hours during which such Unit is unavailable due to Planned Outage or, to the extent the AES Subsidiaries shall elect, due to Maintenance Outage beginning and ending within a time period consisting only of consecutive Off-Peak Times, not to exceed 3600 hours during any Major Maintenance Cycle.
 - 1.91 Prevailing Pacific Time or PPT means local time in Los Angeles, California.
- 1.92 Project Documents means all agreements and documents to which any AES Subsidiary is a party relating to the ownership, operation or maintenance of any of the Facilities.
- 1.93 Project Revenues means, for any period, the sum of all amounts received by the AES Subsidiaries pursuant to or in connection with (a) the Project Documents or (b) the ownership, use or operation of the Facilities, including any interest income, but not including amounts received from insurance proceeds (other than proceeds from business interruption insurance which shall constitute Project Revenues), condemnation proceeds or indemnities.
- 1.94 Protective Apparatus means such equipment and apparatus, including, but not limited to, protective relays, circuit breakers and the like, necessary or appropriate to isolate the Facilities from the electrical system to which they are connected consistent with Accepted Electrical Practices.
- 1.95 Shutdown means an actual shutdown of a Unit pursuant to a directive of the ISO or of WESCO or pursuant to a Dispatch Notice following the Ending Requested Dispatch Hour of a Dispatch Period.
 - 1.96 SoCal Gas means Southern California Gas Company.
- 1.97 Spinning Reserve means unloaded generation, which is synchronized and ready to serve additional demand. It consists of Regulating Reserve and Contingency Reserve.
 - Regulating Reserve an amount of Spinning Reserve responsive to automatic generation control, which is sufficient to provide normal regulating margin.
 - Contingency Reserve an additional amount of operating reserve sufficient to reduce any difference between actual and scheduled interchange (taking into account the effects of frequency bias) to zero in ten minutes following loss of generating capacity which would result from the most severe single contingency (as from time to time defined by the North American Electric Reliability Council and as determined by its regional designee).
- 1.98 Spread means, in respect of each Unit (i) during each hour such Unit shall be operating, the amount, expressed in \$\frac{5}{MWh}\$, obtained by subtracting from the value of the Net Electric Energy produced by such Unit during such hour and delivered to the Delivery Point (such value to be determined by reference to the unconstrained PX energy price (or, as long as then

published on a daily basis, the most applicable PX energy price), expressed in \$/MWh, for such hour in the day-ahead market) the sum of (a) the Variable Payment for such Unit for such hour, (b) the cost of Gas consumed by such Unit in such hour (such cost to be determined based on the Hourly Gas Price for such hour and the Heat Rate of such Unit at its Dependable Capacity) and (c) an amount representing the pro-rated cost of effecting the most recent Start-up of such Unit prior to such hour, such proration of Start-up cost to be over the total number of hours such Unit shall actually operate between the most recent Start-up and the next occurring Shutdown thereof, and (ii) during each hour such Unit shall not be operating, the amount, expressed in \$/MWh. obtained by subtracting from the value of the Net Electric Energy that such Unit would have produced during such hour for delivery at the Delivery Point had such Unit been Dispatched at the Capacity level specified in the Availability Notice applicable to such hour (such value to be determined by reference to the unconstrained PX energy price (or, as long as then published on a daily basis, the most applicable PX energy price), expressed in \$/MWh, for the Unit's applicable congestion zone for such hour in the day-ahead market) the sum of (A) the Variable Payment that would have been payable for such Unit for such hour, (B) the cost of Gas that would have been consumed by such Unit in such hour (such cost to be determined based on the Hourly Gas Price for such hour and the Heat Rate of such Unit at its Dependable Capacity) and (C) an amount representing the pro-rated cost of effecting a Start-up of such Unit, such proration of Start-up cost to be over the total number of hours such Unit would have operated if it had been Dispatched during each consecutive hour of the period of which such hour is a part in which the Spread was greater than zero.

- 1.99 Start-up means the action of bringing a Unit from Shutdown to synchronization at its minimum load and the unconditional release of such Unit for ramping to the requested scheduled Dispatched Capacity level.
 - 1.100 Start-up Gas has the meaning specified in Section 5.4(b).
- 1.101 Start-up Notification Lead Time means the time period required by the AES Subsidiaries to permit startup of the Facilities as scheduled for a Dispatch Period under normal equipment conditions. Such period of time will initially be set as set forth on Schedule 8.2 and revised by mutual agreement of the Parties from time to time to reflect actual operating experience.
- 1.102 Start-up Payment means a payment to the AES Subsidiaries pursuant to Section 5.4 in respect of each Cold Start, Warm Start or Hot Start of each Unit.
- 1.103 Taxes means any or all federal, state and/or local, municipal, ad valorem, property, occupation, severance, generation, first use, conversion, Btu or power, transmission, utility, gross receipts, privilege, sales, use, consumption, excise, lease, transaction, and other taxes, governmental charges, license fees, permit fees, assessments, or increases in or interest on or penalties relating to any of the foregoing, other than taxes based on net income or net worth.
- 1.104 Term means the term of this Agreement commencing on the Effective Date and continuing for a period of fifteen (15) Contract Years thereafter; provided, however, that either Party may by Notice to the other Party at least ninety (90) but not more than one hundred

- twenty (120) Days before the end of the fifteenth (15th) Contract Year elect to extend the term of this Agreement for an additional five (5) Contract Years, which if elected shall be considered for all purposes hereof a part of the Term.
- 1.105 Transmission Provider means any Person providing transmission services for Net Electric Energy from after the Delivery Point thereof.
- 1.106 Transporter means any pipeline on which any Gas is transported under this Agreement to the applicable Delivery Point.
- affected, including but not restricted to failure of or threat of failure of facilities, flood, drought, earthquake, storm, lightning, fire, epidemic, war, riot, civil disturbance or disobedience, labor dispute, labor or material shortage, sabotage, restraint by court order or public authority and action or nonaction by or failure to obtain the necessary authorizations or approvals from any governmental agency or authority which by exercise of due diligence such Party could not reasonably have been expected to avoid, and which, by the exercise of due diligence, it has been unable to overcome.
- 1.108 Unit means each of the fourteen (14) generating units comprising part of the Facilities and described on Schedule A hereto.
- 1.109 Variable Payment means, in respect of Net Electric Energy, a payment from WESCO to the AES Subsidiaries pursuant to Section 5.2 equivalent to (a) in the case of Net Electric Energy Dispatched and delivered in Market Transactions, \$2.00 per MWh delivered during the relevant month, increasing in the second and subsequent Contract Years by the lesser of (i) 2-1/2% per year and (ii) the percentage increase in the Consumer Price Index during the immediately preceding year, (b) in the case of Net Electric Energy Dispatched and delivered in Nonmarket Transactions, the Variable Cost Payment (as defined in the MRAs) payable by the ISO pursuant to the provisions of the applicable MRAs less the portion of such Variable Cost Payment attributable to (i) hourly operating fuel costs (as such term is used in the MRAs), except to the extent representing compensation for fuel oil consumed, and (ii) scheduling coordinator administration charges (as such term is used in the MRAs).
- 1.110 Warm Start means the Start-up of a Unit after its breaker(s) has been open for the number of hours defining a Warm Start for such Unit, as set forth in Schedule 5.4.
- 1.111 Williams Holdings Guaranty means a guaranty in the form attached hereto as Schedule 19.1.
- 1.112 Year-to-Date Availability means, with respect to any Unit and as of the end of any Month, the average of the hourly Availabilities for such Unit from and including the first hour in the Contract Year in which such Month occurs to and including the last hour of such Month, excluding Planned Outage Hours.

ARTICLE II PURCHASE AND SALE OF CAPACITY AND SERVICES

- 2.1 Capacity. Subject to the terms and conditions herein, during the Term the AES Subsidiaries shall sell and make available to WESCO on an exclusive basis, and WESCO shall purchase and pay for, the Dependable Capacity.
- 2.2 Services. Subject to the terms and conditions herein, during the Term the AES Subsidiaries shall perform for WESCO, on an exclusive basis, and WESCO shall purchase and pay for, Fuel Conversion Services.
- 2.3 Exclusive Nature of Agreement. The relationship between WESCO and the AES Subsidiaries with respect to the Facilities, their Capacity and the Fuel Conversion Services is exclusive. The AES Subsidiaries shall not offer, sell or make available any Unit's Capacity, perform Fuel Conversion Services or, except pursuant to Section 8.3, dispatch any Unit to or for any Person other than WESCO or its successors or permitted assigns; provided, however, that the use of Capacity and associated electric energy by the AES Subsidiaries for the station power needs of the Facilities is permitted. The AES Subsidiaries shall have no obligation to (i) sell or make available to WESCO any Capacity of any Unit in excess of such Unit's Dependable Capacity or (ii) sell, make available or provide to or for WESCO any Fuel Conversion Services or electric energy associated with any Capacity of any Unit in excess of such Unit's Dependable Capacity.

ARTICLE III TERM

3.1 Term. The Term of this Agreement shall commence on the Effective Date and continue for a period of fifteen (15) Contract Years; provided, however, that either Party may by Notice to the other Party at least ninety (90) but not more than one hundred twenty (120) Days before the end of the fifteenth (15th) Contract Year elect to extend the term of this Agreement for an additional five (5) Contract Years, which if elected shall be considered for all purposes hereof a part of the Term. This Agreement shall terminate automatically at the end of the Term and neither WESCO nor the AES Subsidiaries shall have any further liability or obligation to the other hereunder, except for obligations or duties that accrued prior to such termination.

ARTICLE IV DEPENDABLE CAPACITY; AVAILABILITY

4.1 Unit Dependable Capacity. The Dependable Capacity of each Unit for the first Contract Year is set forth on Schedule 4.1 hereto. For each subsequent Contract Year, the Dependable Capacity of each Unit shall be fixed in a Notice by the AES Subsidiaries to WESCO given not later than 90 days prior to the end of the immediately preceding Contract Year; provided, however, that the Dependable Capacity of each Unit fixed in any such Notice shall not be more than 105% nor less than 95% of the Dependable Capacity of such Unit set forth on Schedule 4.1 hereto. In the event that the Notice provided for in the preceding sentence should

fail to be so given for any Unit in respect of any Contract Year, the Dependable Capacity of such Unit for such Contract Year shall equal such Unit's Dependable Capacity in the immediately preceding Contract Year.

- 4.2 Guaranteed Availability. Schedule 4.2 sets forth in respect of each Unit the length of its Major Maintenance Cycle, the maximum number of Planned Outage Hours per Major Maintenance Cycle and its Guaranteed Availability. The Annual Availability and the Year-to-Date Availability of each Unit in each Contract Year shall not be less than its Guaranteed Availability. The Dependable Capacity of each Unit will be deemed to have been declared Available on an hourly basis to the extent set forth in the most recent Availability Notice delivered to WESCO by the AES Subsidiaries.
- Availability of any Unit shall have been, in any Month, less than its Guaranteed Availability, the Fixed Payment payable by WESCO in respect of such Unit and such Month and all subsequent Months in such Contract Year shall be subject to adjustment, upwards or downwards, so that the aggregate Fixed Payments made to date in such Contract Year in respect of such Unit reflect the Non-Availability Discount, as calculated in respect of such Month. If the adjustment of the Fixed Payment in respect of any Unit and any Month is downward and exceeds the Fixed Payment in respect of such Unit for such Month, WESCO shall be entitled to adjust the Fixed Payment in respect of any other Unit downward by the amount of any such excess.
- 4.4 Availability Bonus. (a) On the date each Fixed Payment is due, WESCO shall pay the Availability Bonus, if any, to the AES Subsidiaries. The balance in the Bonus Pool shall be set at zero on June 1, 1998 and shall be increased or decreased from time to time thereafter as provided in subsections (b), (c), (d) and (e) below.
- (b) Except as otherwise provided in subsection (c) below, for each hour (or part thereof) during Peak Times in which a Unit is actually capable of producing Net Electric Energy at a Capacity level at least equal to 100% (or more) of its Dependable Capacity and the Spread for such Unit for such hour (or part thereof) is positive, the Bonus Pool shall be credited an amount equivalent to 5% of the product of (i) the Spread for such Unit for such hour (or part thereof) and (ii) the Dependable Capacity of such Unit.
- (c) In respect of each Unit subject to the conditions of MRA B, for each hour (or part thereof) during Peak Times in which such Unit is actually capable of producing Net Electric Energy at a Capacity level at least equal to 100% (or more) of its Dependable Capacity and the Spread for such Unit for such hour (or part thereof) is positive, the Bonus Pool shall be credited an amount equivalent to 1% of the product of (i) the Spread for such Unit for such hour (or part thereof) and (ii) the Dependable Capacity of such Unit; provided, however, that during periods when revenues from Market Transactions are not required to be refunded to the ISO, the provisions of this subsection (c) shall not apply, and the provisions of subsections (b) and (d) shall apply.
- (d) For each hour (or part thereof) during Peak Times in which a Unit has not been declared available by the AES Subsidiaries by the delivery of an Availability Notice pursuant to

- Section 8.1, if the Spread for such Unit for such hour (or part thereof) is positive, the Bonus Pool shall be debited an amount equivalent to the Debit Factor multiplied by (i) the Spread for such Unit for such hour (or part thereof) and (ii) the Dependable Capacity of such Unit that was declared available in such Availability Notice.
- (e) Each time the Availability Bonus is paid, the amount of the Bonus Pool shall be reduced by the amount paid.
- 4.5 Reductions. The AES Subsidiaries will not permit the Dependable Capacity of the Facilities to be reduced except (i) with the consent of WESCO, which may be withheld in WESCO's sole and absolute discretion if such reduction would have an adverse effect on the economic benefit to be derived by WESCO from the Facilities or on the ISO's designation of the Facilities as must-run, or (ii) as permitted pursuant to Section 4.1.

ARTICLE V PRICING

- 5.1 Fixed Payment. For each Contract Year, WESCO shall pay the AES Subsidiaries the Fixed Payments in respect of each Unit set forth on Schedule 5.1 hereto. WESCO shall pay the Fixed Payments monthly in arrears.
- 5.2 <u>Variable Payment</u>. For each calendar month during each Contract Year, in respect of each Unit, WESCO shall pay the AES Subsidiaries the applicable Variable Payment, as adjusted pursuant to the terms hereof. WESCO shall pay the Variable Payment monthly in arrears.
- Additional Ancillary Services Payment. The Parties understand and agree that 5.3 the cost of Ancillary Services is included in and compensated for by the Fixed Payment described in Section 5.1 and the Variable Payment described in Section 5.2. To the extent, however, that the AES Subsidiaries, in providing any additional Ancillary Services requested by WESCO in any calendar month incur incremental costs of operating the Facilities otherwise than pursuant to regular dispatch operations in providing the requested Ancillary Services (i.e., costs not otherwise defrayed or compensated for by the Fixed Payment described in Section 5.1 or the Variable Payment described in Section 5.2), WESCO shall make an additional payment in respect of such Ancillary Services (the "Additional Ancillary Services Payment") provided such Additional Ancillary Services Payment is reasonable (i.e., based on reasonably estimated incremental costs of operating the Unit or Units otherwise than pursuant to regular Dispatch operations) and the AES Subsidiaries shall have advised WESCO of such price by Notice given prior to the time such costs are incurred in accordance with Schedule 8.2. Regular dispatch operation includes, but is not limited to, operation with automatic generating control. WESCO shall pay the Additional Ancillary Services Payment monthly in arrears.
- 5.4 <u>Start-up Payment</u>. (a) In respect of each Cold Start, Warm Start and Hot Start of each Unit (including for purposes of this Section 5.4(a) any uncompleted Start-up canceled by WESCO more than two (2) hours after the time of first firing of the boiler or the

combustion turbine, as the case may be, but excluding any uncompleted Start-up otherwise canceled) required by a Dispatch Notice delivered by WESCO to the AES Subsidiaries following a Shutdown of such Unit, WESCO shall pay the applicable Start-up Payment set forth in Schedule 5.4 hereto. No Start-up Payment shall be made in respect of any Cold Start, Warm Start or Hot Start not following a Shutdown.

- (b) WESCO shall make the payments pursuant to this Section 5.4 monthly in arrears.
- Prior to June 1, 1998. Notwithstanding any provision of this Agreement to the contrary, for all Dependable Capacity, Net Electric Energy and Ancillary Services made available by the AES Subsidiaries to WESCO during the period from the Effective Date to, but not including, June 1, 1998, WESCO shall pay the AES Subsidiaries an amount equal to the actual revenues received by WESCO from sales of such Capacity, Net Electric Energy and Ancillary Services, minus the cost of Gas consumed during the period prior to June 1, 1998, determined by reference to the Hourly Gas Price and the actual quantities of Gas consumed in each hour in such period. During the period prior to June 1, 1998, the AES Subsidiaries shall be entitled to have a representative present in WESCO's dispatch center, adjacent to its trading floor, to participate in and approve daily dispatch decisions and decisions with respect to sales of Capacity, Net Electric Energy and Ancillary Services, as the case may be, in the day-ahead market.
- 5.6 All Payments Subject to Set-off. All Fixed Payments, Variable Payments, Additional Ancillary Services Payments and Start-up Payments shall be, notwithstanding any provision of this Agreement to the contrary, subject to WESCO's rights of set-off provided for in Section 18.2(d).

ARTICLE VI HEAT RATE

6.1 Heat Rate Curves. Schedule 6 sets forth the Heat Rate curve for each of the Units. In the event that in any hour after the completion of the Start-Up and prior to the Shutdown of any Unit, such Unit's actual operating performance, expressed in actual Btu's of Gas consumed per kWh of Net Electric Energy, shall be at a heat rate greater than the Heat Rate set forth in respect of such Unit in Schedule 6 hereto, the AES Subsidiaries shall pay WESCO an amount equivalent to the product of the quantity of Gas (expressed in MMBtu's) consumed in such hour as a result of operation at a level in excess of the Heat Rate and the Hourly Price of Gas at the beginning of such hour. In the event that in any hour any Unit's actual operating performance, expressed in actual MMBtu's of Gas consumed per kWh of Net Electric Energy, shall be at a heat rate lower than the Heat Rate set forth in respect of such Unit in Schedule 6 hereto, WESCO shall pay the AES Subsidiaries an amount equivalent to the product of the quantity of Gas (expressed in MMBtu's) not consumed in such hour as a result of operation at a level below the Heat Rate and the Hourly Price of Gas at the beginning of such hour. All payments pursuant to this Article VI shall be paid monthly in arrears, subject to the rights of set off provided for in Section 18.2(d).

- 6.2 Gas and Electric Energy. (a) To the extent that the AES Subsidiaries shall declare any Unit in any Availability Notice to be available at less than its Dependable Capacity, if WESCO shall request Dispatch of such Unit at the maximum Capacity level set forth in such Availability Notice, then the applicable Heat Rate for the Dispatch Period shall be such Unit's Heat Rate at its Dependable Capacity. To the extent WESCO shall Dispatch such Unit at a Capacity level lower than the maximum set forth in an Availability Notice, the Heat Rate for such Dispatch Periods shall be the Heat Rate applicable to the actual Capacity level at which such Unit is Dispatched by WESCO.
- (b) WESCO shall provide, pursuant to Section 8.4, to the AES Subsidiaries the quantity of Gas actually consumed during the hours necessary to complete a Cold Start, Warm Start or Hot Start, as the case may be, of any Unit, not to exceed the maximum number of hours specified for a Cold Start, Warm Start or Hot Start of such Unit in Schedule 5.4. WESCO shall pay for or reimburse the AES Subsidiaries for the cost of the quantity of electric energy actually consumed during the hours necessary to complete a Cold Start, Warm Start or Hot Start, as the case may be, of any Unit, not to exceed the maximum number of hours specified for a Cold Start, Warm Start or Hot Start of such Unit in Schedule 5.4, such cost to be determined as the product of the (i) quantify of electric energy (expressed in kWh) consumed multiplied by (ii) the PX price for electric energy (expressed in kWh) in each hour of such Cold Start, Warm Start or Hot Start.
- (c) In the event that the quantity of Gas consumed to complete a Cold Start, Warm Start or Hot Start, as the case may be, of any Unit ("Start-up Gas") exceeds the amount of Gas specified in respect of such Unit for a Cold Start in Schedule 5.4 hereto, the AES Subsidiaries shall pay WESCO an amount equal to the product of (i) such excess quantity (expressed in MMBtu's) multiplied by (ii) the Hourly Price of Gas at the beginning of such Cold Start, Warm Start or Hot Start. In the event that the amount of electric energy consumed to complete a Cold Start, Warm Start or Hot Start, as the case may be, of any Unit ("Start-Up Power") exceeds the amount of electric energy specified in respect of such unit for a Cold Start in Schedule 5.4 hereto, the AES Subsidiaries shall bear the cost of such excess amount of Start-Up Power.

ARTICLE VII METERING

- 7.1 Electricity. (a) Net Electric Energy delivered by the AES Subsidiaries shall be metered at the Delivery Point on an individual Unit continuous real-time basis. As long as the ISO shall continue to require, the ISO's electric revenue meter shall be used to determine conclusively, subject to Section 7.9(b), the amount of Net Electric Energy delivered by the AES Subsidiaries at the Delivery Point.
- (b) The AES Subsidiaries shall be responsible for the maintenance, testing and calibration of the Electric Metering Equipment and the maintenance and testing of the electrical facilities and Protective Apparatus, including any transmission equipment and related facilities, necessary to interconnect the Facilities at the relevant Delivery Points to the relevant electrical system. WESCO shall have the right to receive data in electronic form in real time on a continuous basis from each Unit, and the AES Subsidiaries undertake to install at each Unit one electric meter which is capable of providing such data to WESCO's reasonable satisfaction. Such

installation shall be completed, and the delivery of such data shall be commenced, as promptly as possible after the Effective Date (but in no event later than three months after the Effective Date). The AES Subsidiaries shall bear all costs and expenses of installing, maintaining and testing all Electric Metering Equipment. WESCO shall bear the costs of the delivery to WESCO of data from such meters.

- 7.2 Gas. (a) Gas delivered by WESCO to the AES Subsidiaries shall be metered at the Delivery Point, and as consumed at each individual Unit, in all cases on a continuous real time basis. As long as SoCal Gas and Mobil shall continue to require, the SoCal Gas and Mobil revenue meters shall be used to determine conclusively the quantity of Gas delivered at the Delivery Point. As long as SoCal Gas and Mobil shall continue to require, the SoCal Gas and Mobil gas chromatograph shall be used to determine conclusively, subject to Section 7.9(b), the Btu content of all Gas delivered at the Delivery Point.
- (b) The AES Subsidiaries shall be responsible for the installation, maintenance, testing and calibration of the Gas Metering Equipment (to the extent not otherwise installed, maintained, tested and calibrated by the transporter or supplier of Gas to the Facilities). WESCO shall have the right to receive data in electronic form in real time on a continuous basis from the Delivery Point and from each Unit, and the AES Subsidiaries undertake to install at each Unit one gas meter which is capable of providing such data to WESCO's reasonable satisfaction. Such installation shall be completed, and the delivery of such data shall be commenced, as promptly as possible after the Effective Date (but in no event later than three months after the Effective Date). The AES Subsidiaries shall bear all costs and expenses of installing, maintaining and testing all Gas Metering Equipment. WESCO shall bear the cost of the delivery to WESCO of data from such meters.
- (c) The AES Subsidiaries will continue to maintain each Unit's v-cone Gas meters in accordance with the provisions of this Agreement, including without limitation, Section 7.9(b), and such meters will be used to determine the proportional amount of the quantity of Gas delivered at the Delivery Point that is consumed by each Unit.
- 7.3 Fuel Oil. To the extent that the MRAs, applicable law or regulations, the ISO or any Governmental Authority shall require that the Facilities or any portion thereof operate or be capable of operating on fuel oil, the AES Subsidiaries shall (a) procure and deliver or cause to be delivered to the relevant Delivery Points all required quantities of fuel oil and (b) be responsible for the procurement, installation, maintenance, testing and calibration of all facilities necessary in connection with the receipt, storage and use of fuel oil and the Oil Metering Equipment. WESCO shall not have any right, title or interest in the fuel oil delivered to the Facilities pursuant to this Agreement.
- 7.4 Check Meters. WESCO may at its option and expense install and operate one or more check meters to check the AES Subsidiaries' meters. Such check meters shall be for check purposes and shall not be used in the measurement of Gas, Net Electric Energy or fuel oil for the purposes of the Agreement except as provided in Section 7.9(b) hereof. The check meters shall be subject at all reasonable times to inspection and examination by the AES Subsidiaries or their designee. The installation and operation thereof shall, however, be done entirely by WESCO in

accordance with good industry practices for check metering equipment. The AES Subsidiaries shall grant to WESCO at no cost or expense the right to install such check meters at each Delivery Point and the right to access such check meters at reasonable times as requested by WESCO if such check meters are located on the AES Subsidiaries' premises.

- 7.5 Change in Measurement Method. If, at any time during the Term a new method or technique is developed with respect to electricity, gas or fuel measurement, or the determination of the factors used in electricity, gas or fuel measurement, such new method or technique may be substituted for the method set forth in this Article VII when in the opinion of the Parties, employing such new method or technique is advisable, and they so agree in writing.
- 7.6 Industry Standards. All Electric Metering Equipment, Gas Metering Equipment and Oil Metering Equipment, whether owned by the AES Subsidiaries or by a third party, shall be operated, maintained and tested by and/or on behalf of the AES Subsidiaries in accordance with Accepted Electrical Practices, in the case of the Electric Metering Equipment, in accordance with AGA and ANSI standards in the case of the Gas Metering Equipment and in the case of the Oil Metering Equipment, applicable industry standards.
- 7.7 Access. Each Party shall have the right to receive reasonable advance Notice with respect to, and to be present at the time of, any installing, cleaning, changing, repairing, inspecting, testing, calibrating or adjusting of Electric Metering Equipment, Gas Metering Equipment or Oil Metering Equipment irrespective of whether such Electric Metering Equipment, Gas Metering Equipment or Oil Metering Equipment is owned or operated by the AES Subsidiaries or by a third party. The records from such Electric Metering Equipment, Gas Metering Equipment and Oil Metering Equipment shall be the property of the AES Subsidiaries, but upon reasonable advance Notice, the AES Subsidiaries shall make available to WESCO all data, records and charts relating to the Electric Metering Equipment, Gas Metering Equipment and Oil Metering Equipment, together with calculations therefrom, for inspection and verification.
- 7.8 Installations. Any installations of Electric Metering Equipment, Gas Metering Equipment and Oil Metering Equipment required pursuant to this Agreement shall be scheduled by the AES Subsidiaries; provided, however, that no installation which shall or could affect deliveries of Gas or Net Electric Energy shall be made without the prior written consent of WESCO, which shall not be unreasonably withheld. Any installations of check meters by WESCO shall be scheduled by WESCO; provided, however that the installation shall not unreasonably interfere with the operation and maintenance of the Facilities by the AES Subsidiaries.
- 7.9 Estimates (a) During the period after the Effective Date and prior to the installation at any Unit and commencement of operation of the meters contemplated by Sections 7.1, 7.2 and 7.3, the Net Electric Energy generated and delivered by each Unit shall be estimated in good faith by the AES Subsidiaries, and the quantities of Gas and fuel oil consumed by each Unit shall be estimated in good faith by WESCO and the Parties shall prepare and submit invoices on the basis of such estimates. Any such invoice shall be adjusted retroactively based on the performance of the relevant Unit during the three month period immediately following the installation of such meters.

- (b) The AES Subsidiaries at their sole cost and expense shall inspect and calibrate, or cause to be inspected and calibrated, all Electric Metering Equipment, Gas Metering Equipment and Oil Metering Equipment periodically, but not less frequently than annually. When any test shall show a measurement error of more than (i) in the case of Gas Metering Equipment, two percent (2%) or such lower percentage as may be established by applicable tariff, (ii) in the case of Electric Metering Equipment, one-quarter percent (1/2%), or (iii) in the case of Oil Metering Equipment, two percent (2%), correction shall be made for the period during which the measurement instruments were in error, first, by using the registration of WESCO's check meter, if installed and registering accurately, or if the period cannot be ascertained, correction shall be made for one-half (1/2) of the period elapsed since the last date of test; and the measuring instrument shall be adjusted immediately to measure accurately.
- 7.10 Records. The Parties shall, for five (5) years or such longer period as may be required by the ISO, each keep and maintain accurate and detailed records relating to each Unit's hourly deliveries of Net Electric Energy and Gas consumption. Such records shall be made available for inspection by either Party or any Governmental Authority having jurisdiction with respect thereto during normal business hours upon reasonable Notice. If either Party (the "Notifying Party") shall propose to discard any records theretofore required to be retained by this Section 7.10, it shall give Notice to the other Party thereof and the other Party may within thirty (30) days elect to take possession of such records by Notice to the Notifying Party, and in such case the Notifying Party shall promptly deliver such records to the other Party at its expense. If the Party receiving a Notice pursuant to this Section 7.10 shall not respond with thirty (30) days, the Notifying Party may discard such records without any further obligation hereunder.

ARTICLE VIII DISPATCH

- 8.1 Availability Notice. The AES Subsidiaries shall from time to time furnish to WESCO an Availability Notice with respect to each Unit in the form set forth in Schedule 8.2 at or before 4:30 a.m. PPT on the Day prior to the first Day to which such Availability Notice shall relate. Delivery of an Availability Notice by the AES Subsidiaries to WESCO with respect to any Unit declared available shall be deemed a declaration that all Ancillary Services capable of being provided from such Unit are Available for the Day or Days for which such Availability Notice shall be effective.
- 8.2 Dispatch Rights. (a) Consistent with the operational limits of the Facilities and the Capacity level indicated in the controlling Availability Notice, WESCO shall at all times during the Term have the exclusive right (i) to Dispatch the Facilities in order to comply fully with the MRAs applicable to the Facilities and, at WESCO's option, to engage in Market Transactions, (ii) to utilize the Net Electric Energy and Ancillary Services associated with the Dependable Capacity and (iii) to market the Dependable Capacity, the associated Net Electric Energy and the associated Ancillary Services, in each case subject to the terms and conditions specified herein. The operating procedures relating to the Facilities and the Dispatch and operation thereof are set forth in Schedule 8.2. Schedule 8.2 shall be from time to time amended, in writing signed by the

Parties, as necessary to ensure the efficient, safe and competitive operation of the Units. WESCO shall from time to time furnish to the AES Subsidiaries with respect to each Unit a Dispatch Notice in the form set forth in Schedule 8.2. A Dispatch Notice shall be effective until the delivery of a subsequent Dispatch Notice. If prior to the delivery of a subsequent Dispatch Notice, the AES Subsidiaries shall have delivered a new Availability Notice changing the Availability of any Unit, WESCO's previously delivered Dispatch Notice shall be deemed amended (x) to the Capacity level indicated in such subsequent Availability Notice if WESCO's immediately preceding Dispatch Notice dispatched the Unit at the full Capacity declared available in such immediately preceding Availability Notice, or (y) at the lesser of the Capacity level indicated in such subsequent Availability Notice or the Capacity Dispatched in WESCO's immediately preceding Dispatch Notice dispatched the Unit at less than the full Capacity declared available in the immediately preceding Availability Notice

- (b) WESCO shall at all times during the Term, in connection with the exercise of its rights and performance of its obligations under this Agreement, Dispatch the Facilities and otherwise comply with its obligations under, and the directives of the ISO pursuant to, the MRAs and the ISO tariff. The AES Subsidiaries shall at all times during the Term, in connection with the exercise of their rights and performance of their obligations under this Agreement, operate and maintain the Facilities and otherwise perform their obligations under, and the valid directives of the ISO pursuant to, the MRAs and the ISO tariff.
- (c) When a Dispatch Period will involve a Cold Start, Warm Start or Hot Start, WESCO shall provide the AES Subsidiaries with advance notice of at least the Start-up Notification Lead Time. When a Dispatch Period, including revisions to a previously scheduled Dispatch Period, does not involve a Cold Start, Warm Start or Hot Start or when a Unit shall be operating with automatic generating control, WESCO shall provide the AES Subsidiaries with a Dispatch Notice in accordance with the procedures and timing requirements therefor set forth in Schedule 8.2.
- (d) WESCO shall have the right to Dispatch each particular Unit, and the AES Subsidiaries shall not have the right to Dispatch an alternative Unit in response to a Dispatch Notice; provided, however, that the AES Subsidiaries may with WESCO's written consent provide the requested Net Electric Energy or Ancillary Services from a source not part of the Facilities and in such case the payments WESCO shall be obligated to make to the AES Subsidiaries during such Dispatch Period with respect to such alternative source shall be the payments WESCO would have been liable for if the requested Unit had been dispatched and the requested Net Electric Energy or Ancillary Services delivered at the Delivery Point.
- 8.3 AES Dispatch. The AES Subsidiaries shall have the right to Dispatch the Facilities or any portion thereof only if, and only to the extent that, (a) the AES Subsidiaries are contractually obligated to do so under the terms of the MRAs applicable to the Facilities, or (b) the AES Subsidiaries are required to do so by applicable law, regulation or tariff.
- 8.4 Gas. (a) If WESCO shall Dispatch a Unit or Units, WESCO shall deliver or cause to be delivered to the AES Subsidiaries at the relevant Delivery Points all quantities of Gas required

by the AES Subsidiaries (i) to generate Net Electric Energy and provide Ancillary Services and (ii) subject to Section 6.2(b) and Section 6.2(c), to perform Cold Start-ups, Warm Start-ups and Hot Start-ups in response to a Dispatch Notice following a Shutdown (excluding, however, Gas used to generate Start-up Power). WESCO shall deliver, or cause to be delivered, Gas at the Delivery Point at the pressures in effect from time to time in the pipeline(s) of the respective Transporter(s). WESCO shall at times retain title to all quantities of Gas delivered to the Facilities pursuant to this Section 8.4(a)

- (b) (i) WESCO shall sell and deliver or cause to be delivered and the AES Subsidiaries shall purchase and accept at the relevant Delivery Points all of the AES Subsidiaries' requirements for Gas for use at the Facilities in excess of the quantities described in Section 8.4(a) (such Gas being sometimes referred to as "Purchased Gas"). The purchase price for all Gas delivered and received pursuant to this Section 8.4(b) shall be the Hourly Gas Price for the hour in which delivery is made.
- (ii) The Purchased Gas to be received by the AES Subsidiaries hereunder shall be delivered by WESCO at uniform hourly and daily rates of flow as nearly as practicable, but it is recognized that due to operating conditions the quantities of Purchased Gas received and delivered may not be in balance on any one particular day. The Parties shall use commercially reasonable efforts to avoid imposition of any Imbalance Charges. If the AES Subsidiaries or WESCO receives an invoice from a Transporter that includes Imbalance Charges, the Parties shall determine the validity as well as the cause of such Imbalance Charges. If the Imbalance Charges were incurred as a result of the AES Subsidiaries' actions or inactions (which shall include, but not be limited to, the AES Subsidiaries' failure to accept scheduled quantities of Purchased Gas), then the AES Subsidiaries shall pay for such Imbalance Charges, or reimburse WESCO for such Imbalance Charges paid by the WESCO to the Transporter. If the Imbalance Charges were incurred as a result of WESCO's actions or inactions (which shall include, but shall not be limited to, WESCO's failure to deliver scheduled quantities of Purchased Gas), then WESCO shall pay for such Imbalance Charges, or reimburse the AES Subsidiaries for such Imbalance Charges paid by the AES Subsidiaries to the Transporter.
- (iii) Each Party shall designate authorized representatives to effect the scheduling of the Purchased Gas. The Parties shall coordinate their nomination activities, giving sufficient time to meet the deadlines of Transporters. Each Party shall give the other Party timely prior notice, sufficient to meet the requirements of all Transporters, of the quantities of Purchased Gas to be delivered and purchased each Day. Should either Party become aware that actual deliveries at the Delivery Point are greater or lesser than scheduled deliveries, such Party shall promptly notify the other Party.
- (c) All Gas other than Gas supplied by Mobil pursuant to the Mobil Contract, shall be of merchantable quality and shall meet the quality specifications set forth in the applicable Transporter's tariff or, if applicable, the applicable Transporter's transportation agreement entered into with WESCO for the purposes of effecting deliveries of Gas pursuant to this Agreement. WESCO agrees that at the request AES Subsidiaries it will use reasonable efforts to exercise any curtailment rights available to it under the Mobil Contract in respect of deliveries of Gas not meeting the quality specifications of this Section 8.4(b).

- (d) The unit of Gas quantity measurement for purposes of this Agreement shall be one MMBtu.
- 8.5 Transmission/Transportation Costs. WESCO shall be responsible for and bear all costs and expenses related to (a) all transmission and other services required to move Net Electric Energy that is delivered by the AES Subsidiaries at the Delivery Point from the Delivery Point to other points, and (b) all transport of Gas to the Delivery Point on one or more Transporter(s) as determined in WESCO's sole discretion. The AES Subsidiaries shall be responsible for all costs and expenses related to (a) the supply and transportation of fuel oil to the relevant Delivery Point and, (b) the transportation of Gas and fuel oil at and from the relevant Delivery Point and the transmission of Net Electric Energy to the relevant Delivery Point.
- 8:6 Non-Dispatch. Provided that WESCO provides the AES Subsidiaries with a Dispatch Notice complying with the provisions of this Agreement, including, but not limited to, the provisions of Section 8.2(c), in the event that, in any hour, the requested Unit or Units (or alternate sources permitted in accordance with Section 8.2(d)) do not deliver (for any reason, including the failure of any Unit Start-up to be completed within the time specified therefor in Schedule 5.4) the requested Dependable Capacity, Net Electric Energy or Ancillary Services, in whole or in part, the AES Subsidiaries shall pay WESCO on the date payment would otherwise be due to the AES Subsidiaries, an amount for each MW, MWh or unit or units of Ancillary Services of such deficiency equal to the positive difference, if any, obtained by subtracting the price or prices payable that would have been therefor under this Agreement from the Replacement Price; "Replacement Price" means the PX price at the beginning of the first hour of Non-Dispatch of (or if not available from the PX, the price at which WESCO purchases in a commercially reasonable manner a substitute for) the MW, MWh or Ancillary Services not delivered or made available by the AES Subsidiaries plus any additional transmission charges, PX charges and related penalties, if any, incurred by WESCO to the Delivery Point, less the value of the quantity of Gas not consumed to produce the MW, MWh or Ancillary Services not delivered or made available (i.e., the quantity of Gas that would have been consumed if the requested Dependable Capacity, Net Electric Energy or Ancillary Services had been delivered or made available based on the Units' Heat Rate applicable to the Capacity level at which Dispatched minus the quantity of Gas actually consumed) determined by reference to the Hourly Gas Price at the beginning of the first hour of such period of non-Dispatch, plus an amount for each MMBtu of Gas not received by the AES Subsidiaries equal to the positive difference, if any, obtained by subtracting the Sales Price from the Hourly Gas Price at the beginning of the first hour of such period of Non-Dispatch; "Sales Price" means the Hourly Gas Price, for this purpose determined by using only the index described in factor A (rather than the average of factors A, B and C), on the Day on which the Gas not received by the AES Subsidiaries is sold, plus any Imbalance Charges incurred by WESCO as a result of the AES Subsidiaries' failure to receive Gas and any additional transport charges and related penalties, if any, incurred by WESCO.
 - 8.7 Net Electric Energy. (a) The Net Electric Energy to be delivered by the AES Subsidiaries under this Agreement shall be three-phase, 60 hertz, alternating current at a nominal voltage acceptable to the Transmission Provider at the Delivery Point, shall not adversely affect the voltage, frequency, waveshape or power factor of power at the Delivery Point and shall be

delivered at the Delivery Point in a manner acceptable to the Transmission Provider at the Delivery Point.

- (b) WESCO shall receive all Net Electric Energy or Ancillary Services delivered to or provided at the Delivery Point (or Net Electric Energy or Ancillary Services that the AES Subsidiaries are capable of delivering or providing at the Delivery Point but which cannot be delivered by reason of conditions on the WESCO side of the Delivery Point not resulting from an act or omission of the AES Subsidiaries) and shall be responsible for all transmission arrangements (including control area services) and for associated costs and losses after taking receipt of Net Electric Energy at the Delivery Point and for any applicable fees and taxes incurred after the Delivery Point.
- 8.8 Risk of Loss and Indemnity. As between the Parties, WESCO shall be deemed to be in exclusive possession and control (and responsible for any damages or injury resulting therefrom or caused thereby) of the Gas prior to the Delivery Point therefor and the Net Electric Energy and Ancillary Services after the Delivery Point therefor, and the AES Subsidiaries shall be deemed to be in exclusive possession and control (and responsible for any damages or injury resulting therefrom or caused thereby) of the Gas at and from the Delivery Point therefor and the Net Electric Energy and Ancillary Services prior to and at the Delivery Point therefor. Risk of loss related to the Gas shall transfer from WESCO to the AES Subsidiaries at the Delivery Point therefor and risk of loss related to the Net Electric Energy and Ancillary Services shall transfer from the AES Subsidiaries to WESCO at the Delivery Point therefor. WESCO shall indemnify, defend and hold harmless the AES Subsidiaries from and against any liabilities arising out of or in any way relating to WESCO's possession or control of the Gas up to the Delivery Point or its possession and control of the Net Electric Energy and Ancillary Services after the Delivery Point therefor, and the AES Subsidiaries shall indemnify, defend and hold harmless WESCO from and against any liabilities arising out of or in any way relating to the AES Subsidiaries' possession or control of the Gas at and from the Delivery Point therefor or their possession and control of the Net Electric Energy and Ancillary Services prior to and at the Delivery Point therefor.
- 8.9 Operation on Oil. The AES Subsidiaries shall not operate any Unit using any fuel other than Gas without the prior written consent of WESCO, which will not be unreasonably withheld if in order to comply with a directive of the ISO. WESCO shall not have the right to direct the AES Subsidiaries to operate on any fuel other than Gas, unless pursuant to a directive of the ISO.
- 8.10 Alternative or Additional Delivery Point. WESCO has the right at any time or times to designate one or more alternate or additional Delivery Points at the Facilities for the delivery of Net Electric Energy or Ancillary Services, as the case may be, and subject to the remaining provisions of this Section 8.10, in such case Schedule B shall be automatically and without further action on the part of either Party amended to reflect such alternate or additional Delivery Point. The cost, including the cost of permitting, design, engineering, construction and testing, of all Interconnection Facilities necessary in connection with the establishment or removal of such additional or alternate Delivery Point, including all Protective Apparatus and Electric Metering Equipment shall be for the account of WESCO and all Interconnection Facilities, Protective Apparatus and Electric Metering Equipment shall be reasonably acceptable to the AES

Subsidiaries. The AES Subsidiaries will provide access to the Facilities for WESCO and its employees, agents and contractors for all purposes necessary in connection with the establishment or removal of such additional or alternate Delivery Point or the exercise by WESCO of any of its rights under this Section 8.10. All Interconnection Facilities, Protective Apparatus and Electric Metering Equipment constructed to serve the additional Delivery Points shall be upon the completion of construction and testing thereof sold by WESCO to the AES Subsidiaries for \$1.00 (subject to an option in favor of WESCO to repurchase at any time or from time to time for \$1.00 such Interconnection Facilities, Protective Apparatus and Electric Metering Equipment or any portion thereof to the extent not necessary for the performance by the AES Subsidiaries of their obligations hereunder, in which case the affected alternate or additional Delivery Point shall be deleted from Schedule B), shall for all purposes of this Agreement be considered a part of the Facilities and shall be operated and maintained by the AES Subsidiaries as such in accordance with the terms of this Agreement. The incremental cost of operating and maintaining such Interconnection Facilities, Protective Apparatus and Electric Metering Equipment shall be for the account of WESCO. In the event WESCO elects to purchase such Interconnection Facilities, Protective Apparatus and Electric Metering Equipment, WESCO may at its sole cost and expense remove such items from the Facilities.

ARTICLE IX OPERATION AND MAINTENANCE

- 9.1 Operation and Maintenance Obligations. At all times during the Term, the AES Subsidiaries shall install, construct, test, operate and maintain the Facilities in a manner not inconsistent with the MRAs and shall, except as provided in Section 8.10, bear all costs and expenses of such installation, construction, testing, operation and maintenance, including without limitation labor, parts, supplies, insurance and applicable Taxes. Such installation, construction, testing, operation and maintenance shall be performed in accordance with Accepted Electrical Practices, applicable statutes, codes, regulations, standards and guidelines adopted by Governmental Authorities, the North American Electric Reliability Council, the Western Systems Coordinating Council or the ISO from time to time. Subject to WESCO's rights set forth in this Agreement, the AES Subsidiaries shall have full and complete responsibility for and control over testing, operation and maintenance of the Facilities.
- 9.2 Operation. The AES Subsidiaries shall operate the Facilities in parallel with the electrical system to which the Facilities are connected with governor control and shall deliver Net Electric Energy at the Delivery Points in a form appropriate to such electrical system.
- 9.3 <u>Automatic Regulation</u>. The AES Subsidiaries agree that all of the Units other than Alamitos Unit 7 and Huntington Beach Unit 5 shall have automatic generating control equipment installed, and that such automatic generating control equipment shall be capable of being controlled from a location chosen by WESCO. The AES Subsidiaries shall at WESCO's direction operate the Facilities with automatic generating control equipment in service.
- 9.4 Response Rates. (a) The AES Subsidiaries shall provide to WESCO response rates greater than those set forth in Schedule A for automatic generation control, when the relevant

control systems are technically sufficient for such faster response rates, consistent with Accepted Electrical Practices.

- (b) The maximum ramp rate for each Unit when not operating with automatic generating control equipment in service for providing Contingency Reserve will be established during the ISO Ancillary Services verification process. WESCO shall be entitled to use the maximum ramp rate determined by such verification process to bid Spinning Reserve. The maximum ramp rate will only be required when the ISO or WESCO is called to meet a Contingency Reserve obligation, consistent with Accepted Electrical Practices, unless, in the reasonable judgment of the AES Subsidiaries doing so would have a material adverse effect on the Unit.
- 9.5 <u>Disconnection</u>. Except as provided in Section 8.10, in the event that for whatsoever reason the ISO or any owner or operator of the electrical system to which the Facilities are connected requires that the Facilities or any portion thereof be disconnected from such electrical system (or requires that deliveries of Net Electric Energy otherwise be curtailed, reduced or interrupted), the AES Subsidiaries shall be solely responsible for all costs and expenses incurred by the AES Subsidiaries due to such disconnection or interruption.
- 9.6 <u>Correction</u>. The AES Subsidiaries shall use their best efforts to correct promptly any condition at the Facilities which necessitates the disconnection of the Facilities or the reduction, curtailment or interruption of electrical output of the Facilities.
- 9.7 Certificate of Compliance. The AES Subsidiaries shall furnish to WESCO on each Contract Anniversary Date a certificate, together with such supporting documentation as WESCO shall reasonably request, demonstrating that, during the preceding Contract Year, the AES Subsidiaries have performed or caused to be performed during such Contract Year all maintenance and testing of the Facilities required by the terms of the applicable MRAs and this Article IX.
- 9.8 Access. During the Term and all extensions thereof, the AES Subsidiaries shall provide one office at each of the Facilities for use by a WESCO employee or agent and provide such employee or agent continuing and unrestricted accompanied access to the Facilities and all appurtenant electrical equipment at all times and for any duration for the purpose of (i) verifying, reviewing, and/or monitoring the operation of the Facilities and all appurtenant electrical equipment for the purpose of determining the AES Subsidiaries' compliance with this Agreement; (ii) inspecting, examining and testing such equipment and facilities as authorized under this Agreement; and (iii) exercising its rights with respect to alternate or additional Delivery Points pursuant to Section 8.10. In addition, the AES Subsidiaries shall provide WESCO's other employees and/or agents accompanied access to the Facilities as aforesaid, at reasonable times, subject to the AES Subsidiaries' reasonable requirements with respect to safety and security. WESCO's employees and/or agents shall conduct themselves so as to not hamper or impede the Facilities' operations.
- 9.9 <u>Maintenance of Records</u>. The AES Subsidiaries shall keep and maintain accurate and complete records for the Facilities in a manner consistent with Accepted Electrical Practices,

applicable statutes, codes, regulations, standards and guidelines adopted by Governmental Authorities, the North American Electric Rehabilitating Council, the Western Systems Coordinating Council or the ISO from time to time and the terms of the MRAs, including such information relating to the operation and maintenance of the Facilities and all associated equipment as is appropriate. The AES Subsidiaries shall make such records available to WESCO for inspection and copying from time to time as WESCO may reasonably request. If either Party (the "Notifying Party") shall propose to discard any records theretofore required to be retained by this Section 9.9 it shall give Notice to the other Party thereof and the other Party may within thirty (30) days elect to take possession of such records by Notice to the Notifying Party, and in such case the Notifying Party shall promptly deliver such records to the other Party at its expense. If the Party receiving a Notice pursuant to this Section 9.9 shall not respond with thirty (30) days, the Notifying Party may discard such records without any further obligation hereunder.

9.10 Outages. The Notice, forecast, coordination, scheduling, approval, reporting and related requirements of this Agreement in respect of Planned Outages, Maintenance Outages and Forced Outages are set forth in Schedule 8.2.

ARTICLE X BILLING AND PAYMENT

10.1 Invoices and Payments. On or before the fifteenth (15th) Day of each Month, the AES Subsidiaries shall render to WESCO a monthly statement (by regular mail, facsimile or other acceptable means conforming to the provisions of Article XXII) in respect of the immediately preceding month in the form attached hereto as Schedule 10.1. If the fifteenth (15th) Day is not a Business Day, the AES Subsidiaries shall render the statement on the next succeeding Business Day. Such statement shall set forth on an individual Unit basis the amount of Net Electric Energy delivered by the AES Subsidiaries and the Ancillary Services provided to WESCO in each hour, the quantities of Gas consumed in each hour, the number Start-Ups of each type requested and accomplished, a computation of the amounts due from WESCO to the AES Subsidiaries and a computation of any other amounts as may then be due and payable by WESCO to the AES Subsidiaries, or vice versa, in respect of such Month. WESCO shall make payment of the net amount shown to be due to the AES Subsidiaries on the monthly statement by wire transfer to an account specified by the AES Subsidiaries not later than the twenty-fifth (25th) Day of each Month or the tenth (10th) Day after receipt of the monthly statement, unless such Day is not a Business Day, in which case WESCO shall make payment on the next Business Day. If such monthly statement shall reflect a net amount due to WESCO from the AES Subsidiaries, the AES Subsidiaries shall make payment of the net amount shown to be due to WESCO on the monthly statement by wire transfer to an account specified by WESCO not later than the twenty-fifth (25th) day of such Month, unless the twenty-fifth (25th) day is not a Business Day. If the twentyfifth (25th) Day is not a Business Day, the AES Subsidiaries shall make payment on the next Business Day. All such payments shall be deemed to be made when said wire transfer is received by the AES Subsidiaries or by WESCO, as the case may be. Overdue payments shall accrue interest from, and including, the due date to, but excluding, the date of payment at the Interest Rate. If either Party, in good faith, disputes a monthly statement, such Party shall provide to the

other Party a written explanation of the basis for the dispute and shall make payment of the portion of such monthly statement not disputed no later than the due date. To the extent any disputed amount is later determined to be properly due and payable, it shall be paid within ten (10) Days of such determination, together with interest accrued at the Interest Rate from the due date to the date payment is made, if made within ten (10) Days of such determination, and if not paid within ten (10) Days of such determination, together with interest accrued after such ten (10) Day period to the date payment is made at the Interest Rate plus 2%.

- 10.2 Adjustments. (a) In the event adjustments or corrections to monthly statements are required as a result of inaccurate Electric Metering Equipment, Gas Metering Equipment or Oil Metering Equipment or other errors in computation or billing, the Parties shall promptly recompute amounts due from or to each other hereunder during the period of inaccuracy and otherwise correct any errors in such monthly statement. If the total amount, as recomputed, due from a Party for the period of inaccuracy varies from the total amount due as previously computed, and payment of the previously computed amount has been made, the difference shall be paid to the Party entitled to it within ten (10) Days after correction of the erroneous invoice(s).
- 10.3 Audit. Each Party (and its representative(s)) has the right, at its sole expense, upon reasonable Notice and during normal working hours, to examine the records of the other Party to the extent reasonably necessary to verify the accuracy of any statement, charge or computation made pursuant to this Agreement. If requested, a Party shall provide to the other Party statements evidencing the amounts of Net Electric Energy or the quantities of Gas or fuel oil delivered at the Delivery Point. If any such examination reveals any inaccuracy in any statement, the necessary adjustments in such statement and the payments thereof will be promptly made and shall bear interest calculated at the Interest Rate from the date the overpayment or underpayment was made until paid; provided, however, that no adjustment for any statement or payment will be made unless objection to the accuracy thereof was made prior to the lapse of two years from the rendition thereof, and provided further that this Section 10.3 will survive any termination of the Agreement for a period of two (2) years from the date of such termination for the purpose of such statement and payment objections.

ARTICLE XI TAXES

- 11.1 WESCO Taxes. The payments by WESCO to the AES Subsidiaries do not include reimbursement for, and WESCO is liable for and shall pay, cause to be paid, or reimburse the AES Subsidiaries if the AES Subsidiaries have paid, all Taxes imposed on or with respect to Gas or the use or consumption thereof prior to the Delivery Point therefor (other than the portion of any Taxes for which the AES Subsidiaries are liable under Section 11.2 resulting from the inclusion of transportation costs in the base thereof) or on Net Electric Energy or the use and consumption thereof after the Delivery Point therefor. WESCO shall indemnify, defend and hold harmless the AES Subsidiaries from any liability for such Taxes.
- 11.2 AES Subsidiaries Taxes. The payments by WESCO to the AES Subsidiaries include full reimbursement for, and the AES Subsidiaries shall be liable for and shall pay, or cause

to be paid, or reimburse WESCO if WESCO has paid, all Taxes applicable to the purchase and sale of Dependable Capacity, the performance of Fuel Conversion Services, the provision of Ancillary Services, or otherwise relating to or arising out of this Agreement or the transactions contemplated hereby, including all Taxes imposed on or with respect to the Facilities, the operation or control thereof and all natural gas, fuel oil or electric energy associated therewith, or the sale, use or consumption of any of the foregoing, except as provided in Section 11.1 and Section 11.4. If WESCO is required to remit any Tax for which the AES Subsidiaries are responsible, the amount shall be deducted from any sums due to the AES Subsidiaries. The AES Subsidiaries shall indemnify, defend and hold harmless WESCO from any liability for such Taxes.

- 11.3 Exemptions. Either Party, upon written request of the other, shall provide a certificate of exemption or other reasonably satisfactory evidence of exemption if either Party is exempt from any Taxes, and shall use all reasonable efforts to obtain or maintain for, or to enable the other Party to obtain or maintain, any exemption from or reduction of any Tax, whether currently available for becoming available in the future. Without limiting the generality of the foregoing, the Parties agree that, if beneficial to the efforts of either Party to obtain or maintain any exemption from or reduction of any Tax, whether currently available or becoming available in the future, the Parties will cooperate to restructure the transactions contemplated by this Agreement so as to enable either Party to obtain or maintain such exemption or reduction, as the case may be; provided, however, that any such restructuring shall not affect adversely the economic consequences to either Party.
- 11.4 New Taxes. (a) Notwithstanding any other provision of this Agreement to the contrary, if (i) a New Tax is imposed and WESCO or the AES Subsidiaries would be responsible for such New Tax and (ii) such New Tax is (A) imposed on or applicable to the transactions contemplated by this Agreement, including without limitation, the sale of Capacity or the performance of Fuel Conversion Services at or by one or all of the Facilities, and not imposed on and generally applicable to the sale of Capacity or the use of natural gas to generate electricity or to provide fuel conversion services in the State of California, the AES Subsidiaries shall pay or cause to be paid, or reimburse WESCO if WESCO shall have paid, all such New Taxes and the AES Subsidiaries shall indemnify, defend and hold harmless WESCO from any liability for such New Taxes, or (B) imposed on and generally applicable to the sale of Capacity or the use of natural gas to generate electricity or to provide fuel conversion services in the State of California, then WESCO shall pay or cause to be paid, or reimburse the AES Subsidiaries if the AES Subsidiaries shall have paid, all such New Taxes and WESCO shall indemnify, defend and hold harmless the AES Subsidiaries from any liability for such New Taxes.
- (b) If a New Tax is imposed and the Parties shall disagree as to whether such New Tax is described in Clause (a)(ii)(A), on the one hand, or clause (a)(ii)(B), on the other, or if such New Tax is not described in either such clause, the characterization of such New Tax under clause (a)(ii)(A) or (a)(ii)(B) or the allocation of responsibility for such New Tax to one of, or between, the Parties shall be determined pursuant to Article XII. The arbitrators, in selecting the proposal most fairly resolving the Parties' disagreement, shall do so by selecting the proposal most fairly resolving the question consistent with the principles of this Section 11.4.

ARTICLE XII DISPUTE RESOLUTION

- 12.1 Arbitration. (a) In the event any controversy or claim shall arise between one or more of the AES Subsidiaries and WESCO regarding any matter under or relating to this Agreement, which is not required by law to be adjudicated by a governmental agency, the Parties upon Notice given by either of them, shall negotiate for thirty (30) days (seven (7) days in the case of any controversy of \$1 million or less) in good faith to resolve the same.
- (b) If the Parties cannot agree, such failure to agree shall be deemed a dispute and the dispute shall be determined by arbitration upon Notice of submission given by either Party to the other, which Notice shall name one arbitrator. Said Notice shall include a precise statement by such Party of the dispute. Within fifteen (15) Days (five (5) days in the case of any controversy of \$1 million or less) after the receipt of such Notice, the other Party shall also submit a precise statement of the dispute and name a second arbitrator. The two arbitrators so named shall agree on a third arbitrator. If the two arbitrators so mentioned are unable within a further fifteen (15) days (five (5) days in the case of any controversy of \$1 million or less) to agree upon a third arbitrator, the arbitrator shall be appointed upon the application of either Party, by the Senior Judge (in service) of the United States District Court for the Central District of California. The arbitrators selected to act hereunder shall be qualified by education and experience to pass on the particular controversy in dispute. The arbitrators shall promptly request from each Party a written proposal with respect to the resolution of the dispute, each of which proposals must be limited to the resolution of the specific controversy in question and consistent with the limitations on damages and other provisions of this Agreement, and shall be submitted in confidence to the arbitrator within fifteen (15) days (five (5) days in the case of any controversy of \$1 million or less). No later than sixty (60) Days (ten (10) Days in the case of any controversy of \$1 million or less) following the submission of proposals, the arbitrator shall select the proposal most fairly resolving the dispute and the proposal selected by at least two (2) arbitrators shall be the decision of the panel. The arbitrators shall not be restricted from taking into account relevant facts or circumstances not made a part of the proposals. The decision of the arbitrators made in writing shall be final and binding upon the Parties hereto and judgment may be entered thereon in any court of competent jurisdiction. It is agreed that (i) all aspects of the arbitration, and any award shall be held confidential by the Parties and the arbitrators; and (ii) the award and judgment of the arbitrator shall have no binding or precedential effect with respect to any other controversy not before the arbitrator, whether or not similar to or related to the specific controversy decided by the arbitrator. The expenses of arbitration, including reasonable compensation to the arbitrator, shall be borne equally by the Parties hereto, except that each Party shall bear the compensation and expenses of its own counsel and employees.
- (c) If the Parties shall agree, in the case of any controversy involving \$1 million or less, there shall be only one arbitrator, who shall be designated and agreed upon in writing by the Parties from time to time, and whose decision reached in conformity with the procedures set forth in Section 12.1(b) shall be final and binding. Except for the number of arbitrators, all provisions of Section 12.2(b) shall be applicable to the arbitration of such controversy.

12.2 Survival. This Article XII shall survive the termination or expiration of this Agreement.

ARTICLE XIII REPRESENTATIONS, WARRANTIES AND COVENANTS

- 13.1 <u>By AES</u>. As of the date hereof and as of the Effective Date, each of the AES Subsidiaries hereby represents, warrants and covenants as follows:
- (a) It is a limited liability company duly organized and validly existing under the laws of the State of Delaware.
- (b) It has all requisite power and authority to carry on the business to be conducted by it under this Agreement and to enter into and perform its obligations under this Agreement.
- (c) The execution and delivery of this Agreement and the performance of its obligations hereunder have been duly authorized by all necessary action on its part and do not and will not conflict with or result in a breach of its operating agreement or other organizational documents, charter documents or by-laws or any indenture, mortgage, other agreement or instrument or any statute or rule, regulation, order, judgment or decree of any Governmental Authority to which it is a party or by which it or any of its Affiliates or properties is bound or subject.
- (d) This Agreement is the valid and binding obligation of such AES Subsidiary enforceable in accordance with its terms, except as such enforceability may be limited by applicable bankruptcy, insolvency or similar laws from time to time in effect that affect creditors' rights generally or by general principles of equity.
- (e) Such AES Subsidiary has obtained, or prior to the Effective Date will obtain, all Approvals as may be required to operate and maintain the Facilities in accordance with and as contemplated by the terms of this Agreement and to perform its obligations hereunder, except to the extent the failure to do so shall have an immaterial effect on this Agreement, the Parties or the performance of their respective obligations hereunder, and during the term hereof, it shall obtain all such additional Approvals as may be required with respect to the operations of the Facilities or for the performance of its obligations hereunder, except to the extent the failure to do so would have an immaterial effect on this Agreement, the Parties or the performance of their respective obligations hereunder, as soon as practicable.
- (f) Together with the other AES Subsidiaries, it has good, valid and marketable title to, or in the case of leased property, a valid leasehold interest in, all of the Facilities and any appurtenances thereto, free and clear of Liens, other than Permitted Liens.
- (g) For the purposes of this Section 13.1(g), the following words and phrases shall have the following meanings:

"Environment" shall mean soil, surface waters, groundwaters, land, stream sediments, surface or subsurface strata, ambient air, and any environmental medium.

"Environmental Condition" shall mean any condition involving or resulting from the presence of Regulated Materials in the Environment, (whether or not yet discovered), which is reasonably likely to or does result in any damage, loss, cost, expense, claim, demand, order, or liability to or against the AES Subsidiaries or WESCO (including, without limitation, claims by any third party or any government entity, and including, without limitation, any condition resulting from any activity or operation formerly conducted by any person or entity in connection with the Facilities.)

"Environmental Law" shall mean any environmental or health and safety related law, regulation, rule, ordinance, guideline, criterion, mandate, order or by-law at the federal, state, or local level, whether existing as of the date hereof, previously enforced, or subsequently enacted.

"Regulated Material" shall mean any chemical, substance, material, or waste which is now or becomes listed, defined or regulated in any manner by any federal, state or local law based upon, directly or indirectly, such chemicals, substances, materials or wastes being hazardous, harmful or potentially harmful to human health or to the environment, including without limitation, asbestos, PCB's and petroleum or petroleum containing substances.

"Release" shall mean any releasing, spilling, leaking, pumping, pouring, emitting, emptying, discharging, injecting, escaping, leaching, disposing, or dumping into the Environment.

"Threat of Release" shall mean a substantial likelihood of a Release which requires action to prevent or mitigate damage to the Environment which may result from such Release.

The AES Subsidiaries represent and warrant to WESCO that to the best of their knowledge, after due inquiry and except as indicated on Schedule 13.1(g):

- (i) Neither the AES Subsidiaries nor any former owner or operator of the Facilities has liability under or has violated any, and each is presently in compliance in all material respects with, all Environmental Laws applicable to the Facilities, and there exist no Environmental Conditions with respect to the ownership and operation of the Facilities, which could result in liability to WESCO or the AES Subsidiaries.
- (ii) Neither the AES Subsidiaries nor any former owner or operator of the Facilities has arranged for the disposal of, generated, manufactured, refined, transported, treated, stored, handled, recycled, disposed, transferred, produced, processed or released any Regulated Material at the Facilities, except in compliance with all applicable Environmental Laws, and the AES Subsidiaries have no knowledge of the Release or Threat of Release of any Regulated Material on, under or from the Facilities, except in compliance with all applicable Environmental Laws.
- (iii) No lien, claims or liability has been imposed on the Facilities by any Governmental Agency at the federal, state, or local level in connection with the presence of any Regulated Material on or off the Facilities.
- (iv) Neither the AES Subsidiaries nor any former owner or operator of the Facilities has: (a) entered into or been subject to any consent decree, compliance order, or

administrative order with respect to the Facilities; (b) received notice under the citizen suit provision of any Environmental Law in connection with the Facilities or any operations thereon; (c) received any request for information, notice, demand letter, administrative inquiry, or formal or informal complaint or claim with respect to any Environmental Condition relating to the Facilities or operations thereon; or (d) been subject to or threatened with any governmental or citizen enforcement action with respect to the Facilities or any other person or entity for whose conduct it is or may be held responsible, in each instance above, which is reasonably likely to result in liability to WESCO or the AES Subsidiaries, and the AES Subsidiaries have no reason to believe that any of the above will be forthcoming.

- (v) No portion of any of the Facilities contains or has ever contained any underground storage tank, surface impoundment or similar device used for the management of wastewater, or other waste management unit dedicated to the disposal, treatment, or long-term (greater than 90 days) storage of waste materials.
- (vi) The AES Subsidiaries have provided to WESCO copies of all documents, records, and information in their possession or control, known to the AES Subsidiaries to be available and material to the AES Subsidiaries, concerning Environmental Conditions relevant to the Facilities, whether generated by the AES Subsidiaries or others, including without limitation, environmental audits, environmental risk assessments, or site assessments of the Facilities or any adjacent property or other property in the vicinity of such property, documentation regarding offsite disposal of Regulated Materials, spill control plans, and environmental agency reports and correspondence:
- (h) (i) The AES Subsidiaries shall, at their sole cost and expense, take or cause to be taken all actions necessary to ensure that (x) the AES Subsidiaries, and any other person for whose conduct they are or may be held responsible, continue to be in compliance in all material respects with all applicable Environmental Laws, with the terms and conditions of any permits, licenses or approvals required or obtained under Environmental Laws and with any and all agreements with governmental agencies, court orders, and administrative orders under Environmental Laws or relating to Regulated Materials, and (y) the AES Subsidiaries will promptly remove any Release or Threat of Release of Regulated Materials at the Facilities, and remove any Environmental Condition from the Facilities, as necessary to prevent any interference with the performance of the terms of this Agreement and to achieve in all material respects any remediation or cleanup standards that are required with respect to the Regulated Materials or Environmental Condition pursuant to Environmental Laws.
- (ii) The AES Subsidiaries shall provide to WESCO copies of all material documents, records, correspondence and information in their possession or control, or known to the AES Subsidiaries to be available and material to the AES Subsidiaries, relating to the compliance of the Facilities with Environmental Laws or to the Release or Threat of Release of Regulated Materials in connection with their ownership or operation of the Facilities. Furthermore, the AES Subsidiaries shall have an ongoing obligation to provide to WESCO copies of any additional such documents which come into the possession or control of or become so available to the AES Subsidiaries subsequent to the date hereof, within twenty [20] days of any such document becoming available to the AES Subsidiaries.

- (i) No broker, finder, or investment banker is entitled to any brokerage, finder's or other fee or commission in connection with this Agreement or the transactions contemplated hereby based upon any agreements or arrangements or commitment, written or oral, made by or on behalf of the AES Subsidiaries.
- (j) Its performance of this Agreement will be in compliance in all material respects with all applicable federal, state and local laws, regulations, ordinances and orders.
- (k) The AES Subsidiaries will cause the Credit Agreement to include a provision to the effect that if the financing parties or their agent shall exercise a remedy the effect of which causes the removal or replacement of any of the AES Subsidiaries as operator of any of the Facilities WESCO shall have the right to designate the replacement operator, subject to the financing parties' reasonable approval.
- (I) The AES Subsidiaries' assets consist, and at all times during the Term will consist, solely of the Facilities and assets reasonably related thereto, and each of the AES Subsidiaries will engage only in the activities and transactions contemplated by, or reasonably related to the performance of their obligations under, this Agreement.
- (m) The AES Subsidiaries will not refinance the senior indebtedness incurred to finance the original acquisition of the Facilities (the "Existing Indebtedness") or incur additional indebtedness (as defined in the Credit Agreement) ("New Indebtedness"), except to the extent that the Debt Service Coverage Ratio reflected in the pro forma statements of income and cashflow prepared by the refinancing Lenders or the new Lenders, as the case may be, and upon which their lending commitments are based shall not be less than 1.3 prior to the tenth Contract Anniversary Date and not less than 1.4 thereafter (determined on an average annual basis); provided, however, that, notwithstanding the foregoing, a refinancing of Existing Indebtedness or the incurrence of New Indebtedness shall be permitted: (i) to finance capital expenditures with respect to the Facilities required by any law, rule, tariff or regulation or change therein enacted and effective after the Effective Date; and (ii) as reasonably approved by WESCO in connection with any transaction between the AES Subsidiaries and WESCO.
 - 13.2 By WESCO. WESCO hereby represents, warrants and covenants as follows:
- (a) WESCO is a corporation duly organized and validly existing under the laws of the State of Delaware;
- (b) WESCO has all requisite power and authority to carry on the business to be conducted by it under this Agreement and to enter into and perform its obligations under this Agreement;
- (c) The execution and delivery of this Agreement and the performance of WESCO's obligations hereunder have been duly authorized by all necessary action on the part of WESCO and do not and will not conflict with or result in a breach of WESCO's charter documents or by-laws or any indenture, mortgage, other agreement or instrument or any statute or rule, regulation,

order, judgment or decree of any Governmental Authority to which WESCO is a party or by which WESCO or any of its Affiliates is bound or subject;

- (d) This Agreement is the valid and binding obligation of WESCO, enforceable with its terms except as such enforceability may be limited by applicable bankruptcy, insolvency or similar laws from time to time in effect that affect creditors' rights generally or by general principles of equity; and
- (e) No broker, finder, or investment banker is entitled to any brokerage, finder's or other fee or commission in connection with this Agreement or the transactions contemplated hereby based upon any agreements or arrangements or commitment, written or oral, made by or on behalf of WESCO.
- (f) WESCO has obtained or prior to the Effective Date will obtain all Approvals as may be required to perform its obligations hereunder, except to the extent the failure to do so shall have an immaterial effect on this Agreement, the Parties or the performance of their respective obligations hereunder and during the Term hereof, it shall obtain all such additional Approvals as may be required for the performance of its obligations hereunder, except to the extent the failure to do so would have an immaterial effect on this Agreement, the Parties or the performance of their respective obligations hereunder, as soon as practicable.
- (g) Its performance of this Agreement will be in compliance in all material respects with all applicable federal, state and local laws, regulations, ordinances and orders.
- 13.3 By the Parties. The Parties agree to use all reasonable efforts to designate the initial arbitrator for purposes of Section 12.1(c) by the date sixty (60) days after the Effective Date.

ARTICLE XIV LIABILITY

14.1 Limitation of Remedies. Liability and Damages. THE PARTIES CONFIRM THAT THE EXPRESS REMEDIES AND MEASURES OF DAMAGES PROVIDED IN THIS AGREEMENT SATISFY THE ESSENTIAL PURPOSES HEREOF. FOR BREACH OF ANY PROVISION FOR WHICH AN EXPRESS REMEDY OR MEASURE OF DAMAGES IS PROVIDED, SUCH EXPRESS REMEDY OR MEASURE OF DAMAGES SHALL BE THE SOLE AND EXCLUSIVE REMEDY, THE OBLIGOR'S LIABILITY SHALL BE LIMITED AS SET FORTH IN SUCH PROVISION AND ALL OTHER REMEDIES OR DAMAGES AT LAW OR IN EQUITY ARE WAIVED. IF NO REMEDY OR MEASURE OF DAMAGES IS EXPRESSLY HEREIN PROVIDED, THE OBLIGOR'S LIABILITY SHALL BE LIMITED TO DIRECT ACTUAL DAMAGES ONLY, SUCH DIRECT ACTUAL DAMAGES SHALL BE THE SOLE AND EXCLUSIVE REMEDY AND ALL OTHER REMEDIES OR DAMAGES AT LAW OR IN EQUITY ARE WAIVED. UNLESS EXPRESSLY HEREIN PROVIDED, NEITHER PARTY SHALL BE LIABLE FOR CONSEQUENTIAL, INCIDENTAL, PUNITIVE, EXEMPLARY OR INDIRECT DAMAGES, LOST PROFITS OR OTHER BUSINESS INTERRUPTION DAMAGES, BY STATUTE, IN TORT OR CONTRACT,

UNDER ANY INDEMNITY PROVISION OR OTHERWISE (EXCEPT TO THE EXTENT THAT AN INDEMNIFYING PARTY PURSUANT TO THE PROVISIONS OF ARTICLE XV HEREOF IS OBLIGATED TO INDEMNIFY AGAINST THIRD PARTY CLAIMS NOT ARISING OUT OF CONTRACTS WITH THE INDEMNIFIED PARTY FOR CONSEQUENTIAL, INCIDENTAL, PUNITIVE, EXEMPLARY OR INDIRECT DAMAGES OR LOST PROFITS OR BUSINESS INTERRUPTION DAMAGES). IT IS THE INTENT OF THE PARTIES THAT THE LIMITATIONS HEREIN IMPOSED ON REMEDIES AND THE MEASURE OF DAMAGES BE WITHOUT REGARD TO THE CAUSE OR CAUSES RELATED THERETO, INCLUDING THE NEGLIGENCE OF ANY PARTY, WHETHER SUCH NEGLIGENCE BE SOLE, JOINT OR CONCURRENT, OR ACTIVE OR PASSIVE. TO THE EXTENT ANY DAMAGES REQUIRED TO BE PAID HEREUNDER ARE LIQUIDATED, THE PARTIES ACKNOWLEDGE THAT THE DAMAGES ARE DIFFICULT OR IMPOSSIBLE TO DETERMINE, OTHERWISE OBTAINING AN ADEQUATE REMEDY IS INCONVENIENT AND THE LIQUIDATED DAMAGES CONSTITUTE A REASONABLE APPROXIMATION OF THE HARM OR LOSS. THE PROVISIONS OF THIS SECTION 14.1 SHALL SURVIVE THE TERMINATION OR EXPIRATION OF THIS AGREEMENT.

14.2 No Duty. Nothing in this Agreement shall be construed to create any duty, standard of care or liability to any Person not a Party to this Agreement.

ARTICLE XV INDEMNITY

- 15.1 In General. (a) Subject to the provisions of Section 15.3 hereof and to the further application of the provisions of Section 15.2 to matters relating to the Environment or Regulated Materials, each Party shall indemnify, hold harmless and defend the other Party, its Affiliates, directors, officers, partners, agents and employees from and against any and all loss, liability, damage, cost or expense, including damage and liability for bodily injury to or death of third Persons or damage to property of third Persons (collectively, "Loss"), to the extent arising out of, in connection with or resulting from the indemnifying Party's breach of any of the representations or warranties made in, or the indemnifying Party's failure to perform any of its obligations under, this Agreement, or the indemnifying Party's design, installation, construction, ownership, operation, repair, relocation, replacement, removal or maintenance of, or the failure of, any of such Party's equipment and/or facilities, including, but not limited to, the Facilities and any natural gas or oil facilities, and/or any appurtenances thereto, and any electric transmission facilities used in connection with this Agreement, and regardless whether arising under applicable law, rule or regulation or otherwise; provided, however, that neither Party shall have any indemnification obligations hereunder or under Section 15.2 in respect of any Loss to the extent caused by such other Party's gross negligence, bad faith or willful misconduct.
- (b) Promptly after receipt by either Party of any claim or notice of the commencement of any action or administrative or legal proceeding or investigation as to which the indemnity provided for in Section 15.1(a) or Section 15.2 may apply, such Party shall notify the indemnifying Party of such fact. The indemnifying Party shall have the right to assume the

defense thereof with counsel designated by such indemnifying Party and reasonably satisfactory to the indemnified Party; provided, however, that if the defendants in any such action include both the indemnified Party and the indemnifying Party and the indemnified Party shall have reasonably concluded that there may be legal defenses available to it and/or other indemnified Parties which are different from or additional to those available to the indemnifying Party, the indemnified Party or Parties shall have the right to select separate counsel to assert such legal defenses and to otherwise participate in the defense of such action on behalf of such indemnified Party or parties; provided, further if the claim is one that cannot by its nature be defended solely by the indemnifying Party, the indemnified Party shall make available all information and assistance as the indemnifying Party may reasonably request at the expense of the indemnifying Party. The indemnified Party shall be entitled, at its expense, to participate in any action, suit or proceeding, the defense of which has been assumed by the indemnifying Party. Notwithstanding the foregoing, the indemnifying Party shall not be entitled to assume and control the defense of any such action, suit or proceedings if and to the extend that, in the opinion of the indemnified Party and its counsel, such action, suit or proceeding involves the potential imposition of criminal liability on the indemnified Party or a conflict of interest between the indemnified Party and the indemnifying Party, and in such event the indemnifying Party shall pay the reasonable expenses of the indemnified Party in such defense.

- (c) Should any indemnified Party be entitled to indemnification under this Article XV as a result of a claim by a third party, and should the indemnifying Party fail to assume the defense of such claim, such indemnified Party may at the expense of the indemnifying Party contest (or, with the prior consent of the indemnifying Party, settle) such claim; provided, however, that no such contest need be made, and settlement or full payment of any such claim may be made without the consent of the indemnifying Party (with the indemnifying Party remaining obligated to indemnify such indemnified Party under this Article XV), if an Event of Default as to the indemnifying Party exists or if, in the opinion of such indemnified Party's counsel, such claim is meritorious or the defendant has no valid defense to such claim.
- (d) In the event that an indemnifying Party is obligated to indemnify and hold any indemnified Party harmless under this Article XV, the amount owing to the indemnified Party shall be the amount of such indemnified Party's actual Loss, net of any insurance or other recovery.
- 15.2 Environmental Indemnity. Subject to the terms and provisions of this indemnity and the provisions of Sections 15.1(b), (c) and (d) the AES Subsidiaries shall protect, defend, indemnify and save harmless WESCO, its officers, directors, shareholders, agents, employees, successors, assigns and attorneys (collectively, the "Indemnified Parties") from, against and in respect of, any and all losses, costs, damages, liabilities, obligations, claims, causes of action, fines, penalties or expenses (including reasonable attorney's fees, expenses and litigation costs and sums paid in settlements of claims and any such fees and expenses incurred in enforcing this indemnity or collecting any sums due hereunder) and reasonable expenses for accounting, consulting, engineering, investigation, cleanup, response, removal and/or disposal and other remedial costs, directly or indirectly imposed upon, incurred by or asserted against any Indemnified Party arising out of or in connection with any claim or claims by any other party or parties (including, without limitation, a governmental entity), arising out of or in connection with

- (i) the use, generation, refining, manufacture, transportation, transfer, production, processing, storage, handling, or treatment of any Regulated Materials, on, under or from the Facilities; (ii) a Release, or threatened Release of any Regulated Materials on, under or from the Facilities: (iii) the cleanup, removal and/or disposal of any Regulated Materials on, under or from the Facilities required by any Environmental Law or any Governmental Authority; (iv) any personal exposure or injury (including wrongful death) or property damage (real or personal) arising out of or related to such Regulated Materials, including any damage arising out of any cleanup required by the Governmental Authorities or Environmental Laws; (v) any lawsuit brought or threatened. settlement reached, or government order relating to such Regulated Materials; or (vi) any violation of laws, orders, rules, regulations, requirements, guidelines, or demands of Governmental Authorities, including permits and licenses under Environmental Laws, which are based upon or in any way related to such Regulated Materials including, without limitation, the costs and expenses of any remedial action, reasonable attorney and consultant fees, investigation and laboratory fees, court costs and litigation expenses; or (vii) a misrepresentation or inaccuracy in any representation or warranty made by the AES Subsidiaries in Section 13.1(g) of this Agreement or a breach of or failure to perform any covenant made by the AES Subsidiaries in Section 13.1(h) of this Agreement.
- 15.3 <u>Scope</u>. The indemnities in Section 15.1 and Section 15.2 shall apply to all claims against each Party including, but not limited to, all claims made or threatened by, or in the name of or on behalf of each Party's employees for personal injuries (including death) which arise in the course of their employment. Each of the AES Subsidiaries hereby waives any defense it may otherwise have under applicable workers' compensation laws.
- 15.4 <u>Survival</u>. The Parties expressly acknowledge and agree that this Article XV shall survive the termination or expiration of this Agreement.

ARTICLE XVI INSURANCE

- 16.1 Obligation to Insure. The AES Subsidiaries shall at their own cost and expense effect, maintain and keep in force or cause to be effected, maintained and kept in force during the term of this Agreement with companies rated 'A' or better by A.M. Best & Co. (or if not rated by A.M. Best & Co., reasonably acceptable to WESCO) the minimum insurance coverage for the Facilities set forth in Schedule 16 hereto.
- 16.2 Additional Insured, Etc. All insurance policies identified in this Article XVI and in Schedule 16 hereto (other than Workers Compensation Insurance) shall name WESCO as an additional insured. The AES Subsidiaries' casualty insurance (other than its Worker's Compensation insurance) shall include provisions or endorsements (a) stating that such insurance is primary insurance with respect to the interest of WESCO and that any insurance maintained by WESCO is excess and not contributory insurance with the insurance required hereunder, and (b) providing that such policies shall not be canceled or their limits of liability reduced, other than by the occurrence of a claim, except upon sixty (60) days (ten (10) days for nonpayment of premium) Notice to WESCO.

- 16.3 <u>Certificates</u>. On or prior to the Effective Date, the AES Subsidiaries shall provide and shall continue to provide to WESCO during the term of this Agreement (including any extension), by delivering to its corporate office at One Williams Center, Tulsa, Oklahoma 74172, properly executed and current certificates of insurance relative to said insurance policies. Said certificates shall provide the following information:
- (a) Name of insurance company, policy number and expiration date, and the name, address and telephone number of the agent/broker issuing said certificate of insurance;
- (b) The coverage required and the limits on each, including the amount of deductibles or self-insured retentions, which shall be for the account of the AES Subsidiaries;
- (c) A statement indicating that WESCO shall receive at least sixty (60) days (ten (10) days for nonpayment of premium) Notice of cancellation or reduction of liability limits, other than by the occurrence of a claim, with respect to said insurance policies; and
- (d) For all insurance policies identified in Schedule 16 hereto, except workers' compensation insurance, a statement indicating that WESCO has been named as an additional insured.
- 16.4 Inspection. WESCO shall have the right to inspect the original policies of insurance applicable to this Agreement at the AES Subsidiaries' place of business during regular business hours by providing the AES Subsidiaries with fifteen (15) days Notice of its inspection.

ARTICLE XVII UNCONTROLLABLE FORCE

- 17.1 <u>Performance Excused</u>. No Party shall be considered to be in default in performance of any of its obligations under this Agreement, except to make payment as specified herein, to the extent such failure in performance shall be due to an Uncontrollable Force. No Party shall, however, be relieved of liability for failure of performance to the extent such failure shall be due to causes arising out of its own negligence or due to removable or remediable causes which it fails to remove or remedy within a reasonable time period. Any Party rendered unable to fulfill any of its obligations under the Agreement by reason of an Uncontrollable Force shall give prompt Notice of such fact to the other Parties and shall exercise due diligence to remove such inability within a reasonable time period.
- 17.2 Exclusions. (a) Notwithstanding anything to the contrary contained in this Agreement, except as may expressly be provided herein, the term Uncontrollable Force shall not include or excuse the loss by WESCO of FERC-approved marketer status, unless such loss is itself caused by an Uncontrollable Force.
- (b) Notwithstanding anything to the contrary in this Agreement, failure by the AES Subsidiaries to achieve the Guaranteed Availability of any Unit or to deliver the Dependable Capacity, Net Electric Energy or Ancillary Services, as the case may be, from a Dispatched

Available Unit shall not be excused due to an Uncontrollable Force.

- 17.3 Labor Disputes. Notwithstanding anything contained in this Article XVII to the contrary, neither Party shall be required to settle any strike, walkout, lockout or other labor dispute on terms which, in the sole judgment of the Party involved in the dispute, are contrary to its interest, it being understood and agreed that the settlement of strikes, walkouts, lockouts or other labor disputes shall be entirely within the discretion of the Party having such dispute.
- 17.4 Termination. Notwithstanding anything contained in this Article XVII to the contrary, either Party shall have the right to terminate this Agreement, in whole or in part, without any liability or responsibility whatsoever, except to the extent accruing (and not excused) prior to such termination, in the event and to the extent an Uncontrollable Force has been declared by the other Party to excuse such other Party's nonperformance of its obligations hereunder or in an event of default in respect of such other Party, and the effect of said Uncontrollable Force has not been fully corrected or alleviated within twelve months after the date said Uncontrollable Force was declared.

ARTICLE XVIII EVENTS OF DEFAULT; REMEDIES

- 18.1 Events of Default. The following shall constitute events of default in respect of a Party (the "Defaulting Party") under this Agreement:
- (a) failure by the Defaulting Party to make, when due, any payment required pursuant to this Agreement, provided the payment is not subject of a good faith dispute as described in Section 10.1,
- (b) any representation or warranty herein made by the Defaulting Party shall at any time be false or misleading,
- (c) failure by the Defaulting Party to perform any other obligation to the other Party (the "Non-Defaulting Party") set forth in this Agreement (other than the failure of a Unit to Dispatch in accordance with Article VIII or the failure to achieve Guaranteed Availability pursuant to Section 4.2, if the Non-Defaulting Party is able to recover fully all amounts due it pursuant to Section 4.3 or Section 8.6 as a result of either such failure through the exercise of its right of set off provided for in Section 18.2(d), in which case, notwithstanding any provision of Article XVII or this Article XVIII, such right of set-off shall be the Non-Defaulting Party's exclusive remedy),
- (d) the Guarantor of the Defaulting Party shall fail to perform any covenant set forth in the guaranty agreement it delivered in respect of this Agreement, any representation or warranty made by such Guarantor in said guaranty agreement shall be false or misleading when made or when deemed to be repeated, the guaranty agreement shall expire or be terminated or shall in any way cease to guaranty the obligations of the Defaulting Party under this Agreement, or such Guarantor shall take or suffer any actions set forth in clauses (e) or (f) below as applied to it.

- (e) a receiver or liquidator or trustee of either Party or of any of its property shall be appointed by a court of competent jurisdiction, and such receiver, liquidator or trustee shall not have been discharged within sixty (60) days or by decree of such a court a Party shall be adjudicated bankrupt or insolvent or any substantial part of its property shall have been sequestered, and such decree shall have continued undischarged and unstayed for a period of sixty (60) days after the entry thereof, or a petition to declare bankruptcy or to reorganize a Party pursuant to any of the provisions of the Federal Bankruptcy Code, as now in effect or as it may hereafter be amended, or pursuant to any other similar state statute as now or hereafter in effect, shall be filed against a Party and shall not be dismissed within sixty (60) days after such filing,
- (f) a Party shall file a voluntary petition in bankruptcy under any provision of any federal or state bankruptcy law or shall consent to the filing of any bankruptcy or reorganization petition against it under any similar law; or, without limiting the generality of the foregoing, a Party shall file a petition or answer or consent seeking relief or assisting in seeking relief in a bankruptcy under any provision of any federal or state bankruptcy law or shall consent to the filing of any bankruptcy or reorganization petition against it under any similar law; or, without limiting the generality of the foregoing, a Party shall file a petition or answer or consent seeking relief or assisting in seeking relief in a proceeding under any of the provisions of the Federal Bankruptcy Code, as now in effect or as it may hereafter be amended, or pursuant to any other similar state statute as now or hereafter in effect, or an answer admitting the material allegations of a petition filed against if in such a proceeding; or a Party shall make an assignment for the benefit of its creditors; or a Party shall submit in writing its inability to pay its debts generally as they become due; or a Party shall consent to the appointment of a receiver, trustee, or liquidator of it or of all or any part of its property,
- (g) there shall be outstanding for more than sixty (60) days any unsatisfied final, non-appealable judgment against the Defaulting Party in an amount exceeding \$500,000, unless the existence of such unsatisfied judgment shall not affect in any material respect the Defaulting Party's ability to perform its obligations hereunder or present any material risk that the Defaulting Party might suffer an interruption in its ownership or possession and the right to use those of its assets necessary to perform its obligations hereunder,
- (h) The AES Corporation shall cease to own, directly or indirectly, beneficially and of record, more than 50% of the equity interests in any of the AES Subsidiaries, or shall cease to possess the power to elect a majority of the directors of, or Persons performing similar functions for, any of the AES Subsidiaries, or shall cease to possess the power to direct or cause the direction of the management or policies of any of the AES Subsidiaries, or any Person engaged in any business engaged in by WESCO or any of its Affiliates shall own, directly or indirectly, beneficially or of record, any of the equity interests in any of the AES Subsidiaries,
- (i) there shall have occurred and be continuing any event of default under, and as defined in, the other material Project Documents, to the extent, but only to the extent, a default thereunder constitutes an event of default under the Credit Agreement.
- 18.2 <u>Remedies</u>. (a) Upon the occurrence of any Event of Default described in Section 18.1 (other than an Event of Default under Section 18.1(d) as it relates to the taking or suffering

by a Guarantor any of the actions set forth in Section 18.1(e) or Section 18.1(f), Section 18.1(e), Section 18.1(f), Section 18.1(h) or resulting from the breach of Section 13.1(l), for which no notice shall be required or opportunity to cure permitted) the Non-Defaulting Party, to the extent such Party has actual knowledge of the occurrence of such Event of Default, shall give prompt Notice thereof to the Defaulting Party. Such Notice shall set forth, in reasonable detail, the nature of the default and, where known and applicable, the steps necessary to cure such default. The Defaulting Party shall have the lesser of (i) 60 days or (ii) the number of days in the generally applicable cure period provision in the Credit Agreement (fifteen (15) days in the case of an Event of Default described in Section 18.1(a) and three (3) Business Days in the case of a breach of the provisions of Article II or Article XVI) following receipt of such Notice to cure such default.

- (b) If the Defaulting Party fails to cure such default or take such steps as provided under subparagraph (a) above, and immediately upon the occurrence of any Event of Default described in Section 18.1(d) as it relates to the taking or suffering by a Guarantor any of the actions set forth in Section 18.1(e) or Section 18.1(f), Section 18.1(e), Section 18.1(f), Section 18.1(h) or resulting from the breach of Section 13.1(l), this Agreement may be terminated by the Non-Defaulting Party, without any liability or responsibility whatsoever, by written Notice to the Defaulting Party. This Agreement shall thereupon terminate and the Non-Defaulting Party may exercise all such rights and remedies as may be available to it to recover damages caused by such default.
- (c) In addition to the foregoing, upon the occurrence of any Event of Default and the expiration of any applicable cure period, the Non-Defaulting Party shall be entitled to (i) commence an action to require the Defaulting Party to remedy such default and specifically perform its duties and obligations hereunder in accordance with the terms and conditions hereof and (ii) exercise such other rights and remedies as it may have in equity or at law.
- (d) Notwithstanding the foregoing and in addition to all of rights and remedies in equity or at law, either Party shall be entitled to set off against any amounts due and payable by either Party to the other Party, any and all amounts due and payable to such party from the other Party Subsidiaries.
- affected due to an Uncontrollable Force, and Such Unit shall be completely incapable of operating for a period of three (3) consecutive months and the AES Subsidiaries shall have reasonably determined that such Unit or Units cannot be economically repaired, then the AES Subsidiaries shall have the right at any time during a twelve month period thereafter upon reasonable Notice to WESCO, to pay WESCO the Buyout Price in respect of such Unit or Units. Upon payment of the Buyout Price by the AES Subsidiaries to WESCO, the affected Unit or Units shall be automatically and without further action of the Parties excluded from the terms of this Agreement, and neither WESCO nor the AES Subsidiaries shall have any further liability or obligation to the other in respect of such Unit or Units, except for obligations or liabilities accrued prior to the date of such payment. The term "Buyout Price" means, when such payment is made prior to the tenth (10th) Contract Anniversary Date, 15% of the net present value (determined on the basis of a 12% discount factor and semi-annual compounding) of the Fixed Payments that would have been payable in respect of such Unit or Units after the date such payment is made, and when such

payment is made on or after the tenth (10th) Contract Anniversary Date, 25% of the net present value (determined on the basis of a 12% discount factor and semi-annual compounding) of the Fixed Payments that would have been payable in respect of such Unit or Units after the date such payment is made.

18.4 Special Termination Right. If (i) WESCO shall not by May 15, 1998 have determined the Credit Agreement (as then drafted) to be reasonably acceptable to it, or (ii) WESCO shall not, acting reasonably, by such date have agreed to a form of consent to the assignment of this Agreement to the initial Lenders pursuant to Section 20.1, then the AES Subsidiaries may by Notice to WESCO within ten (10) days immediately terminate this Agreement, whereupon the Parties shall have no further liability or obligation to each other hereunder, except for obligations or duties that occurred prior to such termination.

ARTICLE XIX GUARANTIES

- 19.1 Williams Holdings Guaranty. On or prior to the Effective Date, WESCO shall deliver to the AES Subsidiaries the Williams Holdings Guaranty.
- 19.2 AES Guaranty. On or prior to the Effective Date, the AES Subsidiaries shall deliver to WESCO the AES Guaranty.

ARTICLE XX ASSIGNMENT

20.1 Assignment. (a) Neither this Agreement nor any rights, duties, interests or obligations hereunder may be assigned, transferred, pledged or otherwise encumbered or disposed of, by operation of law or otherwise, by the AES Subsidiaries or by WESCO without the prior written consent of the other Party; except that (i) WESCO at any time and from time to time, may assign this Agreement and any of its rights, interests, duties or obligations hereunder to (A) any Affiliate of WESCO, so long as (x) such Affiliate's creditworthiness is comparable to that of WESCO on the Effective Date, (y) such Affiliate possess comparable ability to perform the obligations of WESCO under this Agreement and (z) the Williams Holdings Guaranty shall be simultaneously amended and extended to guarantee the affiliated assignee's obligations hereunder to the same extent as WESCO's obligations hereunder are guaranteed by the Williams Holdings Guaranty, or (B) any Person reasonably acceptable to the AES Subsidiaries, provided that such Person's (and, if applicable, such Person's guarantor's) long term unsecured debt at the time of such assignment has a credit quality and a credit rating, respectively, not lower than that of WESCO and Williams Holdings, respectively, on the Effective Date and (ii) the AES Subsidiaries, at any time, and from time to time, after reasonable advance Notice to WESCO and without the consent of WESCO, may assign this Agreement and any of their rights, interests, duties or obligations hereunder as collateral security to any Lender (A) so long as the assignee shall agree, pursuant to a written consent to assignment in form and substance satisfactory to WESCO, or (B) in connection with any refinancing or additional indebtedness permitted pursuant to the provisions of Section 13.1(m) so long as the assignee shall agree, pursuant to an assignment in the same form executed and delivered by the Lenders party to the Credit Agreement (unless as a result, in light of the events of default and remedies and additional Lender cure rights provided for in the documentation governing such refinancing or additional indebtedness, WESCO's abillity to exercise its rights or remedies under the Tolling Agreement shall be adversely affected, compared to its position prior to such refinancing or incurrence of additional indebtedness), that it or its designees to be bound by all of the terms and conditions hereof to the same extent as the AES Subsidiaries in the event the Lender exercises its rights under such assignment.

- (b) Upon any assignment by WESCO in accordance with the provisions of Section 20.1(a)(i), WESCO shall be relieved of and released from its obligations under this Agreement. No assignment or disposition of this Agreement or rights hereunder shall (i) relieve or in any way discharge any of the AES Subsidiaries from the performance of their respective duties and obligations under this Agreement or (ii) alter, amend, diminish or otherwise impair WESCO's or the AES Subsidiaries' rights under this Agreement.
- 20.2 Facilities. Each of the AES Subsidiaries hereby agrees that it shall not sell, transfer, assign, lease or otherwise dispose of the Facilities or any portion thereof or interest therein necessary to perform the AES Subsidiaries' obligations hereunder without the prior written consent of WESCO, such consent shall not be unreasonably withheld...
- 20.3 Non-complying Transfers Void. Except as specifically provided for in this Article XX, any assignment or transfer of this Agreement or any rights, duties or interests hereunder or any disposition of the Facilities or any portion thereof or interest therein by any Party without the written consent of the other Party shall be void and of no force or effect.

ARTICLE XXI NOTICES

All notices (other than Dispatch Notices), demands or requests required or permitted under this Agreement shall be in writing and shall be personally delivered or sent by certified United States mail (postage prepaid, return receipt requested), overnight express mail, courier service or facsimile transmission (with the original transmitted by any of the other aforementioned delivery methods) addressed as follows:

If to the AES Subsidiaries to:

The AES Corporation 1001 North 19th Street Arlington, VA 22209

Attention: General Counsel Telephone: 703-522-1315
Fax: 703-528-4810

and

If to WESCO to:

Williams Energy Services Company

One Williams Center, Suite 1800

Tulsa, OK 74172

Attention: Contract Management

Fax: 918-594-1935

with a copy to:

Williams Holdings of Delaware, Inc. One Williams Center, Suite 4000

Tulsa, OK 74172

Attention: General Counsel

(Fax) 800-479-6690

and

Jones, Day, Reavis & Pogue 599 Lexington Avenue New York, New York 10022

Attention: William F. Henze II (Fax) 212-755-7306

or to such other Person at such other address as a Party shall designate by like notice to the other Party.

Unless otherwise provided herein, all notices hereunder shall be effective at the close of business on the day actually received, if received during business hours on a Business Day, and otherwise shall be effective at the close of business on the first Business Day after the day on which received.

ARTICLE XXII CONDITIONS

- 22.1 WESCO's Conditions. The obligations of WESCO to consummate the transactions contemplated by this Agreement shall be subject to fulfillment at or prior to the Effective Date of the following conditions, unless waived in writing by WESCO.
- (a) The AES Subsidiaries shall have performed in all material respects their agreements and obligations contained in this Agreement required to be performed on or prior to the Effective Date.
- (b) The representations and warranties of the AES Subsidiaries set forth in Article XIII of this Agreement shall be true and correct as of the date of this Agreement and as of the Effective Date as if made as of such time.

(c) WESCO shall have received from the AES Subsidiaries an officers' certificate executed on behalf of each of the AES Subsidiaries dated the date of the Effective Date stating that all conditions set forth in Section 22.2 have been satisfied or waived

(d) There shall be no:

- (i) injunction, restraining order or order of any nature issued by any court of competent jurisdiction or Governmental Authority which directs that the transactions contemplated hereby shall not be consummated as herein provided or compels or would compel the AES Subsidiaries to dispose of or discontinue, or materially restrict the operations of, a Unit or any significant portion of the Facilities as a result of the consummation of the transactions contemplated hereby;
- (ii) suit, action or other proceeding by or before any Governmental Authority pending or threatened (pursuant to a written notification), wherein a complainant seeks the restraint or prohibition of the consummation of the transactions contemplated by this Agreement or seeks to compel, or such complainant's actions would compel, the AES Subsidiaries to dispose of or discontinue, or materially restrict the operations of, a Unit or any significant portion of the Facilities as a result of the consummation of the transactions contemplated hereby; or
- (iii) action taken, or law enacted, promulgated or deemed applicable to the transactions related to a Unit by any Governmental Authority which would render the transactions contemplated by this Agreement illegal or which would threaten the imposition of any penalty or material economic detriment upon WESCO if such transactions were consummated.
- (e) The sale of each of the Facilities (the "Sale") from Edison to The AES Corporation (or its Affiliates) pursuant to the Asset Sale Agreements shall have been consummated and none of the Conditions to closing contained therein shall have been waived.
- (f) Each of the AES Subsidiaries shall have received all Approvals necessary to be obtained as of the Effective Date.
 - (g) If any Unit is the subject of a MRA, then the following shall have occurred:
 - (i) FERC shall have made effective the MRA associated with such Unit; and
- (ii) With the approval of the ISO, the AES Subsidiaries and WESCO shall have entered into the arrangements satisfactory to WESCO relating to the assignment to WESCO of the MRAs.
- (h) The California Power Exchange shall have begun accepting load and resource bids, developed a balanced schedule that is accepted by the ISO and posted market clearing prices for the purchase of electrical energy.
- (i) WESCO shall have received copies of municipal exemption letters obtained by the AES Subsidiaries from each of the municipalities in which the Facilities are located.

- (j) the AES Subsidiaries and WESCO shall have entered into arrangements satisfactory to WESCO relating to the assignment to WESCO of the Mobil Contract.
- (k) WESCO shall have received a reliance letter from Woodward Clyde in form and substance satisfactory to WESCO.
 - (I) The Credit Agreement shall be reasonably acceptable to WESCO.
- (m) In the event that any of the foregoing conditions to the obligations of WESCO shall fail to be satisfied, WESCO may elect, in its sole discretion, to consummate the transactions contemplated by this Agreement despite such failure, in which event WESCO shall be deemed to have waived any claim for damages, losses or other relief arising from or in connection with such failure, unless otherwise agreed in a writing executed by the Parties.
- 22.2 The AES Subsidiaries' Conditions. The obligations of the AES Subsidiaries to consummate the transactions contemplated by this Agreement shall be subject to fulfillment at or prior to the Effective Date of the following conditions, unless waived in writing by the AES Subsidiaries:
- (a) WESCO shall have performed in all material respects its agreements and obligations contained in this Agreement required to be performed on or prior to the Effective Date.
- (b) The representations and warranties of WESCO set forth in Article XII of this Agreement shall be true and correct as of the date of this Agreement and as of the Effective Date as if made as of such time and
- (c) The AES Subsidiaries shall have received from WESCO an officers' certificate executed on behalf WESCO dated the date of the Effective Date stating that all conditions set forth in Section 22.1 have been satisfied or waived.

(d) There shall be no:

- (i) injunction, restraining order or order of any nature issued by any court of competent jurisdiction or Governmental Authority which directs that the transactions contemplated hereby shall not be consummated as herein provided or compels or would compel the AES Subsidiaries to dispose of or discontinue, or materially restrict the operations of, a Unit or any significant portion of the Facilities as a result of the consummation of the transactions contemplated hereby;
- (ii) suit, action or other proceeding by or before any Governmental Authority pending or threatened (pursuant to a written notification), wherein a complainant seeks the restraint or prohibition of the consummation of the transactions contemplated by this Agreement or seeks to compel, or such complainant's actions would compel, the AES Subsidiaries to dispose of or discontinue, or materially restrict the operations of, a Unit or any significant portion of the Facilities as a result of the consummation of the transactions contemplated hereby; or

- (iii) action taken, or law enacted, promulgated or deemed applicable to the transactions related to a Unit by any governmental body which would render the transactions contemplated by this Agreement illegal or which would threaten the imposition of any penalty or material economic detriment upon the AES Subsidiaries if such transactions were consummated;
 - (e) The Sale shall have been consummated.
- (f) WESCO shall have received all Approvals necessary to be obtained as of the Effective Date.
- (g) In the event that any of the foregoing conditions to the obligations of the AES Subsidiaries shall fail to be satisfied, the AES Subsidiaries may elect, in their sole discretion, to consummate the transactions contemplated by this Agreement despite such failure, in which event the AES Subsidiaries shall be deemed to have waived any claim for damages, losses or other relief arising from or in connection with such failure, unless otherwise agreed in a writing executed by the Parties.

ARTICLE XXIII MISCELLANEOUS PROVISIONS

- 23.1 <u>Survival</u>. The provisions of Articles XI, XII and XV and Sections 8.8, 23.5, 23.10 and 23.16, including the rights and obligations of the Parties therein provided, shall survive the termination or expiration of this Agreement and the performance by the Parties of their obligations hereunder.
- 23.2 Expenses. (a) Whether or not the transactions contemplated by this Agreement are consummated, each Party shall pay all of its own costs and expenses incurred in connection with the negotiation and execution of this Agreement.
- (b) Each Party shall reimburse the other for the reasonable costs and expenses (including reasonable legal fees and expenses) incurred in connection with such other Party's agreement to review, execute and deliver any instruments, agreements or documents that may be necessary or appropriate in connection with any assignment requested by a Party or otherwise permitted hereunder.
- 23.3 No Third-Party Beneficiaries. This Agreement is not intended to, and does not, confer upon any Person other than the Parties hereto and their respective successors and permitted assigns, any rights or remedies hereunder.
- 23.4 Announcements. Except as otherwise required by law or the rules of the New York Stock Exchange, for so long as this Agreement is in effect, neither the AES Subsidiaries nor WESCO shall, nor shall they permit any of their Affiliates to, issue or cause the publication of any press release or other public announcement with respect to the transactions contemplated by this Agreement without the consent of the other Party, which consent shall not be unreasonably withheld or delayed.

- 23.5 Gonfidentiality. The Parties agree that all information relating to this Agreement and the transactions contemplated hereby shall be kept confidential. Such obligation of confidentiality shall extend to all such information, whether exchanged orally or in written or electronic form, and whether or not designated at the time exchanged as confidential. Each Party shall be permitted to disclose confidential information to its officers, directors, employees, agents and Affiliates who need to know such information for the purpose of implementing this Agreement or the transactions contemplated hereby, and agrees to notify such Persons of the confidential nature of such information and to be responsible for any unauthorized disclosure of such information by such Persons. The AES Subsidiaries shall be permitted to disclose confidential information to those of its Lenders and prospective Lenders executing a confidentiality agreement in form and substance reasonably satisfactory to WESCO. Information shall not be deemed to be confidential if it (i) was in the public domain prior to the date hereof, (ii) becomes publicly available after the date hereof other than as a result of the unauthorized disclosure thereof by a Party or by an officer, director, employee, agent or Affiliate of a Party, or (iii) is required to be disclosed pursuant to applicable laws or regulations or pursuant to administrative or judicial process.
- 23.6 Scheduling Coordinator. WESCO shall perform the function of Scheduling Coordinator (as defined in the MRAs). Irrespective of any contrary provision hereof, without the consent of the AES Subsidiaries WESCO may subcontract its duties pursuant to this Section 23.6 to any assignee permitted under the MRAs provided that it first offer to subcontract such position to the AES Subsidiaries.
- 23.7 Acquisition of Facilities. WESCO shall make commercially reasonable efforts to assist the AES Subsidiaries in (a) achieving the closing of the financing arrangements relating to the acquisition of the Facilities by the AES Subsidiaries and (b) if necessary, the refinancing of the Facilities; provided, however, that the AES Subsidiaries shall pay all out-of-pocket costs and expenses (including, without limitation, attorneys' fees) incurred by WESCO in the course of any such refinancing.
- 23.8 <u>Captions</u>. All indices, titles, subject headings, section titles and similar items in this Agreement are provided for the purpose of reference and convenience only and are not intended to be inclusive or definitive or to affect the meaning of the contents or scope of this Agreement.
- 23.9 <u>Waiver</u>. Any waiver at any time by either Party of its rights, duties, and/or obligations with respect to any default under this Agreement, or with respect to any other matter arising out of or in connection with this Agreement, shall not be deemed a continuing waiver nor a waiver with respect to any subsequent default or other matter.
- 23.10 <u>Choice of Laws</u>. This Agreement shall be governed, by and construed and interpreted in accordance with the laws of the State of New York, irrespective of the application of any conflict of laws provisions.
- 23.11 Successors and Assigns. This Agreement shall inure to the benefit of and be binding upon WESCO and the AES Subsidiaries and their respective successors and permitted assigns.

- 23.12 <u>Counterparts</u>. This Agreement may be executed in separate counterparts by the Parties hereto, each of which when so executed and delivered shall be an original, but all of which shall constitute one and the same instrument.
- 23.13 Entire Agreement. This Agreement, including all Schedules hereto, constitutes the entire agreement between the Parties hereto with respect to the matters contained herein and therein, and all prior agreements with respect to the matters covered herein are superseded, and each Party confirms that it is not relying upon any representations or warranties of the other Party, except as specifically set forth herein or incorporated by reference hereto.
- 23.14 <u>Severability</u>. Should any provision of this Agreement be held to be invalid or unenforceable, such provision shall be invalid or unenforceable only to the extent of such invalidity or unenforceability without invalidating or rendering unenforceable any other provision hereof.
- 23.15 Amendment. This Agreement may not be amended or modified except by a written instrument signed by each of the Parties hereto.
- 23.16 <u>Submission to Jurisdiction: Waivers</u>. Each of the Parties hereby irrevocably and unconditionally:
- (a) submits for itself and its property in any legal action or proceeding relating to this Agreement, or for recognition and enforcement of any judgment in respect thereof, to the exclusive general jurisdiction of the Courts of the State of New York, the courts of the United States for the Southern District of New York, and appellate courts from any thereof;
- (b) consents and agrees that any such action or proceeding may be brought in and only in such courts and waives any objection that it may now or hereafter have to the venue of any such action or proceeding in any such court or that such action or proceeding was brought in an inconvenient court and agrees not to plead or claim the same;
- (c) agrees that service of process in any such action or proceeding may be effected by mailing a copy thereof by registered or certified mail (or any substantially similar form of mail), postage prepaid, to the other Party at its address set forth in Article XXI, or at such other address of which the other Party shall have been notified pursuant thereto; and
- (d) agrees that nothing herein shall affect the right to effect service of process in any other manner permitted by law.

IN WITNESS WHEREOF, the Parties hereto have caused this Agreement to be executed by their duly authorized representatives as of the date first set forth above.

WILLIAMS	ENERGY SERVICES COMPANY	
By: \	un forkaly	(
Name:	0	_
Title:	Bruce A. Sukaly Vice President	
AES REDO	NDO BEACH, L.L.C.	
Ву:	· 	
Name: Title:		_
AES ALAM	ITOS, L.L.C.	
Ву:		
Name: Title:		_
. 1 1116.	,	
AES HUNT	INGTON BEACH, L.L.C.	
Ву:		
Name: Title:		-
• • • •		:

IN WITNESS WHEREOF, the Parties hereto have caused this Agreement to be executed by their duly authorized representatives as of the date first set forth above.

		CES COMPANY
*	cut forks	
Name:	•	0
Title:	Bruce A. Sukal Vice President	y .
AES REDON	NDO BEACH, L.L	
Ву:		
Name:		
Title:		
AES ALAMI	ITOS, L.L.C.	
Name:		
Title:		
		•
•		
AES HUNT	INGTON BEACH	LL.C.
AES HUNT	INGTON BEACH	LL.C.
Ву:	INGTON BEACH	LL.C.
By: Name:	INGTON BEACH	, L.L.C.
	INGTON BEACH	, L.L.C.

IN WITNESS WHEREOF, the Parties hereto have caused this Agreement to be executed by their duly authorized representatives as of the date first set forth above.

Title:

WILLIAMS ENERGY SERVICES COMPANY

AS ITTIMES	13 ENERGY SERVICES COMPANY
Ву:	:
Name:	
Title:	•
•	
•	•
AES RED	ONDO BEACH, L.L.C.
Ву:	John Ruggell
- imite	TOTO MUGENERY
Title:	CHIEF EXCOUTINE MAKE AGEN
•	
AES ALA	MITOS, L.L.C.
Ву:	John Rugger
a varire.	VOHE RUGGEREDU
Title:	CHICF EXECUTIVE MANACET
AES HUN	TINGTON BEACH, L.L.C.

Schedule A

Description of Facilities - Huntington Beach

Facility:

Huntington Beach Generating Station 21730 Newland Street Huntington Beach, CA 92646

Unit	Description	Rating MW	Minimum Resp Load range MW	onse Rates Ramp Rate MWs/Minute	AGC Capable
HB 1	Conventional steam unit	215 MW	20 to 65 65 to 204 204 to 215	4.3* 4.3 1.1	NO YES YES
HB2	Conventional steam unit	215 MW	20 to 65 65 to 204	4.3* 4.3	NO YES
HB 5	Gas Combustion Turbine	133 MW	204 to 215 NA	1.1 13	YES NO

All gas burners are not in service in this load range and some deviation from this rate may occur while burners are placed in service.

Schedule A Description of Facilities – Redondo Beach

Facility:

Redondo Generating Station

1100 Harbor Blvd.

Redondo Beach, CA 90277

Unit .	Description	Rating MW	Minimum Respo Load range MW	onse Rates Ramp Rate MWs/Minute	AGC Capable
RB ⁻ 5	Conventional steam unit	175 MW	10 to 45 45 to 165 165 to 175	3.5* 3.5 0.9	NO YES YES
RB 6	Conventional steam unit	175 MW	10 to 45 45 to 165 165 to 175	3.5* 3.5 0.9	NO YES YES
RB 7	Super Critical steam unit	480 MW	130 to 180 180 to 240 240 to 470 470 to 480	2.4* 2.4** 4.8 2.4	NO YES YES YES
RB 8	Super Critical steam unit	480 MW	130 to 180 180 to 240 240 to 470 470 to 480	2.4* 2.4** 4.8 2.4	NO YES YES YES

Notes:

- All gas burners are not in service in this load range and some deviation from this rate may occur while burners are placed in service.
- In this load range, a second boiler feed pump must be placed into or removed from service depending on whether load is being increased or decreased. On increasing load, the second boiler feed pump must be warmed and placed into service at approximately 200 MWs. This process requires approximately 60 minutes advanced notice. On decreasing load, at approximately 220 MWs, the second boiler feed pump is removed from service, a process that requires approximately 15 minutes to achieve.

Schedule A Description of Facilities – Alamitos

Facility:

Alamitos Generating Station 690 North Studebaker Road Long Beach, CA 90803

Unit	Description	Rating	Minimum Res	ponse Rates	AGC Capable
		MW	Load range MW	Ramp Rate MWs/Minute	
AL 1	Conventional steam unit	175 MW	10 to 40	3.5*	NO
			40 to 165	3.5	
			165 to 175	0.9	YES YES
AL 2	Conventional steam unit	175 MW	10 to 40	3.5*	NO
			40 to 165	3.5	YES
	•	•	165 to 175	0.9	YES
AL 3	Conventional steam unit	320 MW	20 to 70	1.4	
		220 1:211	70 to 190	1.6*	NO
		•	190 to 310	1.6	YES
			310 to 320	6.4	YES
	-		510 10 320	2.6	YES
AL 4	Conventional steam unit	320 MW	20 to 70	1.6*	NO
· · ·		· · · .	70 to 190	. 1.6	YES
			190 to 310	6.4	YES
			310 to 320	2.6	YES
AL 5	Super Critical steam unit	480 MW	70 to 150	2.4**	NO
			150 to 240	2.4***	YES
		•	240 to 470	4.8	YES
			470 to 480	2.4	YES
ÄL 6	Super Critical steam unit	480 MW	70 to 150	2.4**	, NO
•			150 to 240	2.4***	YES
			240 to 470	4.8	YES
			470 to 480	2.4	YES
					1 523
AL 7	Gas Combustion Turbine	133 MW	NA	13	NO .
Notes					•

Notes:

All gas burners are not in service in this load range and some deviation from this rate may occur while burners are placed in service.

Loads at Units 5 and 6 can only be increased above 70 MWs continuously at a rate of approximately 5 MWs per minute, until load reaches 150 MWs. The Units cannot be dispatched for sustained operation above 70 and below 150 MWs.

In this load range, a second boiler feed pump must be placed into or removed from service depending on whether load is being increased or decreased. On increasing load, the second boiler feed pump must be warmed and placed into service at approximately 200 MWs. This process requires approximately 60 minutes advanced notice. On decreasing load, at approximately 220 MWs, the second boiler feed pump is removed from service, a process that requires approximately 15 minutes to achieve. Units 5 and 6 cannot be on AGC below 180 MWs.

Schedule B Delivery Points

Facility

Redondo Beach Generating Station

Net Electric Energy and Ancillary Services

Gas

Huntington Beach Generating Station-

Net Electric Energy and Ancillary Services

Gae

Alamitos Generating Station

Net Electric Energy and Ancillary Services

Gas

Delivery Point

At each unit's high side connection to the Redondo 230kV bus.

 The first flange downstream of the Southern California Gas Metering Station.
 The first flange downstream of the Mobil gas meter station.

At each unit's high side connection to the Ellis 230kV bus.

1. The first flange downstream of the Southern California Gas Metering Station.

At each unit's high side connection to the Alamitos 230kV bus.

- 1. The first flange downstream of the Southern California Gas Metering Station for units 1 through 4.
- 2. The first flange downstream of the Southern California Gas Metering Station for units 5 and 6.
- 3. The first flange downstream of the Southern California Gas Metering Station for unit 7.
- 4. The first flange downstream of the Shell Gas Metering Station .

Schedule 4.1 Dependable Capacity for First Contract Year

Facility/Unit	Dependable Capacii (MWs)
Redondo Beach	(141 41 8)
RB 5	175 MWs
RB 6	175 MWs
RB 7	480 MWs
RB 8	480 MWs
Huntington Beach	•
HB.1	215 MWs
HB 2	215 MWs
, HB 5	133 MWs
Alamitos	•
· AL 1	175 MWs
AL 2	175 MWs
AL 3	320 MWs
AL 4	320 MWs
AL 5	480 MWs
AL 6	480 MWs
AL 7	133 MWs

Schedule 4.2 Guaranteed Availability

Facility	Unit	Guaranteed	Debt	Major	Maximum	End Date of	Outage Hours
		Availability	Factor	Maintenance	Planned Outage	Last Planned	Remaining In
· · · · · · · · · · · · · · · · · · ·	<u>i. </u>	(%)		Cycle ("MMC")	Hours per MMC	Major Outage	Current MMC
Alamitos	1	78.9%	26%	6 years	3600 hours		
Alamitos	2	78.9%	26%	6 years	3600 hours		<u> </u>
Alamitos	3	86.0%	26%	6 years	3600 hours		
Alamitos	4	86.0%	26%	6 years	3600 hours		
Alamitos	5	86.0%	51%	6 years	3600 hours		<u> </u>
Alamitos	6	86.0%	51%	6 years	/ 3600 hours		
Alamitos	7	95.0%	100% -	6 years	3600 hours		
Huntington Beach	1	86.0%	26%	6 years	3600 hours		
Huntington Beach	2	86.0%	26%	6 years	3600 hours		
Huntington Beach	5	95.0%	100%	6 years	3600 hours		
Redondo Beach	5	78.9%	26%	6 years	3600 hours		
Redondo Beach	6	78.9%	26%	6 years	3600 hours		
Redondo Beach	7	86.0%	51%	6 years	3600 hours	****	\
Redondo Beach	8	86.0%	51%	6 years	3600 hours		-

- Schedule 4.3 - Shortfall Factor

AS = Availability Shortfall (expressed as a percentage)
= (Guaranteed Availability -Year-to-Date Availability) / Guaranteed Availability

lf	AS is t	etwee	<u>n:</u>	Then Shorti	all fac	ctor is:					
	0%	and	5%	0.5	+	0	*	(AS	1	5%)
•	5%	and	10%	0.5	+	0.3	*	ì	AS	1	10%)
	10%	and	15%	8.0	+	0.3	*	ì	AS	1	15%)
, .	15%	and	20%	1.1	+	0.3	*	ì	AS	1	20%)
	20%	and	25%	1.4	+	0.1	*	ì	AS	1	25%)
	25%	and	30%	1.5	+	0.1	*.	ì	AS	,	30%)
	30%	and	35%	1.6	+	. 0.1	*	ì	AS	i	35%)
	35%	and	40%	1.7	+	0.1	. *	ì	AS	i	40%)
	40%	and	45%	1.8	+	0.1	*	ì	AS	<i>i</i>	45%)
	45%	and	50%	1.9	+	0.1	*	ì	AS	1	50%)
	50%	and.	55%	Below this po	int the		acto	ris	calcu	, ibatedi	30 %)
	55%	and	60%	by:			_0.0		CCICU	ialco	-
	60%	and	65%	SF = (1+(AS	- 0.5)	0.2)/AS			:		
	65%	and	70%	· :	. • •			•			
	70%	and	75%		·	•	•				•
	75%	and	80%							-	
	80%	and	85%								
	85%	and	90%	•							
,	90%	and	95%							•	
	95%	and	100%								

SCHELVALE S.1 Fixed Payments to AES

Project Van	-			1.	•	-		-		2	=	2	=	2	=	2	5		=	2
MNY Cael (SAW)n) Wwigning Total Capachy Espense (1000)	4 15.00 B 1 15.00 B 16.2%	E 8 2 5	\$ 35.00 B	15.00 M	135.00 a 14.00 a 14.00 a	512 28.20 84.34 5,613 8	173 1838 6 1438 4	10.27 4 10.24 4 10.24 4	20 10 10 10 10 10 10 10 10 10 10 10 10 10	175 26.37 5.864 4	42.8 8 54.34 8	46.55 5.12 5.12 5.12 5.13 5.13 5.13 5.13 5.13 5.13 5.13 5.13	46.98	14.37 14.37 14.00 1	25 4 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5	175 1 42.50 8 14.270	42.50 8 64.3%	175 4250 \$ 84236 6270 \$	175 42.50 S 84.274 8,270 S	42.30 42.30 84.3%
Alamber 2: RNV Catl (ANAy) Weighting Tald Capachy Expense (1000)		25.00 25.00 \$ 25.00 \$	173 18.00 # 18.27 18.157	15 00 15 15 15 15 15 15 15 15 15 15 15 15 15	175 1 35.00 \$ 14.2%	173 24.74 84.74 54.75 54.75	178 10.56 % 10.2% 5.003 s	25. 24. 5 24.24 24.24 25. 25. 25	17.3 18.2% 19.7%	175 36,75 86,2% 58,57 5,857	2	25 4 25 4 25 5 2 5 5 4	40.98 \$ 84.2% 6.035 \$	175 41.37 8 81.37 8	175 14139 8 812%	175 1 4250 8 11.2%	175 175 177 177 177 177 177 177 177 177	175 · 47.50 · 8	135 42.50 \$ 84.2%	25 25 27 27 27 27 27 27 27 27 27 27 27 27 27
Alamba 1: ANV Cost (SWAM) Wadplang Total Capachy Esperse (2000)	130 130 130 130 130 130 130 130 130 130	326 34.96 \$ 48.3% 10.002 \$	370, 35,00 \$ 18,3% 19,003 \$	320 32.00 4 82.3% 10.002 3	3 25 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5	320 38.20 8 88.3%	320 38.58 \$ 66.3%	320 38.37 \$ 69.3%	320 3838 8 8938	320 39.75 \$ 10.75 \$	320 48,15 \$ 48,3% f1,473 \$	220 - 40.55 8 40.55 8 11,510 3	120 48.96 \$ 11,703 \$	320 41,37 8 18,3% 11,420 1	226 41.70 \$ 69.3%	42.50 8 42.50 8 48.3%	220 42.50 \$ 49.3% 12,145 \$	320 42.50 \$ 88.3%	220 42.50 3 89.3%	22 25 22 25 25 25 25 25 25 25 25 25 25 25 25 25 2
Muntes 4: LIVV Coet (RNVys) Whighing Yotal Capacity Expens (1900)	320 320 320 320 \$ 35.00 \$ 35.00 \$ 35.00 \$ \$ 96.5% 86.5% \$ 66.5% \$ 9,618 \$ 9,618 \$	12.00 S 15.00 S 18.534 9,818 S	320 35.00 8 66.5% 9.016 8	320 35.90 8 84.5% 944.6 8	25.00 25.00 S	320 38.20 \$ 86.9% 10,874 \$	32.0 38.58 8 86.5% 10.678 \$	320 38.97 8 86.5% 10,766 4	32 32 32 32 32 32 32 32 32 32 32 32 32 3	320 38,75 \$ 64,5% 11,003 \$	320 40.15 S 84.5%	120 48.55 11.224 S	320 40.14 \$ 64.5% 11,337 \$	320 41.37 8 86.3% 11,450 8	320 41,78 S 84,58 S	220 42.50 8 86.5%	370 42.50 \$ 64.5%	220 42.58 8 86.3% 11,764 3	270 42 50 8 86 5%	320 42.50 14.5%
Marthe 3: Last (AMM) Control (AMM) Whitehing Tolal Capacity Espense (1900)	480 480 480 480 4 3100 8 35.00 5 35.00 5 35.00 148.2% 168.2% 118.2% 5 18.50 5 15.10 8	416 1164%	410 8 410 8 410 8 19,519 8	480 35.00 & 118.8% 19.549 &	460 31.00 £ 110.4%	460 38.20 \$ 116.8%	410 1856 \$ 11864 21594 \$	410 34.07 E 116.6%	410 38,34 \$ 116,6%	480 38,73 4 118,9% 22,248 1	480 40 18 8 118.6% 22,470 8	460 40.15 E HE.E% 22,415 \$	48.98 \$ 118.8%	480 41.37 4 114.6% 23,151 5	440 41,74 £ 110,00 23,315 4	480 4234 \$ 118434 23,786 \$	460 42.50 8 918.8% 23,786 8	480 42,50 \$ 116,6% 23,746 \$	480 42.50 5 176.4% 23,786 5	42 50 42 50 114,6% 22,786
Alembes 6: LAV Cast (IANV)1) Yhdiplang ' Teisi Capachy Expense (1000)	007 007 077 0 0047 0051 5 0071 5 0047 0051 5 0071 5	480 35:00 B 19:50 B	480 31.06 8 118.8%	4 90.85 1 90.85 1 90.85 1 91.61 1 11.61	35.00 8	20 7 8 8 8 8 8 8 8 8 8 8 8 8 8 8 8 8 8 8	7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7	21 21 22 22 23 24 25 25 24 25 25 25 25 25 25 25 25 25 25 25 25 25	410 20,05 410 49,05 1,00 49,05 1,00 40,05	32 12 12 12 12 12 12 12 12 12 12 12 12 12	40.15 S 110.00 22,470 S	486 4 486 4 486 4 486 4 4 4 4 4 4 4 4 4	40 to 10 to	400 41.37 B 118.8%	400 41,78 B 158 654 25,283 B	410 47.50 \$ 590.04 23.74 \$	410 47 50 5 110 654 23,766 4	410. 42,50 II 110.0%	400 4230 E 1166% 23,786 S	42 30 118 6% 23,746
Marrhen 7: MAY Cont (SAV4y) Whipishy Total Copuldy Expense (1000)	133 1530 153 1530 \$ 3500 5 35.00 5 35.00 5 35.00 \$4.95 84.95 84.95 64.95 \$ 5,010 5 5,011 5 5,016	133 · 35.00 \$ 84.8%	133 25.00 S 64.195 3,014 S	133 15.00 B 84.8% 3,014 £	135 B 4 B 4 B 4 B 4 B 4 B 4 B 4 B 4 B 4 B	133 38.20 64.0%	133 19,18 1,135 1,135 1	113 24.95 64.8%	20 24 4 20 24 4 20 25 4 20 25 4	23.75 4 24.8% 24.8%	40.15 84.19 84.10	133 4045 64.9% 54.9%	133 48.96 8 64.8% 3,530 3	133 41.37 84.19 3.565 4	44.28 S	133 4250 E 64.0%	13 42 5 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	123 123 123 123 123 123 123 123 123 123	133 42.50 S 64.8% 3,603 S	42.50 184.5%
Hunlington I; ANV Cont (SANWY) Wodphing Total Capachy Espense (1000)	215 216 218 \$ 35,00 \$ 35,00 \$ 35,00 \$ 100,54 100,54 100,54 \$ 7,553 \$ 7,553 \$ 7,553 \$	218 35.00 - 1 100.8% 7,593 - 1	218 33.00 E 106.9% 7,583 E	215 35.00 \$ 106.6% 7,483 \$	215 31.00 1 100.9% 7,593 5	215 36.26 \$ 100.0%	215 314.4 100.9%	215 1897 6 100.8%	2015 2015 2015 2015 2016 2016 2016 2016 2016 2016 2016 2016	215 20.75 8 100.9% 8.823 3	216 40,45 100,9%	215 48.53 8 100.5%	215 48.84 \$ 100.9%	215 41.17 8 100.6%	215 41,76 8 100,9%	215 42.50 \$ 190.9%	215 4230 S 180 PM	215 42.50 8 100.00,00	215 42,50 E 100,0%	215 42.54 100.53
Hankington 2: ANV Cont (SAWA) Weighting Tatal Capacity (sponse (1990))	215 219 215 2 33.00 \$ 33.00 \$. 23.00 \$ 89.4% \$96.4% \$96.4% \$ 7,450 \$ 7,489 \$ 7,450 \$	215 25.00 8- 7.480 8	2550 4 25.00 4 7,460 4	215 35.00 ± 10.00 ±	218 24.00 8 77.10 1	218 34.20 8 99.4%	215 2156 4 2164 1246 6	215 20.07 6.527 1	2 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5	715 11.75 11.65 1.65 1.65 1.65 1.65 1.65 1.65 1.	20 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	213 48.85 81.44 81.44 10	215 45.06 B 67.53 J	218 41.37 1 10.4%	218 41,78 4 90,4%	218 4250 1 91.4% 90.13 1	215 4256 E 99.4%	715 42.56 8 86.4% 1663 5	215 42.55 # 80.54 #	215 22.50 98.51 98.51
Pharibigion II. MAY CAN (LAWY) Weighting Tatal Capachy Expense (1000)	133 8 35.00 6 81.4% \$ 2,431 \$	133 35.00 - 8 81.4% 2.851 - 8	133 . 133 . 134 . 135 . 135 . 1350 \$.	133 13.00 S 03.0% 2,951 S	133 35,00 f 63,40%	133 1870 1848 1771 1	133 24.58 S 63.6%	133 30.57 63.6% 6 3,246 6	133 3534 4 6348 5316 4	133 19.78 10.74 1,117 1	133 40.15 8 63.4% 3,315 5	133 4 135 4 136 4 136 4	133 44.86 8 5.455 8	133 4 61.4% 6 3.4% 1	133 41.78 \$ 42.6% 3523 \$	133 -42,50 83,4% 1,514 S	133 42.50 3.24.8 3.24.8	133 42.50 5 13.4% 1	133 42.50 S 63.4%	13 126 136 136 136
irpener (1000)	173 8 15.00 8 1 16.0% 4 5 5,761 8	173 15.00 8 20.00 1 800 8	175 33.00 8 80.076 5.768 8	173 15.50 B 10.5% 5.70 \$	17.5 15.00 8 00.0%	176 38.70 8.00% 8.748 8	178 38.58 8 86.0% 8,107 8	178 26.97 1 66.9%	175 18.24 4 16.07 15.17 5	174 10.78 4 00.0%	175 48.15 1 86.042 5	48.55 9 66.65 5 6.05 5	4 4 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5 5	41.37 E	41,78 1 16,0%	173 42.50 8 86.5% 4.396 4	173 4230 S 8459 6,346 S	175 42.30 \$ 6.384 \$	173 42.50 4 86.0%	2
Redende 8: MAY Chef (2M4)/1 Vhefybling Telef Capachy Expense (\$000)	178 1 29.0. 4 19.0.4 1 11.0. 8	175 35.00 8 80.8% 8.317 5	178 35.80 8 86.8% 5.317 \$	178 178 178 178 178 178 178 178 178 178	175 35.00 8 80.0%	178 38.20 8 60.8%	171 21.00 S 24.00 S	173 24.87 1 6.019 5	173 16.34 4 84.8%	175 3178 8 84.8%	40.18 8 6000 3	173 40 15 B 61 70 3	175 40.94 \$ 64.85	175 4(37 \$ 64.0%	132 1	175 42.59 S 64.5% 5,456 S	173 42.50 1 M.P.N 6.656 1	173 42.50 ± 84.5% ±	175 42.50 1 10.8%	175 42.56 86.59 86.59
	460 8 33,00 8 811.1% 8 10,001 8	480 8 35.09 8 113.1% 8 19.001 8	480 1 35.00 \$ 113.1% 1 19.001 \$	410 25.00 8 13.1%	480 35.00 \$ 113.1%	489 24,26 4 113,1% 1	480 3854 6 113,5% 1	410 38,87 \$ 113,5%	410 3134 B. 113,194 1 20,304 4 2	20,73 S 1,1330 S 2	410 40,18 8 21,796 8 2	485 4 48.55 4 112.1% 1	410 40.96 1 113.1% 1 22,234 1 7	41.37 5 113.1% 1 22,454 8 2	41.78 G 113.1%	43.012 6 2	480 4 42.50 8 113.1%	480 4250 S 113.1% 1	410 425 1 45.14 1	480 42.58 113.1% 23.072
Ny) acty Expense (1000)	410 1 15.00 \$ 111.0% f	410 35.50 4 11.0%	080 045 3 00.00 \$ 00.01 1 20.01 20.01 1 3 11.01 2 11.01 1 3 11.01 2 11.01	410 35.00 8 11.0%	410 35.00 II 111.0%	480 31.20 8 191.0% 1 20,333 8 2	38.48 \$ 111.096"	410 38.97 8 11.12% 1	410 59.34 B 111.0% 1	410 28.73 S 21.178 1	480 48,13 E 111,9% 1 21,391 \$ 2	418 40.55 \$ 111.0% 1	40.94 \$ 110.0% · 1	4157 1 111.0% 1 27.019 5 2	41.71 \$ 111.0% 1 22,740 £ 7	480 42.50 \$ 111.8% 1	460 42.58 1 111.0% 1 22,614 5 2	480 4236 '8 111.8% 1	42 50 8 41 10 W 11 27	480 42.50 111.0%
Telet Capachy Expense (1000)	\$ 138,481 \$ 138,481 \$ 138,481 \$ 139,481	3 8 197	10,465 8 1	30,401 \$ 1.	H 10701	8 151,120 £ 15	152,83 \$ 154,	1,150 \$ 19	5.696 8 137,254	7,254 \$ 15	1 45	1 5 110	107,021 1 14	1142 8 11	15,278 1 14	11,751 \$ 14	111 5 16	91 1 161	101	M.O.

THOUSELLON	see achedule	see schedule	see schedule	see achedule	see schedule	see schedule			see schedule	see schedule			see schedule	see schedule	see schedule	see schedule	
	4	4	4	4	16	. 16			4	च			. 4	4	16	16	
L GOOD SHEET	see schedule			see schedule	see schedule		·	see schedule	see schedule	see schedule	see schedule						
	2,600	2,600	4,600	4,600	6,200	6,200	•	•	000'E	3,000			2,600	2,600	6,200	6,200	
(एकोश इसिए निर्वितिह	76	9/	180	180	192	. 192			81	81			76	92	. 264	264	
	. 10	10	10	10	24	24	10 min.		.10	10	10 min.		10	10	36	36	
Unitaria Second	AL 1	AL 2	AL 3	AL 4	AL 5	AL 6	AL 7		18.1	HB 2	抽3		RB 5	RB 6	RB 7	RB 8	

Notes:

1.Start variable costs will be actual consumed during actual start hours not to exceed

the hours determined innote 2 below and further not to exceed cold start costs.

2. A curve will be developed between the parties to determine the unit start time in relation to unit down time during May 15 to June 1 1998.

3. Electric cost will be determined using the applicable PX energy price for the hours during start-up.

Schedule 5.4 Start-Up Payments
Alamitos - Non Energy Start-Up Costs (\$000)

. 1	C122-109	- Carles and Carles an		ind Victoria	·								
ŀ		ESTABLE!	772	ALS EALS				A APA	2000	1226 ALS		Estat A	200
		THOUGHT SE	COICE	E HOMEGY	Colders,	が発生的は	C00 (#77	Hoe	Codes				
Ė	क्षा स्टब्स	(18 - 11 / E)	A	自己的是15件	2000				200	PER 1-1	20.0		4
ŀ	- 1				1 }1	4							
·		4,0	0.0	0.0	0.0		0.0		0.0	0.0	0.0	· 0.0	. 0,0
ŀ	3		0.0		0.0		0.0		. 0.0		. 0.0	0.0	0.0
ŀ	4		0.0		0.0		0.0	0.0	0.0	0,0	0.0	0.0	0.0
ŀ	- 5	0.0	0.0		0.0		0.0		0.0		0.0	0.0	0.0
┝		0.0	0.0		10,4		0.0	0.0	0.0		0.0	0.0	0.0
F	7	10.4	10.4		10,4	0.0	0.0		0.0	0.0	0.0	0.0	0.0
ŀ	8	10.4	10.4		10.4		0.0		0.0	0.0	0.0	0.0	0.0
-	9	10.4	15.0		15.0		0.0		0.0	0.0	0.0	0.0	0.0
ŀ	10	10.4	15.0 E	10,4	15.0		0.0		0.0	0.0	0.0	0,0	0.0
┢	11	10.4	15.0		15.0		0.0		0.0	0.0	0.0	0.0	0.0
┢	12	10.4	15.0	10.4	15.0	0.0	0.0		0.0	0.0	0.0	24.9	· 24.9
F	13	10.4	15.0		15.0	0.0	0.0		0.0	0.0	0.0	24.9	24.9
上	14	10.4	15.0	10,4	15.0	. 15.4	15,4		0.0	24.9	24.9	24.9	24.9
7	15	10.4	15.0		15.0 E	15.4	15.4		0.0	24.9	24.9	24.9	24.9
┢	16	10,4	15,0	10.4	15.0	15.4	15.4	0.0	0.0	33.3	50.0	33,3	50.0
	17	10.4	15,0	10.4	15.0	16.8	25.0	0.0	0.0	33.3	50.0	33.3	50.0
	18	10.4	15,0	10.4	15.0	16.8	25.0 2	15.4	15,4 😨	33.3	50.0	. 33.3	50.0
	19	10.4	15.0 %	10.4	15.0	16.8	25.0	15.4	15.4	33.3	50.0	33.3	50.0
	20	10.4	15.0	10.4	15.0	16.8	25.0	15.4	15.4	33,3	50.0	33.3	50.0
	21	10.4	15.0	10.4	15.0 F	16.8	25.0	15.4	15,4 2	33.3	50.0	33,3	50.0
	22	10.4	15.0	10.4	15.0	16.8	25,0	15,4	15.4	33.3	50.0	33.3	50.0
L	23	10.4	15.0	10.4	15.0	16.8	25.0	15.4	15.4	33.3	50.0	33,3	50.0
L	24	10.4	15.0	10.4	15.0	16.8	25,0	15.4	15.4	33.3	50.0	33.3	50.0
L	25	10.4	15.0	10.4	15.0	16.8	25,0	15,4	15.4	33,3	50.0	33.3	50.0
L	26	10.4	15.0	10.4	15.0	16,8	25.0	16.8	25,0	33.3	50.0	33.3	50.0
┝	27	10.4	15.0	10.4	15.0	16.8	25.0	16.8	25.0	33.3	50,0	33.3	50.0
 -	-28	. 10.4	15.D	10.4	15.0	16:8	25.0	16.8	25.0	33.3	. 50,0	33.3	50.0
┝	30	10.4	15,0	10.4	15.0 E	16,8	25,0	16,8	25.0	33.3	50.0	33.3	50.0
-	31	10.4	15.0	10.4	15.0	16.8	25.0 K	16,8	25.0	33.3	50.0	. 33,3	50.0
⊢	32	10.4	15.0	10.4	15.0	16,8	25.0	16,8	25.0	33.3	50.0	33.3	50.0
H	33	10.4	15.0	10.4	15.0	16.8	25.0	16.8	25.0	33.3	50.0	33.3	50.0
┢	34	10.4	15.0	10.4	15.0	16.8	25.0	16.8	25.0	33.3	50.0	33.3	50.0
	35	10.4	15,0	10.4	15.0	16,8	25.0 2	16.8	25.0	33.3	50.0	33.3	50.0
Г	36	10.4	15,0	10.4	15.0	16.8	25,0	16.8	25.0	33,3	. 50.0	33.3	50.0
┖	37	10.4	15.0 5	10.4	15.0	16.8	25.0	16,8	25.0 2	33.3	50,0	33,3	50.0
	38	10.4	15.0	10.4	15.0	16,8	25.0	16.8	25.0	33.3	50.0	33,3	50.0
	39	10.4	15,0	10.4	. 15.0	16.8	25,0	16.8	25.0	33.3	50.0 50.0	33.3	50.0
	40	10.4	15.0	10.4	15.0	16.8	25.0	. 16.8	25.0	33.3	50.0	33.3	50.0
L	41	10.4	15.0	10.4	15.0	16.8	25.0	16.8	25.0	33.3	50.0	33.3 33.3	50.0
<u></u>	42	10.4	15.0	10.4	15.0	16.8	25.0	16.8	25.0	33,3	50,0	33.3	50.0 50.0
<u> </u>	43	10.4	15.0	10.4	15.0	16.8	25.0	16,8	25.0	33.3	50.0	33.3	
ட	44	10,4	15.0	10.1	15.0	16.8	25.0	16.6	25,0	33.3	50,0	33.3	50.0
匚	45	10.4	15.0	10.4	15.0	16.8	25.0	16.8	25,0	33.3	50.0	33.3	50.0
<u> </u>	46	10.4	15.0	10.4	15.0	16,8	25.0	16.8	25.0	33.3	50.0	33,3	50,0
⊢	47	10,4	15.0	10.4	15.0	16,8	25,0	16.8	25.0	33.3	. 50.0	33.3	50.0
 	48	10.4	15.0	10.4	15.0	16.8	25,0	16.8	. 25,0	33.31	50.0	33.3	50,0
⊩	49	10.4	15,0	- 10.4	15.0	16,8	25,0	16.8	25.0	33.3	50,0	33,3	50,0
⊩	50	10.4	15.0	10.4	15.0	16.8	25,0	16.8	25.0	33.3	50.0	33.3	50.0
 -	51	10.4	15.0	10.4	15.0	16.8	25.0	16.5	25.0	33.3	50.0	33.3	50,0
ᆫ	52	10.4	15.0	10.4	15.0	16,8	25.0	16.8	25.0	33.3	50.0	33,3	50.0
										,			-4.0

Schedule 5.4 Start-Up Payments
Redondo Beach - Non Energy Start-Up Costs (\$000)

Star #E	F 5 42 B15	用 表生之份	HEZERBIS	Per Street H	S VOR BY		Section 1	· · · · · · · · · · · · · · · · · · ·
	HOHAW						Distriction	
				COURT		Confinence of		Q3,
		SCHOOL SEED OF	SEED SEED			1		24.6
1	0.0	0.0	0.0	0.0		0.02		
2	0.0	0.0	0.0	* 0.0		·0.0 Z	0.0	0.0
3	0.0	0.0 달	0.0	0.0		0.0	0.0	0.0
4	0.0	0.0	0.0			0.0	0.0	0.0
5	0.0	0.0	0.0	0.0		0.0	0.0	.0.0
6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
7	0.0	0.0	10.4	10.4		0.0	0.0	0.0
8	0.0	0.0	10.4	10.4	0.0	0.0	0.0	0.0
9	10.4	10.4	10.4	10.4		0.0	24.9	24.9
10	10.4	15.0	10.4	10.4		0.0	24.9	24.9
11	10.4	15.0	10.4	15.0	0.0	0.0	24.9	24.9
12	10.4	15.0	10.4	15.0		0.0	24.9	24.9
13	10.4	15.0	10.4	15.0	0.0	0.0	33.5	50.0
14	10.4	15.0	10.4	15.0	24.9	24.9	33.5	50.0
15	10.4	15.0	10.4	15.0	24.9	24.9	33.5	50.0
16	10.4	15.0	10.4	15.0	24.9	24.9	33.5	50.0
17	10.4	15.0	10.4	15.0	24.9	24.9	33.5	50.0
18	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
19	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
20	10.4	15.0	10.4	15.0	33.5	50.0	33.5 33.5	50.0
21	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50,0
. 22	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
23	10.4	15.0	10.4	15.0	33.5	50.0	. 33.5	50.0 50.0
24	10.4	15.0	10.4	15.0	33.5	50.D	33.5	50.0
25	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
26	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
27	10.4	15.0	10.4	15.0	33.5	50,0	33.5	50.0
28	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
29	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
30	10.4	15.0 E	10.4	15.0	33.5	50.0	33.5	50.0
. 31	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
32	10.4	15.0	10.4	15.0 民	33.5	50.0	33.5	50.0
33	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50,0
34	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
35	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
35	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
37	10.4	15.0	10,4	15.0	33.5	50.0	33.5	50.0
38	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
39	10.4	. 15.0	10.4	15.0	33.5	50.0	33.5	50.0
40	10.4	15.0 m	10.4	15.0	33.5	_ 50,0	33.5	50.0
	10.4		10.4	15.0	33.5	50.0	33.5	50.0
42	10.4	15.0	. 10.4	15.0	33.5	50,0	33.5	50.0
	10.4	. 15,0	10.4	15.0 5	33.5	50.0	33.5	50.0
44	10.4	15.0	10.4	15.0	33.5	50.0	.33.5	50.0
45	10.4	15.0	10.4	15.0	~~.~	50.0	33.5	50.0
46	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
47	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
48	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
49	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
50	10.4	15.0	10.4	15.0	33.5	50.0	33.5	50.0
51	10.4	15.0	10.4	15.0	33.5	50.0	33,5	50.0
52	10.4	15.0	10.4	15.0	33.5	50,0	33.5	50.0

Schedule 5.4 Start-Up Payments
Huntington Beach - Non Energy Start-Up Gosts (\$000)

Start##	Par HBM	PER MEN	Ē	18 2 18 2	
算是的	Honesta	Cold	B	60 1	ejen .
			7		• • •
· · 1	0.0	0.0	1.	. 0.0	0.0
2	0.0	0.0		. : 0.0	0,0
3	0.0			0.0	0.0
4	0.0	· 0.0		0.0	0.0
5	0.0	0.0	3	. 0.0	0.0
6	0.0 10,6	0.0	4	0.0	0.0
8	16.8	25.0	ā	0.0	0.0
<u> </u>	16.8	25.0	4	0.0	0.0
10	16.8	25.0		0.0	0.0
11	16.8	25.0	7	0.0	0.0
12	16.8	25.0		0.0	0.0
13	16.8	25.0		10.6	10.6
14	16.8	25.0	4	10.6	10.6
15	16.8	25.0		16.8	25.0
16 17	16.8	25.0	4	16.8	25.0
18	16.8 16.8	25.0 25.0	-	16.8 16.8	25.0 25.0
19	16.8	25.0	-	16.8	25.0
20	16.8	25.0	7	16.8	25.0
21	16.8	25.0	7	16.8	25.0
22	16.8	25.0	Ĩ	. 16.8	25.0
23	· 16.8	25.0	į.	. 16.8	25,0
24	16.8	25.0		16.8	25.0
25	16.8	25.0		16.8	25.0
26 27	16.8 16.8	25.0	١.	16.8	25.0
28	16.8	25.0 25.0	4	16.8 16.8	25.0 25.0
29	16.8	25.0	+	16.8	25.0
30	16.8	25.0	7	16.8	25.0
31	16.8	25.0	1	16.8	25.0
32	16.8	25.0	t	16.8	25.0
33	16.8	25.0		16.8	25.0
34	16.8	25.0	ij.	16.8	25.0
35	16.8	25.0	١.	16.8	25.0
36	16.8	25.0	-	16.8	25.0
37 38	16,8 16.8	25.0 25.0	-	16.8	25.0
39	16.8	25.0 25.0	ł	16.8 16.8	25.0 25.0
40	16.8	25.0 25.0	1	16.8	25.0 25.0
41	16.8	25.0	1	16.8	25,0
42	16.8	25.0	1	16.8	25.0
43	16.8	25.0		16.8	25.0
44	16.8	25.0		16.8	25.0
45	16.8	25.0		16.8	25.0
46	16.8	25.0	Ľ	16.8	25.0
47	16.8	25.0		16.8	25.0
48	16.8	25.0	Ļ	16.8	25.0
49	16.8	25.0	j.	16.8	25.0
50	16.8	25.0	1	16.8	25.0
51	16.8	25.0	Ľ	16.8	25.0
52	16.8	25.0	4	16.8	25.0

ALAMITOS GENERATING STATION UNIT 1

Unit 1

Size

175 MW

Minimum Load

10 MW

Minimum Load On AGC

45 MW

ALA	MITOS GENERATI	NG STATIO	N CONT 3
Load	HR.	Ramp Rate	
MW	BTU/KWh	MW/MIN:	<u> </u>
-	010/1/1/1/	INTANAMILA.	
5			
	2 TO 1	110	· · · · · · · · · · · · · · · · · · ·
15		na	
20	20.00		
25	1989	. 5.0	
30	74.0	5.0	<u> </u>
35	2 5 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6 6	5.0	
40		5.0 5.0	
45	15,020		· · · · · · · · · · · · · · · · · · ·
50	14,463	5.0	
55	14,095	5.0	·
60	13,638	5.0	
65	13,380	- 5.0	
70	13,043	5.0 5.0	
75	12,856	5.0	
08	12,608		
85	12,421	5.0 5.0	
90	12,263	5.0°	***
95	12,116	5.0	
100	11,979	5.0	
105	11,851	5.0	
110	11,754	5.0	
115	11,656	5.0	
120	11,559	5.0	
125	11,481	5.0	
130		- 5.0	
135	11,337	5.0	
140	11,279	5.0	<u> </u>
145	11,212	5.0	
150	11,154	5.0	
155	11,107	5.0	
160	11,060	2.5	
165	11,012	2.5	
170	10,965	2.5	<u> </u>
175	40.00	2.5	·: ·
180	10,836		·
184	10,752	2.5	·

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA.

ALAMITOS GENERATING STATION UNIT 2

Unit 2

Size

175 MW

Minimum Load

10 MW

Minimum Load On AGC

40 MW

			· .
ALAMI	TOS GENERA	TING STATIC	ON UNIT 2
Load	HR	Ramp Rate	
MW	BTU/KWh	MW/MIN	
	·		
5		па	
10		na	
15	是一个人	5.0	
20	10 EX	5.0	
25	美國的	5.0	
30		5.0	
35		5.0	
40	美国经济	5.0	
45	13,240	5.0	
50	12,833	5.0	
55	12,505	5.0	
60	12,238	5.0	
65	12,010	5.0	
70	11,823	5.0	
75	11,656	5.0	
80	11,518	5.0	
85	11,391	5.0	
90	11,283	5.0	-
95	11,196	5.0	
100	11,109	5.0	
105	11,041	5.0	
110	10,984	5.0	
115	10,916	5.0	
120	10,869	5.0	
125	10,821	5.0	
130	10,784	5.0	
135	10,757	5.0	
140	10,729	5.0	
145	10,702	5.0	
150	10,684	5.0	
155	10,667	5.0	
160	10,650	2.5	
. 165	10,642	2.5	
170	10,635	2.5	
175	10,627	2.5	
180	10,619	2.5	
184	10,611	2.5	
		د.ن	

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA...

ALAMITOS GENERATING STATION UNIT 3

Unit 3 Size Minimum Load

30 PLM 350 PLM

Minimum Lo	ad On AGC	70	MW
· ALAMIT	OS GENERA	ING STATIO	N LINITE 3 - 3
Load	HR	Ramp Rate	10,47.5
MW	BTUKWh	MINNIN	
5		na na	
10	3.	Ma.	
20	G127419	na na	<u> </u>
25		5.0	
30	27 E 1 (340)	5.0	
35	SECTION SECTION	5.0	
40 45		5.0	
43 59	4200	50	
55		5.0	
60		5.0	
65	77.0	5.0	
70	111-111-111	5.0	
75	77.7	5.0	
80 85	11,750 11,565	- 5.0	
90	11,400	5.0	
95	11,252	5.0	
100	11,118	5.0	
105	10,997	5.0	
110	10,657	5.0	
115 120	10,787	5.0	
125	10,610	5.0 5.0	
130	10,532	5.0	
135	10,459	5.0	
140	10,392	5.0	
145	10,330	5.0	
150 155	10,272	5.0	
160	10,218	5.0 5.0	
165	10,121	5.0	
170	10,077	5.0	
175	10,035	5.0	
180 185	9,997	5.0	
190	9.951 5 927	5.0	
195	9,895	5.0	
200	9,865	5.0	
205	9,637	5.0	
210	9.811	5.0	
. 215	9,787	5.0	
225	9,743	5.0 5.0	
230	9,723	5.0	
235	9.704	5.0	
240	9,687	5.0	
245 250	9,671	5.0	
250	9,656	5.0	
260	9,642	5.0	
265	9,618	5.0	
270	9,607	5.0	
275	9,597	5.0	
200	9,588	5.0	
265 290	9,581	5.0	
255	9,574	2.5	
300	9,562	2.5	
305	8,556	25	 -
310	9,554	2.5	
315	9,551	2.5	
320	9,549	2.5	
325	9,547	2.5	
330	9,545	2.5	

Hota:

1, AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA.

ALAMITOS GENERATING STATION UNIT 4

320 MW 20 MW 70 MW

Unk 4 Size Minimum Load Minimum Load On AGC

		10	MYY
ALAX	ITOS GENER	ATING STATE	ON UNIT
Load	HR	Ramp Rate	· ·
. WW	8TUKWh	MWWMIN	
5	ESPHERE!	na na	
10	(ARTICLE)	US	
15	SHAPE SAME	na na	
20	50K2Z,4JH	M	
25	325 E 0,845	5.0	
30	4X-518/129	5.0	
35	C£35-15,6963	5.0	
40	Oding 5,902	5.0	
45	MARIE STATE	5.0	
50 55	CHARAC	5.0	
60	41804074	5.0	
- 65	E and the state of the	5.0	
		5.0	
75		5.0	
80	12,639	5.0	
8.5	12,431	5.0	
90	12,245	5.0	——-
95	12,076	5.0	 !
100	11,923	30	
105	11,783	5.0	
110	11,655	5.0	
115	11,536	5.0	
120	11,426 11,325	5.0	
125		5.0	
130	11.230	5.0	
135	11,141	5.0	
140	11,058	5.0	
150	10,900	5.0	
155	10,536	5.0	
160	10,773	5.0	<u> </u>
165	10,711	5.0	
170	10,653	5.0	
175	10,598	5.0	
160	10,545	5.0	
185	10,495	5.0	
190	10,445	5.0	
195	10,403	5.0	
200	10,360	5.0	
205	10,319	5.0	
210	10,290	5.0	
215	10,243	5.0	
225	10.174	5.0	
230	10,142	5.0 5.0	
235	10,111	5.0	
240	10,082	5.0	
245	10,054	5.0	
. 250	10,027	5.0	
255	10,002	5,0	
260	9,978	5.0	
265	9,955	5.0	
270	9,933	5.0	
275	9,912	5.0	
250	9,893	5.0	
285	9,874	5.0	
290	9,857	2.5	
295	9,840	2.5	
300	9.624	2.5	
305	9,810	2.5	
310	9,796	2.5	
320	9,783	2.5	
325	9,771	2.5	
330	9,759	2.5	
- 330	9,747	2.5	

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heet rate is guaranteed below 25% in accordance with the MRA.

ALAMITOS GENERATING STATION UNIT 5

Unit 5

Size 480 MW Minimum Load 70 MW

Minimum Load On AGC 180 MW

ALAMI	TOS GENER	ATING STATIO	N UNIT 5
Load	HR	Ramp Rate	•
MW	BTU/KWh	MW/MIN	
· 70		na	
75	西 斯拉亞漢	· 2.5	
80		5.0	
85		5.0	
9,0	30.00	5.0	
95	28.25	5.0	
100	新ET 22532	5.0	
105	新版 (24)5度	5.0	
	200 2百	5.0	
115		5.0	
120		5.0	
. 125	西西 斯斯坦	5.0	
130	11,633	5.0	• • • • • • • • • • • • • • • • • • • •
135	11,503	5.0	• • • •
140	11,382	5.0	
145	11,271	5.0	
150	11,167	5.0	
155	11,071	5.0	
160	10,981	5.0	
165	10,896	5.0	
170	10,817	5.0	
175	10,743	5.0	
180	10,674	5.0	
185	10,608	5.0	
190	10,546	5.0	•.
195	10,488	5.0	
200	10,433	5.0	
205	10,381	5.0	
210	10,332	5.0	
215	10,285	5.0	
220	10,241	5.0	
225	10,198	5.0	
· 230	10,158	5.0	
235	10,120	5.0	<u> </u>
240	10,084		
245	10,050		
250	10,017		

255 9,985 5.0 260 9,956 5.0 265 9,927 5.0 270 9,900 5.0 275 9,874 5.0 280 9,849 5.0 285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
265 9,927 5.0 270 9,900 5.0 275 9,874 5.0 280 9,849 5.0 285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
270 9,900 5.0 275 9,874 5.0 280 9,849 5.0 285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
270 9,900 5.0 275 9,874 5.0 280 9,849 5.0 285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
275 9,874 5.0 280 9,849 5.0 285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
280 9,849 5.0 285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
285 9,825 5.0 290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
290 9,802 5.0 295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
295 9,780 5.0 300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
300 9,759 5.0 305 9,739 5.0 310 9,720 5.0	
305 9,739 5.0 310 9,720 5.0	
310 9,720 5.0	
315 9,701 5.0	
320 9,684 5.0	
325 9,667 5.0	•
330 9,650 5.0	
335 9,635 5.0	
340 9,620 5.0	
345 9,605 5.0	
350' 9,592 5.0	
355 9,578 5.0	
360 9,566 5.0	
365 9,553 5.0	
370 9,542 5.0	
375 9,530 5.0	
380 9,519 5.0	
385 9,509 5.0	
390 9,499 5.0	
395 9,489 5.0	
400 9,480 5.0	
405 9,471 5.0	
410 9,463 5.0	
415 9,454 5.0	<u> </u>
420 9,446 5.0	
425 9,439 5.0	
430 9,432 5.0	
435 9,425 2.5	
440 9,418 2.5	
445 9,412 2.5	
450 9,405 2.5	
455 9,399 2.5	
	-
465 9,388 2.5	· · · · · · · · · · · · · · · · · · ·
470 9,383 2.5	
475 9,378 2.5	
480 9,373 2.5	
485 9,368 2.5	
490 9,363 2.5	
495 9,358 2.5	

500	9,353	2.5	
504	9,348	2.5	

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA...

ALAMITOS GENERATING STATION UNIT 6

Unit 6

Size 480 MW Minimum Load 70 MW Minimum Load On AGC 180 MW

ALAMITOS GENERATING STATION UNIT 6 Load HR Ramp Rate MW BTU/KWh MW/MIN 70 \$155433 na 75 \$25555 5.0 80 \$25555 5.0 85 \$25555 5.0 90 \$25522 5.0 100 \$25525 5.0 110 \$25535 5.0 110 \$25555 5.0 110 \$25535 5.0 110 \$255 5.0 110 \$2555 5.	
MVV BTU/KWh MV/MIN 70 1219333	-
70	
75	_
80	-
85 345 5.0 90 352 5.0 100 50 5.0 105 5.0 5.0 110 352 5.0 110 352 5.0 115 352 5.0 120 352 5.0 130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
90 30 12898 5.0 95 10 10 5.0 100 30 128 128 15 5.0 110 30 128 128 15 5.0 110 30 128 128 15 5.0 1110 30 128 128 15 5.0 120 30 128 128 15 5.0 120 30 128 128 15 5.0 130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
95	-
100 5.0 5.0 105 5.0 110 5.0 110 5.0 110 5.0 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 5.0 110 110 5.0 110 110 5.0 110 110 5.0 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 5.0 110 110 110 110 5.0 110 110 110 110 110 110 110 110 110 1	-
105 36 12 5.0 110 36 12 5.0 115 36 12 5.0 120 36 16 5.0 125 36 12 5.0 130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
110 313,562 5.0 115 32,838 5.0 120 32,662 5.0 125 52,662 5.0 130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
115 120 120 5.0 120 125 5.0 5.0 130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	_
120 5.0 125 5.0 130 11,344 135 11,221 140 11,108 145 11,005 150 10,909 5.0 155 10,822 160 10,741 165 10,666 170 10,597 175 10,532 180 10,473 5.0	
125 5.0 130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
130 11,344 5.0 135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	
135 11,221 5.0 140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	
140 11,108 5.0 145 11,005 5.0 150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	
150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	
150 10,909 5.0 155 10,822 5.0 160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
160 10,741 5.0 165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	_
165 10,666 5.0 170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	
170 10,597 5.0 175 10,532 5.0 180 10,473 5.0	-
175 10,532 5.0 180 10,473 5.0	_
180 10,473 5.0	
185 10,417 5.0	-
190 10,366 5.0	_
195 10,318 5.0	
200 10,273 5.0	
205 10,232 5.0	
210 10,193 5.0	
215 10,156 5.0	
220 10,122 5.0	
225 10,090 5.0	•
230 10,061 5.0	
235 10,033 5.0	_
240 10,006 5.0	_
245 9,982 5.0	
250 9,958 5.0	

· ·						
25		37	5.	<u> </u>		
26		6	5.			
26		7	5.0	_	·	_
27	0 9,87		5.0			- -
27	5 9,86		5.0	_		
280	9,84	5	5.0	_		
285	9,83	_	5.0			
2,90			5.0			
295	9,80		5.0	_		
300	9,78		5.0			_
305	9,77		5.0	╀		
310	9,76		5.0	╀		_
315	9,754	_	5.0	╁		
320	9,744	1	5.0	╁		4
325	9,734	十	5.0	╁	 -	4
330	9,724	†	5.0	╀	-	-1
335	9,715	T	5.0	┢	·	
340	9,707	T	5.0	┝	<u> </u>	4
345	9,698	T	5.0	┝		-1
350	9,690	1	5.0	┝		4
355	9,683	Τ	5.0	۳		\dashv
360	9,675	I	5.0	_		╣
365	9,668	Γ	5.0	_		┥
370	9,661	Γ	5:0	_		┪
375	9,655	Ŀ	5.0	_	·	┥
380	9,648		5.0	Ť.		┥.
385	9,642	L	5.0	_	:	٦
390 395	9,636	L	5.0			1
400	9,630	_	5.0			1
405	9,624	_	5.0			1
410	9,618	_	5.0			7
415	9,613	-	5.0		•	1
420	9,607		5.0			7
425	9,602 9,596		5.0]
430	9,591		5.0]
435	9,585		5.0]
440	9,580		2.5]
445	9,575	_	2.5			1
450	9,569		2.5		<u> </u>]
455	9,564		2.5			
460	9,559	_		••		
465	9,553	-	2.5			
· 470	9,548		2.5			1
475	9,543		2.5			
480	9,537		2.5			'
485	9,531	_	2.5		·	
490	9,525		2.5			
495	9,519		2.5			
	-10.0	_	2.5			

500	9,513	2.5
504	. 9,507	2.5

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA.

ALAMITOS GENERATING STATION UNIT 7

Unit 7 Size Minimum Load 133 MW

ALAMITOS GENERATING STATION UNIT 7				
Load	HR	Ramp Rate .		
MW	BTU/KWh	MW/MIN		
133	海南河 1058年	na		

Note:

1. AES does not guarantee Heat Rate.

HUNTINGTON BEACH GENERATING STATION UNIT 1

Unit 1

Size

Minimum Load

215 MW 20 MW 65 MW

Minimum Load On AGC

		,	n wisk		
HUNTINGTON BEACH GENERATING STATION UNIT 1					
Load	HR	Ramp Rate	TING STATION UNIT 1		
MW	BTU/KWh	MW/MIN	 		
		MINAMMA			
5	E TANKE BEE				
10		na	 		
15	7: 1	na na			
20	EN 19815/303	na			
25	200 MARINE	na 5.0	<u> </u>		
30	**** * (Date()	5.0			
35	PART PROT	5.0			
40	#X##121325	5.0			
45	30 G G 1992	5.0			
50	24 23 11725	5.0			
55	11,506	5.0			
60	11,317	5.0			
65	11,157	5.0			
70	11,018	5.0			
75	10,897	5.0			
80	10,791	5.0	· · · · · · · · · · · · · · · · · · ·		
85	10,696	5.0			
90	10,611	5.0			
95	10,535	5.0			
100	10,466	5.0			
105	10,403	5.0			
110	10,346	5.0			
115	10,294	5.0			
120 l	10,245	5.0			
130	10,201	5.0			
135	10,159	5.0			
140	10,121	5.0			
145	10,085	5.0			
150	10,032	5.0			
155		5.0			
160	9,992 9,965	5.0			
165	9,940	5.0			
170	9,917	5.0			
175	9,894	5.0			
180	9,874	5.0 5.0			
185	9,854	5.0			
190	9,836	5.0			
195	9,819	2.5			
200	9,803	2.5			
205	9,789	2.5			
210	9,775	2.5			
215	9,762	2.5			
220	9,749	2.5			
226	9,736	2.5			
		2.5	<u> </u>		

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA..

HUNTINGTON-BEACH GENERATING STATION UNIT 2

Unit 2 Size

215 MW

Minimum Load

20 MW

Minimum Load On AGC

65 MW

Load	HR	Dame Det	NG STATION UN
MW	BTU/KWh	Ramp Rate	
-	DIOWAAU	MW/MIN	
- 5			
10		na	
15		na	
20	7	na	
25	# 5835	na	
· 30	9596	5.0	
35	(2.55	5.0	
40	3.13	5.0	
45	2565	5.0	
50	2003	5.0	
55		5.0	
60	11,677	5.0	
65	11,475	5.0	
70	11,304	5.0	
75	11,156	5.0	
80	11,028	5.0	
85	10,916	5.0	
90	10,817	5.0	
95		5.0	
100	10,649	5.0	
105	10,577	5.0	
110	10,511	5.0	
115	10,397	5.0	
120	10,347	5.0	
125	10,301	5.0	· ·
130	10,258	5.0	
135	10,218	5.0	
140	10,181	5.0	
145	10,146	5.0	
150	10,114	5.0	
155	10,083	5.0	
160	10,054	5.0	
165	10,027	5.0	
170	10,001	5.0	
175	9,977	5.0	
180	9,954		
185	9,932	5.0	
190	9,912	5.0	*
195	9,892	5.0 2.5	<u>.</u>
200	9,873		
205	9,855	2.5	
210	9,838	2.5	
215	9,822	2.5	
220	9,806	2.5	

^{1.} AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA.

HUNTINGTON BEACH GENERATING STATION UNIT 5

Unit 5

Size

133 MW

Minimum Load

133 MW

HUH	NTINGTON BEAC	H GENERATI	NG STATION UNIT 5
Load	HR	Ramp Rate	
MW	. BTU/KWh ·	MW/MIN	
133	地震 到6.500	na	

Note:

1. AES does not guarantee Heat Rate.

REDONDO BEACH GENERATING STATION UNIT 5

Unit 5

Size

175 MW 10 MW

Minimum Load

Minimum Load On AGC

45 MW

Redondo Go	enerating Sta	diam Hant Bath	
Load	HR	Ramp Rate	Calculations Unit 5
MW	BTU/KWh	MW/MIN	
	DIOMANI	MANATAIN	
5			
10	49,038,	ла	
15	255,668		
20	28.8.6	5.0	
25	2.05	5.0	
30	22,033	5.0	
35	40.825	5.0	·
40	8.6934	5.0	
45	13,686	5.0	
50	13,396	5.0	
55	13,159	5.0	
60	12,961	5.0	
65	12,795	5.0	
70	12,654	5.0	
75	12,532	5.0	***
80	12,532	5.0	
85	12,334	5.0	<u> </u>
90	12,254	5.0	
95	12,183	5.0 5.0	
100	12,121	5.0	
105	12,066	5.0	
110	12,018	5.0	<u></u>
115	11,976	5.0	····
120	11,939	5.0	
125	11,907	5.0	
130	11,879	5.0	
135	11,855	5.0	
140	11,835	5.0	
145	11,817	5.0	
150	11,804	5.0	
455	11,792	5.0	
160	11,784	2.5	
165	11,778	2.5	
170	11,775	2.5	
175	11,774	2.5	
180	11,773	2.5	
184	11,772		
104	11,612	2.5	

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA...

REDONDO BEACH GENERATING STATION

Unit 6

Size

175 MW

Minimum Load

10 MW

Minimum Load On AGC

45 MW

Redondo G	anasatina Sta		
Load	HR HR	non Heat Rate	Calculations Unit 6
MW	BTU/KWh	Ramp Rate	
19199	BIOKVVII	MWMIN	
5			
		na	
15	#1 46730	na	
. 20		5.0	
25		5.0	,
30	2000年	5.0	
35	2 7 7 7 7	5.0	
	36	5.0	
40	40.005	5.0	
45	13,685	5.0	
50 55	13,395	5.0	
	13,158	5.0	
60 65	12,960	5.0	
	12,794	5.0	
70	12,653	5.0	
75	12,531	. 5.0	
80	12,425	5.0	
85	12,333	5.0	
90	12,253	5.0	
95	12,182	<u>'5,0</u>	
100	12,120	5.0	
105	12,065	5.0	
110	12,017	5.0	
115	11,975	5,0	
120 125	11,938	5.0	
	11,906	5.0	
130 135	11,878	5.0	<u> </u>
	11,854	5.0	
140	11,834	5.0	
145	11,816	5.0	
150	11,803	5.0	
155	11,791	5.0	
160	11,783	2.5	
165	11,777	2.5	
170	11,774	2.5	
175	11,773	2.5	
180	11,772	.2.5	
184	11,771	2.5	

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA...

REDONDO BEACH GENERATING STATION

Unit 7

Size

480 MW 130 MW 180 MW

Minimum Load

Minimum Load On AGC

Load		on Heat Rate (Calculations Unit 7
MW	1 1317	<u>Ramp</u> Rate	
130	BTU/KWh	MW/MIN	
	11,400	па	
135	11,263	2.5	
140	11,138	2.5	
145	11,024	5.0	
150	10,919	5.0	
155	10,823	5.0	
160	10,735	5.0	•
165	10,654	5.0	
170	10,579	5.0	
175	10,510	5.0	
180	10,447	5.0	
185	10,388	5.0	
. 190	10,333	5.0	
195	10,282	5.0	. •
200	10,235	5.0	
205	10,192	5.0	
210	.10,151	5.0	
215	10,114	5.0	
220	10,078	5.0	
225	10,046	5.0	
230	10,015	5.0	
235	9,987	5.0	
240	9,960	5.0	
245	9,935	5.0	<u> </u>
250	9,912	5.0	
255	9,890	. 5.0	
260	9,870	5.0	
265	9,850	5.0	· · · · · · · · · · · · · · · · · · ·
270	9,832	5.0	
275	9,815	5.0	•
280	9,799	5.0	
285	9,784	5.0	
290	9,770		
295	9,756	5.0	
300	9,744	5.0	
305	9,731	5.0	
310	9,720	5.0 5.0	

315 9,709 5.0 320 9,698 5.0 325 9,688 5.0 330 9,678 5.0 335 9,669 5.0 340 9,660 5.0 345 9,651 5.0 350 9,642 5.0 355 9,634 5.0 360 9,626 5.0 365 9,618 5.0 370 9,610 5.0 380 9,595 5.0 385 9,587 5.0 390 9,579 5.0 400 9,564 5.0 405 9,557 5.0 410 9,549 5.0	
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415 9,542 5.0	ᅱ
420 9,534 5.0	ᅥ
425 9,526 5.0	ᅥ
430 9,518 5.0	ᅱ
435 9,510 2.5	ᅦ
440 9,502 2.5	┪
445 9,494 2.5	_
450 9,485 2.5	╗
455 9,477 2.5	7
460 9,468 2.5	\neg
465 9,459 2.5	
470 9,450 2.5	
475 9,441 2.5	
480 9,431 2.5	
485 9,421 2.5	
490 9,411 2.5	\neg
495 9,401 2.5	
500 9,391 2.5	÷
504 9,381 2.5	-

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA.

REDONDO BEACH GENERATING STATION

Unit 8

Size 480 MW Minimum Load 130 MW

Minimum Load On AGC 180 MW

Redondo Ge	nerating Statio	n Heat Rate Ca	alculations Unit 8
Load	HR	Ramp Rate	
MW	BTU/KWh	MW/MIN	
130	11,228	na	
135	11,133	2.5	
140	11,046	2.5	
145	10,964	5.0	
150	10,889	5.0	•
155	10,818	5.0	
160	10,752	5.0	
165	10,690	5.0	
170	10,632	5.0	
175	10,577	5.0	
180	10,525	5.0	
185	10,476	. 5.0	· · · · · · · · · · · · · · · · · · ·
190	10,430	5.0	
. 195	10,387	5.0	
200	10,346	5.0	
205	10,306	5.0	·
210	10,269	5.0	
· 215	10,234	5.0	
220	10,200	5.0	
225	10,168	5.0	
230	10,138		
235		,5.0	
240		5.0	
245		5.0	
250			
255			
260			
265			
270			
275			·
280	9,897	5.0	
285	9,878	5.0	
290	9,860	5.0	
295			
300			
305			
310			

315	9,779	5.0	
320	9,765	5.0	
· 325	9,751	5.0	
330	9,737	5.0	
335	9,724	5.0	
340	9,712	5.0	
345	9,700	5.0	
350	9,688	5.0	
355	9,677	5.0	•
_ 360	9,666	5.0	•
365	9,656	5.0	
370	9,646	5.0	
375	9,636	5.0	
380	9,626	5.0	
385	9,617	5.0	
390	9,608	5.0	
395	9,600	5.0	
400	9,592	5.0	
405	9,584	5.0	
410	9,576	5.0	
415	9,569	5.0	
420	9,562	5.0	
425	9,555	5.0	· · · · · · · · · · · · · · · · · · ·
430	9,548	5.0	
435	9,541	2.5	
440	9,535	2.5	
445	9,529	2.5	
450	9,523	2.5	
455	9,518	2.5	•
460	9,512	2.5	
465	9,507	2.5	
470	9,502	2.5	
475	9,497	2.5	
480	9,492	2.5	
485	9,487	2.5	
490	9,482	2.5	·
495	9,477	2.5	·
· 500	9,472	2.5	
504	9,467	2.5	

Note:

1. AES does not guarantee Heat Rate Below 25% except when operating persuant to an ISO directive under the MRA in which case the heat rate is guaranteed below 25% in accordance with the MRA.

SCHEDULE 8.2* Dispatch and Operating Procedures

Scheduling Coordinator

WESCO will be the Scheduling Coordinator ("SC") for all 14 Units, pursuant to the Scheduling Coordinator Agreement dated as of May ____, 1998 ("SCA") between WESCO and the AES Subsidiaries. As SC, pursuant to the SCA, WESCO will have exclusive responsibility for the interface with the ISO for all Non-market Transaction dispatch requests and the PX for all Market Transaction dispatch requests. The dispatch responsibility will include all Net Electric Energy and Ancillary Services. The AES Subsidiaries will be responsible for operation of the Units to the requested Capacity level and for provisions of the requested Ancillary Services each hour.

Maintenance and Outages

Planned Outages. (a) WESCO shall furnish to the AES Subsidiaries on or prior to the Effective Date and on each August 1 during the term a forecast of the operation of the Facilities for the following three years in order to provide the AES Subsidiaries with planning information to support the AES Subsidiaries' scheduling of Planned Outages. WESCO shall provide updates to the forecast in a timely manner if WESCO's expectations change materially.

- (b) The AES Subsidiaries shall furnish to WESCO on or prior to the Effective Date and on each September 15 during the Term a forecast of the Planned Outage for all Units for the following three years. The AES Subsidiaries shall provide updates to the forecast in a timely manner, but not less frequently than quarterly.
- (c) The AES Subsidiaries shall coordinate the scheduling of all Planned Outages with WESCO and such schedule shall be consistent with the terms of the MRAs and subject to WESCO's reasonable approval and the provisions of Paragraph (d), below.

The AES Subsidiaries will submit to WESCO a 15-month Planned Outage schedule for each Unit no later than September 15 of each calendar year. WESCO will indicate its approval or objection to the proposed Planned Outage Schedule by December 15 of the same calendar year. The AES Subsidiaries shall update the Planned Outage Schedule each January 1, April 1, and July 1 for the following 12 months. The quarterly updates shall indicate any proposed changes to previously approved Planned Outages, such changes, except as noted in paragraph (e) below, are subject to WESCO approval. Requests for Planned Outages or changes therein must include the following information:

- The affected Unit and the reason for the outage
- The work to be performed
- The earliest date the outage can begin
- The latest the outage can begin
- The expected duration of the outage
- The date the AES Subsidiaries would propose to begin the outage.

The AES Subsidiaries shall update the Planned Outage Schedule and provide Notice thereof to WESCO from time to time during the Term as provided in Schedule 8.2. Any change in the Planned Outage Schedule or any of the matters set forth therein shall be subject to the approval of WESCO. The AES Subsidiaries shall notify WESCO immediately upon the occurrence of any event or circumstance which could delay any affected Unit's return to service on the scheduled date thereof.

of Subject to further agreement by the parties.

- (d) Planned Outages shall not be scheduled during any Designated Month. In each Contract Year WESCO will provide the AES Subsidiaries at least two periods, separated by at least ninety (90) Days unless the AES Subsidiaries shall consent otherwise, of two and one-half consecutive non-Designated Months for scheduling of Planned Outages.
- (e) Subject to the provisions of paragraph (d), the AES Subsidiaries will be permitted to change the schedule for a Planned Outage upon three (3) months' Notice to WESCO; provided that the change does not result in more than one (1) Unit per Facility being the subject of a Planned Outage at the same time.

For all Planned Outages, the AES Subsidiaries will provide WESCO a request to commence the Planned Outage no earlier than 7 days before the outage and no later than 3 days before the start of the outage. WESCO will provide the AES Subsidiaries with approval and confirmation of the Planned Outage within 24 hours of the planned start date. The advance approval notice is subject to the requirements of the MRAs. The AES Subsidiaries will be responsible to notify immediately WESCO if there is any change to an approved outage. The notification is required with respect to changes in outages that have not begun and outages that are in progress.

Maintenance Outages. The AES Subsidiaries shall coordinate the scheduling of all Maintenance Outages and Maintenance Deratings during the Term with WESCO in accordance with the procedures therefor in this Schedule 8.2 The AES Subsidiaries shall provide Notice to WESCO of (i) the reason for each Maintenance Outage or Maintenance Derating, (ii) the Unit or Units affected, and (iii) the proposed date and time for the commencement and termination of such Maintenance Outage or Maintenance Derating (a "Maintenance Outage Schedule") from time to time during the Term as provided in this Schedule 8.2. Any change in a Maintenance Outage Schedule or in any of the matters set forth therein shall be subject to the procedures set forth therefor in this Schedule 8.2. The AES Subsidiaries shall notify WESCO immediately upon the occurrence of any event or circumstance which could result in the inability of the affected Units to return to service on the scheduled date therefor.

Forced Outages. The AES Subsidiaries shall provide Notice to WESCO as soon as possible concerning any Forced Outage or Forced Derating setting forth (i) the reason for such Forced Outage or Forced Derating, (ii) the Unit or Units affected and (iii) the proposed date and time for the termination of such Forced Outage or Forced Derating (a "Forced Outage Schedule") during the Term as provided in this Schedule 8.2. Any change in a Forced Outage Schedule or in any of the matters set forth therein shall be subject to the procedures set forth therefor in Schedule 8.2.

If the AES subsidiaries must perform a Maintenance Outage, Forced Outage, Maintenance Derating or Forced Derating, the AES Subsidiaries will immediately provide WESCO with an outage request that includes the following information:

- · The affected Unit and the reason for the outage or derating
- The work to be performed
- The earliest date the outage or derating can begin (or began)
- The latest the outage can begin (if applicable)
- The expected duration of the outage
- The date the AES Subsidiaries would propose to begin the outage (if applicable)

WESCO will provide the AES Subsidiaries WESCO's preferred outage dates within 24 hours of the receipt outage request. If the WESCO dates and the AES Subsidiaries dates do not coincide, the parties will work in good faith to determine the outage date and if unable to agree, the outage schedule will be determined pursuant to Article XII.

Scheduling

The AES Subsidiaries will provide a weekly Unit status Notice each week no later than 04:30 PPT each Monday for the next 7 Days.

WESCO will provide the AES Subsidiaries with an anticipated daily Unit forecast for the next 7 Days, each Monday no later than 11:00 PPT.

The AES Subsidiaries will provide WESCO a monthly report of actual Unit Planned Outage Hours, Maintenance Outage hours, Forced Outage hours, Maintenance Derating hours, Forced Outage hours, attempted Start-ups (Hot, Cold and Warm), actual Start-ups (Hot, Cold and Warm), Gas consumed, oil consumed, electricity consumed, actual Net Electric Energy delivered and actual MVARs within 10 days following the end of each month for each Unit. The report will indicate whether Unit Maintenance Outage hours during the month will count against the pool of Unit Planned Outage Hours.

WESCO will Dispatch the Units within the limits described in Schedules A, B, 4.1, 5.4, and 6.

The AES Subsidiaries will communicate with WESCO on a daily basis or instantaneously as changes warrant with respect to the availability and status of each Unit. If a WESCO Dispatch Notice includes a Unit Start-up, the AES Subsidiaries will notify WESCO by telephone when the Unit is synchronized and at minimum load ready to be dispatched to the required output. The AES Subsidiaries shall fax a copy of a completed Unit Start-up notice to WESCO within 24 hours of a Unit Start-up. When a dispatch notice requires a Unit Start-up or Shutdown, the AES Subsidiaries will be responsible to coordinate all required switching with the SCE Grid Control Center.

WESCO and the AES Subsidiaries will communicate all dispatch requests and Unit status Notices by telephone and fax. In the event of a failure of the primary communication link between the AES Subsidiaries and WESCO, both parties will try all available means to communicate including cell phones or additional communication devices as installed. WESCO will install a dedicated phone line, phone and fax machine in the following AES control rooms:

- Alamitos 1 and 2 (if units are off notice will be sent to AL 3 & 4)
- Alamitos 3 and 4, will serve as location for Unit 7 peaker
- Alamitos 5 and 6
- Huntington Beach 1 and 2, will serve as location for Unit 5 peaker
- Redondo Beach 5 and 6
- Redondo Beach 7 and 8

The AES Subsidiaries will be responsible to maintain all equipment within the facilities required by WESCO for proper Unit dispatch, AGC control, Unit status and Unit performance. The AES Subsidiaries will be responsible to maintain the Unit AGC signals to the ISO Energy Control Center.

The ISO reserves the right to communicate directly with the AES Subsidiary generating stations in the event of a system emergency. The AES Subsidiaries will be responsible to inform WESCO as soon as possible of all changes to the schedule or Unit status requested by the ISO as a result of a system emergency. The AES Subsidiaries will be responsible to maintain the required communication links to the ISO.

In the event a Unit is unable to meet a scheduled dispatch notice for any hour, the AES Subsidiaries will immediately call the WESCO dispatcher and inform them of the Unit status. The AES Subsidiaries shall fax a Unit Status Notice and Forced Outage Notice for the affected Units immediately following the phone calls. The Forced Outage Notice should include an estimated time and date the Unit will return to normal.

If a WESCO dispatch request requires an additional ancillary service persuant to Article 5, paragraph 5.3, the AES Subsidiaries will be responsible to notify and provide WESCO with a cost for the requested

service, within 1 hour of the dispatch request. WESCO will approve or change the dispatch request prior to issue of the Final Daily Dispatch Notice. All WESCO requested dispatch notices are considered accepted by the AES Subsidiaries unless WESCO is notified as stated above.

The Daily Unit Availability Notice, Unit Status Change Notices, Maintenance Outage Notices and Forced Outage Notices will be used by WESCO to calculate the hourly Unit availability for the month.

WESCO expects to participate in several PX markets. These include the day ahead market, hour ahead market and real time market. There will be several types of dispatch notices each day as a result of the various markets. Attached are copies of the dispatch notices.

The following is a time line for the Day Ahead Market.

Day Ahead Market

All times are latest allowable using PPT in relation to Trading Day. Trading Day is the day the power flows.

This is the current timeline and is subject to revision as the ISO, PX, characteristics of plants and system. conditions change.

All communication between WESCO and the AES Subsidiaries will be by fax and confirmed by telephone unless otherwise specified.

The ISO may, pursuant to its Participating Generator Agreement with the AES Subsidiaries, communicate directly to each control room in the event of a system emergency.

Plant operators will telephone and fax Unit status to WESCO every morning and telephone the WESCO dispatcher immediately if the status or available Capacity should change within the day. The AES Subsidiary operator shall immediately confirm the Unit status change by fax to WESCO.

Time	Action
0430 One Day Ahead	AES plant operators fax Availability Notice to WESCO
0500 One Day Ahead	WESCO confirms, by telephone, to plant operators, receipt of Availability Notice.
1400 One Day Ahead	WESCO forwards preferred Day-Ahead schedules to plant operators by fax and confirm receipt by telephone
1500-1700 One Day Ahead	WESCO updates plant operators, by telephone, on adjusted Day-Ahead schedules
1830 One Day Ahead	WESCO will notify plant operators by fax of final Unit Dispatch schedule for the Trading Day, and confirmed by telephone
1845 One Day Ahead	AES plant operators verify, by phone, receipt of Final Unit Dispatch Schedule for the Trading Day.

The following is the time line for the Hour Ahead schedule.

Hour Ahead Market

All times are latest allowable using PPT in relation to Trading Hour.

This is the current timeline and is subject to revision as the ISO, PX, characteristics of plants and system conditions change.

All communication between WESCO and AES will be by fax and confirmed by telephone, unless otherwise specified.

The ISO is will communication directly to each control room in the event of a system emergency.

The AES Subsidiaries will telephone the WESCO dispatcher immediately if status or availability Capacity of a Unit should change within the day. The AES Subsidiary operator shall confirm the telephone notice with a Unit status update fax to WESCO immediately thereafter.

Two hours ahead WESCO submits its preferred Hour-Ahead schedules, any adjustment bids, any

Ancillary Services bids, and any self-provision schedules to the ISO or PX.

One hour ahead WESCO provides a fax to the AES Subsidiaries of an updated schedule for the dispatch of the affected Units. The AES Subsidiaries will confirm receipt of the

fax telephonically to WESCO dispatcher.

The following is the time line for the real time schedule.

Real Time Market

All times are latest allowable using PPT in relation to Trading Hour

This is the current timeline and is subject to revision as the ISO, PX, characteristics of plants, and system conditions change.

All times are latest allowable using PPT in relation to Trading Hour

30 Minutes Ahead

WESCO submit supplemental energy bids to the ISO.

ISO delivers hourly dispatch notice to must-run owner's SCs

During Trading Hour

ISO operates the system, procures imbalance Energy and issues real-time

dispatch instructions, including Must-Run Dispatch Notices

AES UNIT MAINTENANCE/FORCED OUTAGE REQUEST

Today's Date://	Affect	ted Unit:		
Name of Requestor:				
Type of Outage Requested:	Force	i Mai	ntenance	
Earliest Outage Start Date:/	_/_	Start Time:	Hours	
Latest Outage Start Date:/_	ــــــــــــــــــــــــــــــــــــــ	Start Time:	Hours	
Preferred Outage Start Date:				
Outage Duration: Days			·	
MW Unavailable:		_ww		
Work To Be Performed:				
<u> </u>			<u> </u>	
		<u></u>		
•		<u>.</u> .		
	-	• •		:
				· · · · · · · · · · · · · · · · · · ·
			•	•
Special Conditions:	•			•
	<u></u>			:
			T T	
Emergency Return To Service WESCO Approval:	Time:		Hours	

AES DAILY UNIT AVAILABILITY NOTICE

1:00% Avail our Ending 1:00 2:00 3:00 4:00 5:00 6:00 7:00	Alamitos AL 1 lable No Restriction Available Output (MW)		Issued By: Issued At: AGC Available YES/NO	AGC Min Limit (MW)	AGC Max Limit (MW)	Ramp Rate MW/Min	Comments
1:00 2:00 3:00 4:00 5:00 6:00 7:00	Available Output	Minimum Output			(MW)	MW/Min	T:
1:00 2:00 3:00 4:00 5:00 6:00 7:00					(MW)	MW/Min	Comments
1:00 2:00 3:00 4:00 5:00 6:00 7:00	(MW)	(MW) (non AGC)	YES/NO	(MW)		MW/Min	
2:00 3:00 4:00 5:00 6:00 7:00							
3:00 4:00 5:00 6:00 7:00 8:00						•	
4:00 5:00 6:00 7:00 8:00							
5:00 6:00 7:00 8:00							
6:00 7:00 8:00							
7:00 8:00							
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9:00							
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17:00		•					•
18,00							<u> </u>
19:00	<u> </u>					<u> </u>	
20:00							
21:00		ļ <u>.</u>			<u> </u>		
22:00	·				<u> </u>		
23:00						<u> </u>	
0:00	-		<u> </u>		<u> </u>	<u> </u>	
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AES UNIT STATUS CHANGE NOTICE

Generation	Date		•
Station Unit	Alaman Alaman	Issued By:	
Date and ti	ime unit expected to return to non	nal status	
Comments			
			
	·		

Hour Ending	Available Output	Minimum Output	AGC Available	AGC Min Limit	AGC Max Limit	Ramp Rate	Comments
	(MVV)	(MW) (non AGC)	YESMO	(MW)	(MW)	MVV/Min	
1:00							
2:00	· · · · · · · · · · · · · · · · · · ·						
3:00			•				
4;00							· · · · · · · · · · · · · · · · · · ·
5:00							· · · · <u>·</u> · · · ·
6:00					<u> </u>		- 4112-12
7:00				<u> </u>			
8:00			ļ	<u> </u>	<u> </u>		
9;00	<u></u>	ļ	ļ	<u> </u>	ļ		
10:00		<u> </u>		ļ	<u> </u>	<u></u>	
11:00		<u> </u>		<u> </u>			
12:00				ļ:		· · · · · · · · · · · · · · · · · · ·	
13:00		 	<u> </u>	 	-		
14:00		\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	 	 	 		
15:00			 		-	 	
16;00					 		
17:00	1	ļ	 	 	 -	 	
18:00		<u> </u>	<u> </u>		 		
19:00		<u> </u>	-		 	 	
20:00	1	 	 			 	
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22:00			 		 		
23:00		 	<u> </u>		 		
0:00	ol	<u> </u>	<u> </u>		ــــــــــــــــــــــــــــــــــــــ		

AES WEEKLY UNIT AVAILABILITY NOTICE

	Date		_(notice to be sent by 4:30 PPT each Monday)
	Unit Availability for	the week of:	
Station Unit		Issued By: Issued At:	
Day	Available Output	AGC Available	Comments
Dey	(MW)	YES/NO	- Commond
Monday			
Tuesday		<u> </u>	
Wednesday			·
Thursday			
Friday			
Saturday			

WESCO PREFERED DAY AHEAD UNIT DISPATCH NOTICE

Hour Ending 5	cheduled Output	AGC Scheduled	AGC Min Èlmit					
	(MW)		AGO MALIMA	AGC Max Limit	Spinning Reserve	Non Spinning	Votage Support	Comments
		' YES/NO	(MW)	(MW)	(MW)	(MM)	Yes/No	
								•
2:00								· · · · · · · · · · · · · · · · · · ·
3:00			•					•
4:00								
5:00	·							
6:00								
7:00								
8:00								
9:00							·	
10:00	•							
11:00						,		
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14:00		-		•				
15:00	<u> </u>							
16:00								
17:00	•							
18:00				• • • • • • • • • • • • • • • • • • • •				•
19:00	`							
20:00					<u> </u>			
21:00					<u> </u>			
22:00				<u> </u>			<u> </u>	
23:00					<u> </u>		<u> </u>	
0:00				<u> </u>			1	<u> </u>

	WESCO F	INAL DAY	AHEAD UN	NIT DISPAT	CH NOTICE	•	-	
Generation D	ale	经产品的	(notice must be a	eni by 18:00 PPT e	ech cay)			
Station Unit	Amino 2 SE AE 2 SE	Issued By: Issued At:			-			
Hour Ending	Scheduled Output	AGC Scheduled	AGC Min Limit	AGC Max Limit	Spinning Reserve	Non Spinning	Voltage Support	Comments
<u> </u>	(MW)	YES/NO	(MVV)	(MW)	(MW)	(MW)	Yes/No	•
1:00							, ,	•
2:00		·						
3:00								
4:00								
- 5:00					.			,
6:00	,							
7:00					•			
8:00								· · ·
9:00			-					
10:00								
11:00								
12:00	·					,		
13:00	3							
14:00								-
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17:00		·						
18:00						•		
19:00	· ·				A		•	
20:00		<u> </u>	<u> </u>	'		•	٠	
21:00								
22:00								
23:00				,				
0:00		<u>'</u>						
Comments:								
•	•							•

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		<u> </u>									-
	•						•				

WESCO UNIT STATUS CHANGE NOTICE

Generation Station Unit	Alamitos	Issued By:				. •
Changes F Comments	rom Scheduled	Delivery are high	nlighted	 	٠.	
					· · · · · · · · · · · · · · · · · · ·	
			 	 	+	

Hour Ending	Scheduled Output	AGC Scheduled	AGC Min Limit	AGC Max Limit	Comments
	(MVV)	YES/NO	(MW)	(MW)	
1:00				•	
· 2:00		•			
3:00					
4:00			-		
5:00	·			-	
6:00					•
7:00					
8:00				. :	
9:00					
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11:00					
12:00					
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15:00					
16:00					
17:00					
18:00	-				
19:00			·		
20:00					
21:00					A Committee of the comm
22:00	i				·
23:00			1	1	
0:00				 	

AES UNIT START-UP NOTICE

Date			•		
Station	Alamitos	Issued By:			
Unit ·	A TOTAL SECTION OF THE PARTY OF	ssued At:			
Date and	Time Fire In Unit			.`	
Date and	Time Unit Synchronized				
Date and	Time Unit Released for dispatch				
Electric Co	onsumed During Start-Up			(MWh)	
Fuel Cons	umed During Start Un			/!!!!DT!!	



AES Alamitos, LLC Attn: Contact

Address

Address

Phone: Fax:

ABA ########

Invoice No; 999999 Involce Date: INVOICE Due Date: Terms:

> REMITTANCE INSTRUCTIONS Please remit by wire or ACH For the account of WESCO FNB-Chicago, Chicago IL

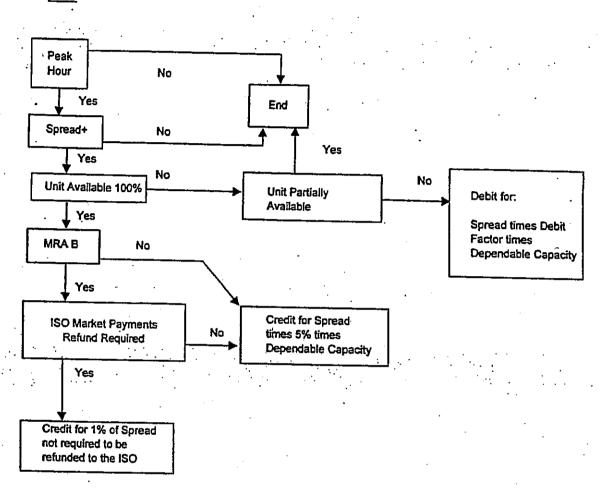
For Billing Inquiries, call contact at , (8:00 am - 5:00 pm (CST) P.O. Box 2848, Tulsa, OK 74101-9567

Trans Date	Trans Type					
Deat#	Carrier	· Description	Quantity	Chit	Rate	Item Amt
86/9		Variable Payment Market			•	
6/98	`	Variable Payment Non Market				
86/9		Ancillary Services Payment				•
86/9		Start Up Payments	٠.			٠.
86/9		Start Up Heat Rate Adjustment	· .			•
86/98	•	. Heat Rate True Up				
. 86/9		Fixed Payment			-	
86/9	-	Availability Bonus		•		
86/9		Availability Discount			49	84,837.00

Invoice Total

Availability Bonus:

Unit 1



Schedule 10.1

Example Gas Meter Adjustment Calculations

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AL 6	Gas	(MANIET)					2450.0			2450.0								l				4080.0	4512.0	3751.5	3044.7	2758.0	2450 01	2450.0		
AL 5	Gas	(MMBTile)					2450.0	2450.0	2450.0	2450.0	2450.0	2450.0	3920.0	4704.0	4704.0	4704.0	4704.0	4704		0.1057	0.502.7	27077	-1/04:C	2940.0	2940.0	2744.0	2450.0	2450.0		0 000
AL 4	Gas	(MMBTUs)				0.0001				4297.5	1	3013.9	3172.5	3331.1	3158,8	3140.8	3204.2	3236.0	3140.8	3564.0	3470.2	4002	2200	7,777	2781.9	2682.9	1583.9	1589.2		2 000 00
AL 3	GBS	(MMBTUs)	0.0	00	200	0,0	0.0	0.0	0,0	0.0	9 0	0,0	0.0	0.0	0.0	0.0	0.0	0.0	00	0.0	0.0	5	3	216	0.0	0.0	0.0	0.0		100
AL 2	385	(MMBTUs)	0.0							0.0	1		0.0	0.0	0.0	, 0.0	0.0	0.0	0.0	0.0	0	5	2	000	0.0	0.0	0.0	0.0		00
AL 1	CED	(MMBTUs)	290.0	290.0	280.0	290.0	0.000	2000			1725.0		l	4705.0	17.23.0	1725.0	1725.0	1725.0	1725.0	800.0	777.0	0.999	850.0	0000	280.0	280.0	280.0	290.0		21 303 0
Shell Gas	TO 1707 1707	OIBMM)	0.0		0.0					2				0.0			0.0					0.0				0.0	0.0	0.0		500.01
Socal Gas		21				0.0		00		0.0	00	00	000	2487.0	2101.8	C194.D	2,181,2	0.0	0.0	0.0	0.0	0.0	00	0		3	0.0	0.0		0.543.6
Unil 5 & 6	(AARABTI (e)		İ		0.006	4900,0		4900.0				7830.0	A130 0	8130.0	0420	0.00.0	0.05.0	9216.0	9216.0	9218.0	0.0088	9216.0	8800.0	G DOOR	0.0000	2300.0	4800.0	1900.0		10.040.101
Units 1,2,3 &4	(MMRTIII)	(SOLONIA)	0'C/8L	1675.0	1875.0	1875.0	1875.0	4897.5	4897.5	4897.5	4897.5	4897.5	4897.5	4897.5	4007	C. 1001	C'/ADA	4897.5	4897.5	4400.0	4300.0	4800.0	3800,0	31000	2000	3000.0	1900.0	1875.0	10000	0.777,08
John Line		4.00	00:1	2:00	3:00	4:00	5:00	9:00	7:00	8:00	9:00	10:00	11:00	12:00	13:00	12:00	00:41	nn:cr	16:00	17:00	18:00	19:00	20:00	21-00	20.00	77.00	23:00	00:00		

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	Pask Monty/ Pask Hour	MERT NORD)	0	-	•		•		•						•	•	-	-		•	• •	٠.	•	٠.	•	>
	PXCP (\$AAVMH)	200 000	\$17.775	24.44	ETK DOT	217.370	\$22.047	224.783	\$25,953	226 127	126.213	\$20,456	\$26,459	\$26.119	\$25,793	\$25,644	\$25,308	\$25,262	\$25.475	\$26 BY	278.784	\$26.223	\$25.207	124 17	40.0	000.004
	AUGC (3)	44.44.44	13048 23	51 540 24	\$1,640.28	\$1,040.28	£1.640.28	\$1,640,28	\$5,058,13	85,658.13	18,201,38	11,247.00	10,685,22	11,247,60	11,247,50	\$7,498.40	\$5,658,13	\$5,658,13	\$5,658.13	15,858,13	\$5,050.13	\$1,640,28	\$1.640.28	11,640.25	80.078.0	
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228608 -0.00046488	MRABLOSD (WWH)		•	•	٥	0	0	0	0	0	0	0	0	0	0	٥	0	۰	0	•	0	0	0	0	•	,
x. 0.28600	WRAALOSS MRABLOSS (MWH) (MWH)		0	0	0	0	•	0	•	•	0	0	•	0	0	0	0	0	٥	0	0	0	0		•	•
.72.1(63)	UHRWD: (BTURWh)	13.508	1,601	13,506	13,505	13,500	13,500	508,61	10,00	10,008	9,599	17E,0	0.373	0.373	0.373	0,689	10,006	10,000	10.00	10,000	10,008	13,506	13,500	13,500	#3 KGW	
5.0% 1.0% Constem 17,388	ACTUALUL (MWH)	20	5	2	2	2	2	2	380	260	96	\$	2	480	9	220	52	22	250	22	250	2	2	2	22	!
uogani	WESCOUL ACTUALUL (MWH) (MWH)	2	Đ.	2	2	2	2	2	250	580	98	\$	9	2	99	320	220	290	220	220	250	2	20	2	22	!
Bonus MRA & Bonus Heel Rate Equation	GP (S) (\$AAMBTU)	\$2.50	\$2.50	\$2.50	\$2.60	\$2.50	\$2.50	12.60	\$2.50	\$2.50	\$2.50	12.50	12.50	12.50	\$2,50	\$2.50	\$2,50	\$2,60	\$2,50	\$2,50	\$2.50	\$2,50	\$2.50	\$2.50	\$2.60	
460 MW 42.00 SMWH 6,500 0,600 24 hours	Unit Avelable (%)	100%	100¥	100%	+00¥	100%	1 004	100%	100%	1 00%	#00#	1 00*	*	100X	100 1	1 00%	100	¥001	100t	100	100t	1001	1001 14001	1001	*00	
9,373 \$2,00 \$ 6,500 0,508	PSTP	990	0.56	9 6.0	99.0	0.00	9	0.56	950	0.58	0.56	92.0	0.00 0.00	920	D.5G	0,54	0.00	0.50	0.56	- S	0.56	0,54	0.50	0.56	0.56	
e upc	VPP (\$AMMH)	86	\$2,00	\$2.00	\$2,00	\$2.00	\$2.00	\$ 2.00	22 00	22	\$ 2,00	23 83	23	200	\$2.00	3 2.00	\$2.00	\$2,00	\$2.00	\$2.00	\$2.00	\$2.00	\$2.00	\$2,00	5000	
ALS Dependable Cepecity Guaranteed Heat Rate & UDC Verlable Payment Actual Steri-Up Cost Debit Fector Hours Unit Scheduled to Run	GUHR (dTUANM)	6,373	0,373	9,373	6,173	5,373	ב ב	0,373	5,00	9,373	0,373	1,7C,0	0,373	0,373	0,373	9,373	9,373	9,373	0,373	6,173	0,373	0,373	0,373	5,373	L/L 0	
M. 5 Dependable Capacity Dependable Capacity Userstee Payment Actual Sterr-Up Cost Debit Fector Hours Unit Scheduld	(MM)	480	-			40	2	2	9	720	460	2	-	680	490	7	021	780	420	480	480	460	460	480	24	ļ
Unit	HOUR	5/1/98 1:00	5/1/08/2:00	5/1/26 3:00	5/1/98 4:00	S/1/86 5:00	57158 8:00	54/58 7:00	6/1/54 8:00	5/1/08 9:00	5/1/58 10:00	STAR 11:00	5/1/05 12:00	571/08 13:00	5/1/28 14:00	5/1/08 15:00	5/1/20 16:00	5/1/88 17:00	5/1/98 15:00	5///08 19:00	5/1/5/6 20:00	6/1/98 21:00	5/1/88 22:00	5/1/18 23:00	A73-A8-0-00	

Where
UDC= that Dependable Capacity
GUINE Guaranteed that Heat Rate
VPP= Variable Payment
PSTP= Promised Start-Up Payment
GP= Delivered Gas Pitce
WESCOULE WESCO Dispatched that Load
ACTUALUL: Actual Unit Load
UNRWD= thirl Heat Rate et WESCO Dispatch Load
AUSC= Actual Unit Gas Cost
PXCP=PX Clearing Price

Notes; f. The prorated start-up payment will be calculated based on expected start-up costs.

Schedule 10.1

Calculation of The Non Availability Discount Factor

Assume Contract Signed June 1 Unit Dependable capacity is

Fixed Payment is
Unit Guaranteed Availability
Calculate Non Availability Discount
NAD= FPAY/12 * UDC * 1000 * SF * AS

460 MW \$36 per KW year 85.0%

Unit Fixed Payment
Year-To-Date Unit Availability
Unit Dapandable Capacity
Shorffat Factor
Unit Guaranteed Availability YTDUY-

		1,77	A										
	JUNG	July	AUGUST	Soptomber	CCIDDAL	NOVERNOOF	Decamber	Jenuery	FEBRUARY	March	April	May	ΥŢ
NGA	7588	7698 7698	86%	%98·	9694	7,90 ·	3698	%99°	24.90	798	RG%	BRILL	100
A Bah Dite	10011	10 J. ho 1 + 1 - 1	K(14)	10.00	William I	17.10.0%	130 120	SECON CONTRACTOR	Contract Con				5
VARIACISI V	11.0	26-71	A 11.77	ALC: N			25.44.5	27	A A DIVE	4 00 th	W 487/	160 Part 180 %	77.92%
FPAY	\$38.0	\$36,0	538.0	-	\$30.0	\$38.0	\$38.0	\$36.0	\$38.0	\$36.0	\$38.0	0.852	CAR
YTDM	1	2	. 3	F	5	9	7	9	6	2	=	12	
ODC	480	460	480		400	480	480	480	480	480	480	460	ARD
YTDUA	43%	. 65%	72%		79%	81%	82%	72%	75%	78%	77%	78%	77 92%
AS	20.00%	25.00%	16,25%	11.83%	8.80%	9.40%	4.65%	16.57%	12.92%	11.63%	10.47%	9.40%	9.40%
SF	2.00	1,50	1,34	1,03	0.76	0,69	0.50	1.35	1.06	1.03	1.01	0.78	0.70
NAD YTD	\$1,520,000	\$570,000	\$332,608	\$182,499	\$99,150	\$67,255	\$35,349	\$339,646	\$207,851	\$162,499	\$160,549	\$111,720	\$1,340,635
Non Avail, Discount	\$1,520,000	-\$380,000	-\$142,176	-\$267,029	-\$234,20T	-\$92,266	-\$166,090	\$2,469,723	-\$646,508	-\$48,670	-\$68,942	-\$425,409	\$1,340,636
Capacity Payment	\$0	81,900,000	\$1,682,178	\$1,787,829	\$4,784,207	81,812,266	\$1,676,090	-\$949,723	\$2,386,608	\$1,665,670	\$1,678,942	\$1,946,409	\$16,899,366

Schedule 10.1

Spread

Spread=PXCP-(VPP+(GUHR+PSTP)*GP/1000)
Where;
PXCP=Initial Day Ahead California PX Unconstrained Clearing Price (\$/MWH)
VPP=Variable Payment Price (\$/MWH)
GUHR=Guaranteed Unit heat rate at the dependable capacity (BTU/KWh) per Schedule 7
PSTP= Prorated Start-up payment (\$)
GP=Hourly Gas Price (\$/MMBTU)

Heat Rate True Up

HRTUP=Actual Gas Cost - Guaranteed Gas Cost Where:

Actual Gas Cost = Adjusted Unit Hourly Gas Consumption (MMBTU) * Hourly Gas Price (\$/MMBTU) Guaranteed Gas Cost = (Guaranteed Unit Heat Rate at WESCO Unit Dispatch Load (BTU/KWh) * Actual Unit output (MWh) * Hourly Gas Price (\$/MMBTU) / 1000)

Notes:

- If HRTUP is negative, WESCO will credit AES, if HRTUP is positive, AES will pay WESCO HRTUP for the applicable hour.
- 2. Adjusted unit hourly gas consumption is calculated from the Unit gas meters and adjusted to the Revenue meters

* Subject to further agreement by the parties

Schedule 13.1 Environmental Matters

None

Schedule 13.1(g)

Exceptions to the representations and warranties set forth in Section 13.1(g) are made for the state of facts identified in the environmental reports delivered to WESCO and referred to below; provided, however, that the inclusion of any such matters in this Schedule 13.1(g) shall not relieve the AES Subsidiaries of any obligation they may have to indemnify WESCO or any of the Indemnified Parties with respect to such matters pursuant to Section 15.2 of the Agreement:

> 1. Phase 1 Environmental Site Assessment **Huntington Beach Generating Station**

Dated: May 1997

Submitted to:

Southern California Edison Company

Prepared by:

CH2M Hill

Revision: Final

2. Phase 1 Environmental Site Assessment Redondo Beach Generating Station

Dated: Submitted to:

May 1997

Southern California Edison Company

Prepared by:

CH2M Hill

Revision: Final

3. Phase 1 Environmental Site Assessment

Alamitos Generating Station

Dated:

May 1997

Submitted to:

Southern California Edison Company

Prepared by:

CH2M Hill

Revision: Final

Phase II Environmental Site Assessment **Huntington Beach Generating Station**

Dated: June 1997

Submitted to:

Southern California Edison Company

Prepared by:

CH2M Hill

Revision: Final

5. Phase II Environmental Site Assessment Redondo Beach Generating Station

Dated: June 1997

Submitted to:

Southern California Edison Company CH2M Hill

Prepared by:

Revision: Final

6. Phase II Environmental Site Assessment

Alamitos Generating Station

Dated: June 1997

Submitted to:

Southern California Edison Company

Prepared by:

CH2M Hill

Revision: Final

7. Draft Site Investigation Report for Soil and Groundwater -Redondo Beach Generating Station, Redondo Beach, California

Dated: April 1998

Prepared by: Woodward - Clyde

8. Draft Site Investigation Report for Soil and Groundwater -Alamitos Generating Station, Long Beach, California Dated: April 1998

Prepared by: Woodward - Clyde

9. Draft Site Investigation Report for Soil and Groundwater -Huntington Beach Generating Station, Huntington Beach, California Dated: April 1998

Prepared by: Woodward - Clyde

SCHEDULE 16 Capacity Sale and Tolling Agreement between AES and WESCO

- (A) AES Subsidiaries shall purchase and maintain All Risk Insurance including the perils of flood and earthquake covering all property, material and equipment, while in transit, during loading and unloading, while in storage, while at another location for repair and during installation in an amount not less than \$250,000,000. per occurrence combined limit for property damage and business interruption. Perils of earthquate and flood will contain annual aggregates of \$100,000,000. for earthquake and \$250,000,000. for flood. This insurance shall include the interests of the AES Subsidiaries, operator and WESCO.
- (B) Worker's Compensation insurance complying with the laws of the State or States having jurisdiction over each employee, and Employer's Liability with limits of \$1,000,000 each accident, \$1,000,000 disease each employee, and \$1,000,000 disease policy limit.
- (C) Commercial or Comprehensive General Liability insurance on an occurrence form with a combined single limit of \$1,000,000 each occurrence, and annual aggregates of \$1,000,000, for bodily injury and property damage, including coverage for blanket contractual liability, broad form property damage, personal injury liability, independent contractors, products/completed operations, sudden and accidental pollution liability and the explosion, collapse and underground exclusion will be deleted.
- (D) Automobile Liability insurance with a combined single limit of \$1,000,000 each occurrence for bodily injury and property damage to include coverage for all owned, non-owned, and hired vehicles.
- (E) Excess or Umbrella Liability insurance with a combined single limit of \$25,000,000.each occurrence, and annual aggregates of \$25,000,000 for bodily injury and property damage covering excess of Employers Liability and the insurance described in (B) and (C) above.

Irrespective of the insurance requirements above, the insolvency, bankruptcy, or failure of any such insurance company providing insurance for AES Subsidiaries, or the failure of any such insurance company to pay claims that occur will not be held to waive any of the provisions hereof.

In the event any Lender requires higher limits, broader coverage or lower retentions WESCO will also receive the benefit of such insurance coverages.

SCHEDULE 19.1

CORPORATE GUARANTEE

GUARANTEE (this "Guarantee"), dated as of May 1, 1998, by WILLIAMS
HOLDINGS OF DELAWARE, INC., a Delaware corporation (the "Guarantor"), in favor of
Credit Suisse First Boston, New York Branch, as Agent and Collateral Agent (the
"Counterparty") under that certain Credit Agreement, dated as of May ___, 1998, as amended,
modified or supplemented from time to time (the "Credit Agreement"), among AES Alamitos,
L.L.C., a Delaware limited liability company, AES Huntington Beach, L.L.C., a Delaware limited
liability company, and AES Redondo Beach, L.L.C., a Delaware limited liability company
(collectively, the "AES Subsidiaries") and the Counterparty.

1. Guarantee. For good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, the Guarantor unconditionally and irrevocably guarantees the prompt payment and performance when due of all present and future obligations of Williams Energy Services Company, a Delaware corporation and a subsidiary of the Guarantor (the "Company"), (i) to make Fixed Payments pursuant to and as defined in that certain Capacity Sale and Tolling Agreement dated as of May ___, 1998 between the Company and the AES Subsidiaries (the "Tolling Agreement") or (ii) otherwise arising in respect of the Company's obligation to make Fixed Payments under the Tolling Agreement, together with reasonable expenses (including reasonable attorneys' fees and expenses) incurred by the Counterparty in enforcing this Guarantee (the "Obligations"). The Guarantor agrees, that upon the failure of the Company to pay any of the Obligations when they become due, the Guarantor will pay, or cause to be paid, any and all such unpaid Obligations.

2. Maximum Guaranteed Amount.

- (a) The aggregate liability of the Guarantor under this Guarantee and the Counterparty's right of recovery hereunder is limited to a total aggregate amount of \$1.05 billion (\$1,050,000,000.00), as reduced from time to time as provided for in the following paragraph (the "Guarantee Cap").
- (i) the proportion of the amount set forth in Exhibit A hereto and corresponding to such semi-annual period that the amount of Fixed Payments for such semiannual period actually paid by WESCO under the Tolling Agreement bears to the amount of Fixed Payments due and payable for such semiannual period and (ii) the amount paid by the Guarantor in such semiannual period pursuant to the demand of or legal action by the Counterparty. Each reduction in the Guarantee Cap shall be automatic and without further action on the part of any party.
- 3. <u>Nature of Guarantee</u>. The Guarantor's obligations hereunder with respect to the Obligations shall not be affected by the existence, validity, enforceability, perfection, or extent of any collateral for the Obligations. The Counterparty shall not be obligated to file any claim

relating to the Obligations owing to them in the event that the Company becomes subject to a bankruptcy, reorganization or similar proceeding and the failure of the Counterparty to so file shall not affect the Guarantor's obligations hereunder. In the event that any payment to the Counterparty in respect to the Obligations is rescinded or must otherwise be returned for any reason whatsoever, the Guarantor shall remain liable hereunder in respect to such Obligations as if such payment had not been made. The Guarantor reserves the right to assert defenses which the Company may have to payment of any Obligation other than defenses arising from the bankruptcy or insolvency of the Company and other defenses expressly waived hereby.

- Consents, Waivers and Renewals. The Guarantor agrees that the AES Subsidiaries and the Company may mutually agree to modify, compromise, rescind or release the Obligations and any security therefor or any agreement between the AES Subsidiaries and the Company in accordance with the Tolling Agreement, without in any way impairing or affecting this Guarantee; provided, however, no action taken pursuant to this Section 4 shall be construed to increase the amount of the Guarantee Cap. The Guarantor agrees that the Counterparty may resort to the Guarantor for payment of any of the Obligations, whether or not the Counterparty shall have resorted to any collateral security or shall have proceeded against any other obligor principally or secondarily obligated with respect to the Obligations. The Guarantor hereby waives notice of acceptance of this Guarantee, and presentment, protest and notice of protest or dishonor
- Subrogation. Upon payment of all the Obligations, the Guarantor shall be subrogated to the rights of the AES Subsidiaries against the Company, and the AES Subsidiaries agree to take, at the Guarantor's expense, such steps as the Guarantor may reasonably request to implement such subrogation.
- Address for Notices. Any notice, request, consent, waiver or other communication required or permitted hereunder shall be effective only if it is in writing and personally delivered or sent by certified or registered mail, postage prepaid, or by nationally recognized overnight courier, addressed as set forth below:

If to the Guarantor:

Williams Holdings of Delaware, Inc. One Williams Center

Tulsa, Oklahoma 74172

Attention: Credit Manager

Telephone: (918) 588-3792

Facsimile: (918) 561-6987 If to the Counterparty:

Credit Suisse First Boston, New York Branch Eleven Madison Avenue New York, NY 10010 Attention: Telephone: Facsimile:

copy to:

The AES Corporation 1001 North 19th Street Arlington, VA 22209

Attention: General Counsel Telephone: -703/522-1315

Facsimile: 703/528-4810

or to such other person or address as the addressee may have specified in a notice duly given to the sender as provided herein. Such notice or communication shall be deemed to have been given

- Submission to Jurisdiction. Each of the Counterparty and the Guarantor hereby irrevocably and unconditionally:
- submits for itself and its property in any legal action or proceeding relating to this Guarantee, or for recognition and enforcement of any judgment in respect thereof, to the exclusive general jurisdiction of the Courts of the State of New York, the courts of the United States of the Southern District of New York, and appellate courts from any thereof,
- consents and agrees that any such action or proceeding may be brought in **(b)** and only in such courts and waives any objection that it may now or hereafter have to the venue of any such action or proceeding in any such court or that such action or proceeding was brought in an inconvenient court and agrees not to plead or claim the same;
- agrees that service of process in any such action or proceeding may be effected by mailing a copy thereof by registered or certified mail (or any substantially similar form of mail), postage prepaid, to its address set forth in Section 6, or at such other address of which the other party shall have been notified pursuant thereto; and
- agrees that nothing herein shall affect the right to effect service of process in any other manner permitted by law.
- Assignment: Termination: Governing Law. This Guarantee may be assigned by the Guarantor only as permitted under the Tolling Agreement. This Guarantee, which is binding

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on the Guarantor's successors and permitted assigns, is a guarantee of payment and not of collection and shall be construed in accordance with the laws of the State of New York, without regard to its conflict of laws provisions. This Guarantee shall inure to the benefit of and be enforceable by the Counterparty and its successors, transferees and permitted assigns. Subject to the terms, conditions and limitations hereof, this Guarantee is a continuing guarantee which shall remain in force until full and final payment of all of the Obligations.

•	WILI	LIAMS HOLDINGS OF DELAWARE, INC.
	By: Name: Title:	
Accepted and agreed as of the date first above written: CREDIT SUISSE FIRST BOSTON NEW YORK BRANCH		
By:	· . · · · · · · · · · · · · · · · · · ·	
Title:		•

Exhibit A

Williams Holding, Inc. Guarantee Cap Schedule

Contract Year	Guarantee Cap Red	luction Schedule *
	First Six Months	Second Six Months
1 2 3 4 5	\$1,050,000,000 \$1,029,746,357 \$1,008,506,274 \$990,907,594 \$971,121,635	\$1,039,875,608 \$1,019,126,315 \$999,706,934 \$981,014,614
. 6 . 7 . 8	\$949,931,611 \$924,331,246 \$898,981,891	\$960,526,623 \$937,131,429 \$911,656,569 \$882,459,103
9 10 11 12	\$865,936,316 \$831,920,084 \$793,705,470 \$762,212,669	\$848,928,200 \$812,812,777 \$777,959,070
13 14 15	\$727,131,180 \$679,049,821 \$617,023,758	\$744,671,925 \$703,090,501 \$648,036,790 \$583,472,026
16 17 18 19 20	\$549,920,294 \$491,334,778 \$428,996,946 \$355,763,416	\$520,627,536 \$460,165,862 \$392,380,181 \$238,334,581
20	\$120,905,745	\$60,452,873

^{*} To be adjusted at closing to reflect actual principal amortization schedule.

SCHEDULE 19.2

CORPORATE GUARANTEE

GUARANTEE (this "Guarantee"), dated as of May ___, 1998, by THE AES CORPORATION, a Delaware corporation (the "Guarantor"), in favor of Williams Energy Services Company, a Delaware corporation (the "Company").

1. Guarantee. For good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, and to induce the Company to enter into that certain Capacity and Sales and Tolling Agreement, dated as of May 1, 1998 (the "Tolling Agreement"), with AES Alamitos, L.L.C., a Delaware limited liability company, AES Huntington Beach, L.L.C., a Delaware limited liability company and AES Redondo Beach, L.L.C., a Delaware limited liability company, each a subsidiary of the Guarantor (collectively, the "AES Subsidiaries"), the Guarantor unconditionally and irrevocably guarantees the prompt payment and performance when due of all present and future obligations of the AES Subsidiaries pursuant to the Tolling Agreement or otherwise arising in respect of the Company's obligations under the Tolling Agreement, together with reasonable expenses (including reasonable attorney's fees and expenses) incurred by the Company in enforcing this Guarantee (collectively, the "Obligations").

2. Maximum Guaranteed Amount.

The aggregate liability of the Guarantor under this Guarantee and the Company's right of recovery hereunder is limited to a total aggregate amount of \$100 million (\$100,000,000.00) (the "Guarantee Cap").

- Obligations shall not be affected by the existence, validity, enforceability, perfection, or extent of any collateral for the Obligations. The Company shall not be obligated to file any claim relating to the Obligations owing to them in the event that the AES Subsidiaries become subject to a bankruptcy, reorganization or similar proceeding and the failure of the Company to so file shall not affect the Guarantor's obligations hereunder. In the event that any payment to the Company in respect to the Obligations is rescinded or must otherwise be returned for any reason whatsoever, not been made. The Guarantor reserves the right to assert defenses which the AES Subsidiaries may have to payment of any Obligation other than defenses arising from the bankruptcy or insolvency of the AES Subsidiaries and other defenses expressly waived hereby.
- 4. <u>Consents. Waivers and Renewals</u>. The Guarantor agrees that the AES Subsidiaries and the Company may mutually agree to modify, compromise, rescind or release the Obligations and any security therefor or any agreement between the AES Subsidiaries and the Company in accordance with the Tolling Agreement, without in any way impairing or affecting this Guarantee; <u>provided</u>, <u>however</u>, no action taken pursuant to this Section 4 shall be construed

to increase the amount of the Guarantee Cap. The Guarantor agrees that the Company may resort to the Guarantor for payment of any of the Obligations, whether or not the Company shall have resorted to any collateral security or shall have proceeded against any other obligor principally or secondarily obligated with respect to the Obligations. The Guarantor hereby waives notice of acceptance of this Guarantee, and presentment, protest and notice of protest or dishonor of any of the obligations hereby guaranteed.

- 5. <u>Subrogation</u>. Upon payment of all the Obligations, the Guarantor shall be subrogated to the rights of the Company against the AES Subsidiaries, and the Company agrees to take, at the Guarantor's expense, such steps as the Guarantor may reasonably request to implement such subrogation.
- 6. Address for Notices. Any notice, request, consent, waiver or other communication required or permitted hereunder shall be effective only if it is in writing and personally delivered or sent by certified or registered mail, postage prepaid, or by nationally recognized overnight courier, addressed as set forth below:

If to the Guarantor:

The AES Corporation 1001 North 19th Street Arlington, Virginia 22209 Attention: General Counsel Telephone: (703) 522-1315 Facsimile: (703) 528-4510

If to the Company:

Williams Energy Service Company One Williams Center Tulsa, Oklahoma 74172

Attention:

Credit Manager

Telephone: Facsimile: (918) 588-3792 (918) 561-6987

or to such other person or address as the addressee may have specified in a notice duly given to the sender as provided herein. Such notice or communication shall be deemed to have been given as of the date received by the recipient thereof.

- 7. <u>Submission to Jurisdiction</u>. Each of Guarantor and the Company hereby irrevocably and unconditionally:
- (a) submits for itself and its property in any legal action or proceeding relating to this Guarantee, or for recognition and enforcement of any judgment in respect thereof, to the exclusive general jurisdiction of the Courts of the State of New York, the courts of the United States of the Southern District of New York, and appellate courts from any thereof;

(b) consents and agrees that any such action or proceeding may be brought in and only in such courts and waives any objection that it may now or hereafter have to the venue of any such action or proceeding in any such court or that such action or proceeding was brought in an inconvenient court and agrees not to plead or claim the same; agrees that service of process in any such action or proceeding may be effected by mailing a copy thereof by registered or certified mail (or any substantially similar form of mail), postage prepaid, to its address set forth in Section 6, or at such other address of which the other party shall have been notified pursuant thereto; and agrees that nothing herein shall affect the right to effect service of process in any other manner permitted by law. Assignment: Termination: Governing Law. This Guarantee may be assigned by the Guarantor only as permitted under the Tolling Agreement. This Guarantee, which is binding on the Guarantor's successors and permitted assigns, is a guarantee of payment and not of collection and shall be construed in accordance with the laws of the State of New York, without regard to its conflict of laws provisions. This Guarantee shall inure to the benefit of and be enforceable by the Company and its successors, transferees and permitted assigns. Subject to the terms, conditions and limitations hereof, this Guarantee is a continuing guarantee which shall remain in force until full and final payment of all of the Obligations. THE AES CORPORATION By: Name: Title: Accepted and agreed as of the date first above written: WILLIAMS ENERGY SERVICES COMPANY Name:

Title:

AGREEMENT

THIS AGREEMENT (this "Agreement"), made and entered into as of this 12 day of May, 1998, by and among AES Alamitos, L.L.C., a limited liability company organized and existing under the laws of the State of Delaware, AES Huntington Beach, L.L.C., a limited liability company organized and existing under the laws of the State of Delaware, and AES Redondo Beach, L.L.C., a limited liability company organized and existing under the laws of the State of Delaware (collectively, the "AES Subsidiaries"), on the one hand, and Williams Energy Services Company, a corporation organized and existing under the laws of the State of Delaware ("WESCO"), on the other (each of (a) the AES Subsidiaries and (b) WESCO are hereinafter sometimes referred to as a "Party" and sometimes collectively referred to as the "Parties").

WHEREAS, the Parties have entered into that certain Capacity Sale and Tolling Agreement, dated as of the date hereof (the "Tolling Agreement;" all capitalized terms used in this Agreement that are not defined herein have the meanings given in the Tolling Agreement);

WHEREAS, each Party acknowledges that additions of Capacity at the Facilities or within the region surrounding the Facilities could have an adverse effect on the economic benefit to be derived by the other from the Facilities; and

WHEREAS, the Parties acknowledge that their actions with respect to and in connection with the Tolling Agreement will be, in certain respects (including particularly, but not limited to, assignment of the MRAs to WESCO and subsequent sales of Capacity and Ancillary Services by WESCO), subject to regulatory approval by FERC.

NOW, THEREFORE, for good and valuable consideration the receipt of which is hereby acknowledged, the Parties agree as follows:

ARTICLE I TERM

1.1 The term of this Agreement shall commence on the Effective Date and continue for the Term, unless the Tolling Agreement shall be earlier terminated, in which case this Agreement shall automatically terminate and neither WESCO nor the AES Subsidiaries shall have any further liability or obligation to the other hereunder, except for obligations or duties that accrued prior to such termination.

ARTICLE II DEPENDABLE CAPACITY ADDITIONS AND REDUCTIONS

- 2.1 AES Additions. Subject to the provisions of Section 2.3, neither the AES Subsidiaries nor any of their respective Affiliates (including The AES Corporation ("AES")) will add Capacity to the Facilities or acquire, construct, own, lease or operate, directly or indirectly, any assets with generating Capacity (a) within the service area on the load side of Edison's Del Amo, Serrano and Santiago substations except (A) with the consent of WESCO, which may be withheld in WESCO's sole and absolute discretion if such additional Capacity would have an adverse effect on the economic benefit (including cashflow and profit) to be derived by WESCO from the Facilities or on the ISO's designation of the Facilities as must-run or (B) as permitted in respect of existing Units pursuant to the provisions of Section 4.1 of the Tolling Agreement and Section 2.5 hereof, or (b) within the service area on the Los Angeles load side of Edison's Sylmar, Renaldi, Vincent, Lugo, Devers and San Onofre substations (including at the nuclear plant located at San Onofre) (which service area's current configuration is shown on Schedule 2.1 and which service area excludes the service area described in clause (a)(ii) of this Section), without first complying with the provisions of Section 2.4 hereof.
- 2.2 WESCO Additions. Subject to the provisions of Section 2.3, except with respect to Capacity additions which individually are equal to, or less than, one megawatt of Capacity, neither WESCO nor any of its Affiliates will acquire, construct, own, lease or operate, directly or indirectly, any assets with generating Capacity (a) within the service area on the load side of Edison's Del Amo, Serrano and Santiago substations except (A) with the consent of the AES Subsidiaries, which may be withheld in their sole and absolute discretion if such additional Capacity would have an adverse effect on the economic benefit (including cashflow and profit) to be derived by the AES Subsidiaries from the Facilities or (B) as permitted in respect of existing Units pursuant to Section 2.5 hereof, or (b) within the service area on the Los Angeles load side of Edison's Sylmar, Renaldi, Vincent, Lugo, Devers and San Onofre substations (including at the nuclear plant located at San Onofre), which service area's current configuration is shown on Schedule 2.1) (and which service area excludes the service area described in clause (a) of this Section), without first complying with the provisions of Section 2.4 hereof.
- 2.3 <u>Carve-outs</u>. The AES Subsidiaries may at their sole option elect not to comply with the provisions of Section 2.1(b) in respect of any proposed Capacity additions at the Placerita generating station, and in each such case WESCO, as a result, automatically and without further action by either Party, shall be entitled at its sole option to elect not to comply with the provisions of Section 2.2(b) to the extent of any assets with generating Capacity not exceeding the total generating Capacity of the additions the AES Subsidiaries or an Affiliate thereof shall have made pursuant to an election under this Section 2.3.
- 2.4 Right of First Offer. Prior to entering into any arrangement relating to the addition of Capacity described in Sections 2.1(b) and 2.2(b), any Party hereto (or any Affiliate thereof) proposing to enter into such arrangement (the "Offeror") shall offer to enter into such arrangement with the other Party (the "Offeree") by providing to the Offeree a Notice (the "Offer") setting forth (i) all material terms of such proposed arrangement, including without limitation the amount of Capacity which is proposed to be added, the locations where such

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Capacity is proposed to be added, the anticipated dates of commencement and of completion of the project, the anticipated cost of the project and proposed financing arrangements, and project pro forma financial statements and statements of cashflow, (ii) all material terms of the arrangement pursuant to which the Offeree may participate in the ownership of, the purchase or sale of electricity from, or the fuel conversion services related to the Capacity addition, and (iii) the identity of all Persons participating or intending to participate in the project in a material manner. Within 30 days of receipt of such Notice, the Offeree may elect by Notice (the "Acceptance") to the Offeror to enter into such arrangement with the Offeror. Should the Offeree not give such Notice within such 30 day period or should the Parties fail to execute a definitive agreement within 90 days of the effective date of such Notice to the Offeror, the Offeror (other than if due to the lack of diligence or good faith of the Offeror) shall be free for a period of 180 days after the end of such 30 day or 90 day period, whichever is applicable, to enter into an arrangement with a third party; provided, however, that the Offeror may not enter into any arrangement (i) on more favorable economic terms to the third party or (ii) noneconomic terms materially more favorable to the third party from those contained in the Offer or after such 180 days shall have expired without again complying with the provisions of this Section 2.4.

- Options for Improvements. (a) Negotiated Option. From time to time, by 2.5 delivering a Notice to the other Party (an "Improvement Notice") either WESCO or the AES Subsidiaries may exercise an option to initiate negotiations between them for an arrangement that will make available to WESCO the benefits of reduced heat rate in the MW increments contemplated in Schedule 2.5 (a) (an "Improvement"), in exchange for an incremental increase of the aggregate Fixed Payments associated with such MW increments. Such Improvement Notice will set forth the specific Improvement set forth in Schedule 2.5 (a) to be negotiated and all material terms of such proposed Improvement, including the incremental increase of the Fixed Payments. The Parties shall negotiate in good faith to execute definitive agreements with respect to such proposed Improvement within 90 days of the effective date of such Improvement Notice. If by the end of such 90-day period the Parties have not executed such definitive agreements, (i) the AES Subsidiaries may implement the Improvement at their own cost (and with financing arranged by them) without requiring any modification of the Tolling Agreement, and any such Improvement, if implemented, shall no longer be subject to this Section 2.5, or (ii) if the AES Subsidiaries do not elect to proceed pursuant to the preceding clause (i), then at the option of WESCO the provisions of Section 2.5 (b) (Structured Option) shall apply.
- (b) <u>Structured Option</u>. If pursuant to Section 2.5 (a) WESCO exercises its option for this Section 2.5 (b) to apply, it shall do so by delivering to the AES Subsidiaries an amended Improvement Notice which will set forth the following material terms:
 - (i) the amount, which WESCO shall pay to the AES Subsidiaries, that equals the <u>sum</u> of (A) the outstanding portion of the debt (as determined under the applicable financing documents) associated with the component of the Improvement to be removed from the Tolling Agreement (without taking into account, however, any additional debt the result of permitted refinancing), <u>plus</u> any costs that would result from the prepayment of such portion of debt, including costs of breakage and acceleration of decommissioning costs, <u>plus</u> (B) an amount equal to the equity and return on equity attributed to the removed component of the Improvement and determined pursuant to Schedule 2.5 (b),

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- (ii) the material modifications to the Tolling Agreement and the Williams Holding Guarantee reflecting the removed MW increment of the Improvement and the reduced associated debt, <u>provided</u>, that at the option of WESCO the effectiveness of such modifications, removal and reduction of debt shall be deferred to the extent practicable until the benefits of the Improvement become available to WESCO, and
- (iii) the material terms of a new tolling agreement between WESCO and an Affiliate of the AES Subsidiaries (where practicable, substantially similar in form to the Tolling Agreement and subject to a guarantee by Williams Holdings substantially in the form of the Williams Holdings Guarantee), providing for fixed payments sufficient to permit such Affiliate to finance on a stand-alone non-recourse project finance basis 90% of the total cost of the Improvement with senior debt with a term of 15 years or longer and a projected average annual debt service coverage ratio of 1.3 or higher (based on proformas of the providers of such debt).

Upon receipt of such amended Improvement Notice, the AES Subsidiaries (and, to the extent appropriate, the aforesaid Affiliate) shall in good faith proceed to use all reasonable efforts to implement the Improvement in conformity with the aforesaid terms, including proceeding to initiate and complete any relevant permitting process and acquisition of financing. Notwithstanding the foregoing, either of WESCO or the AES Subsidiaries may cease any and all efforts to implement the Improvement (i) if it is impracticable to complete the implementation of the Improvement or (ii) for any other reason. Upon any such cessation by the AES Subsidiaries, at the option of WESCO the provisions of either Section 2.5 (c) (WESCO Financed Option), if available, or Section 2.5 (d) (WESCO Buy-Out Option) shall apply. Upon any such cessation by WESCO (x) other than for reasons of impracticability, the provisions of Section 2.5 (e) (Reimbursement) only shall apply as to such Improvement, and (y) for reasons of impracticability, at the option of WESCO the provisions of Section 2.5 (d) (WESCO Buy-Out Option) shall apply.

- (c) WESCO Financed Option. If pursuant to Section 2.5 (b) (Structured Option) WESCO exercises its option for this Section 2.5 (c) to apply, it may do so at any time up to December 31, 2008 by delivering to the AES Subsidiaries a notice that WESCO will finance the proposed Improvement (a "WESCO Financed Option Notice") which will set forth the following material terms:
 - (i) the amount referred to in Section 2.5 (b) (i),
 - (ii) the material modifications referred to in Section 2.5 (b) (ii), and
 - (iii) (A) if an Affiliate of the AES Subsidiaries is to own the Improvement, the material terms of (I) the new tolling agreement for the Improvement (but with a term not exceeding the greater of 15 years or the remaining term of the Tolling Agreement) and (II) the related financing referred to in Section 2.5 (b) (iii), except that financing meeting the parameters set forth therein (but with a term no greater than that of the tolling agreement) shall be provided by a creditworthy Affiliate of WESCO on commercially reasonable terms, or (B) if WESCO is to own the Improvement, (I) the material terms

pursuant to which the AES Subsidiaries would participate as a developer/turnkey contractor/ operator/and ground lessor for the Improvement, all on market-based compensation terms, but not as an owner thereof, and (II) the right of the AES Subsidiaries at the expiration of the term of the Tolling Agreement (as and if that term is extended from 15 to 20 years) to buy the Improvement for a price determined in a manner consistent with the principles for making the determination made in Section 2.5(b)(i).

Upon receipt of a WESCO Financed Option Notice, the AES Subsidiaries (and, to the extent appropriate, the aforesaid Affiliate thereof) and WESCO shall in good faith proceed to use all reasonable efforts to implement the Improvement in conformity with the aforesaid terms. Notwithstanding the foregoing, WESCO may cease any and all efforts to implement the Improvement for any reason, and the AES Subsidiaries may similarly cease such efforts if it is impracticable to complete the implementation of the Improvement. Upon any such cessation, at the option of WESCO the provisions of Section 2.5 (d) (WESCO Buy-Out Option) shall apply.

- (d) WESCO Buy-Out Option. If pursuant to Section 2.5 (b) (Structured Option) or Section 2.5 (c) (WESCO Financed Option) WESCO exercises its option for this Section 2.5 (d) to apply, then WESCO may do so by delivering to the AES Subsidiaries a Notice (a "WESCO Buy-Out Notice") which will set forth the specific Improvement to be removed from the Tolling Agreement and the following material terms: (i) the amount referred to in Section 2.5 (b) (ii), and (ii) the material modifications referred to in Section 2.5 (b) (ii).
- (e) Reimbursement. WESCO shall reimburse the AES Subsidiaries (and any aforesaid Affiliate thereof) for costs and expenses incurred by them in the course of pursuing any Improvement initiated by WESCO exercising any option under this Section 2.5, except where and to the extent (i) such Improvement was implemented or (ii) the efforts to implement such Improvement pursuant to Section 2.5(b) ceased at the election of the AES Subsidiaries (other than for reasons of impracticability) and WESCO did not otherwise make use of the product of such costs and expenses in its continued pursuit of exercise of a subsequent option with respect to such Improvement pursuant to Sections 2.5(c) or (d) for which it is required to make reimbursement. Reimbursement shall be made promptly subject to reasonable documentation and upon cessation of implementation.
- (f) Information and Diligent Pursuit. The Parties shall make available to each other information reasonably necessary to provide or assess any Notice delivered or to be delivered under, or to perform the obligations set forth in, this Section 2.5, and shall diligently pursue the expeditious implementation of any Improvement for which a proper Notice under this Section 2.5 has been given.

ARTICLE III REGULATORY MATTERS

3.1 <u>Pre-Assignment Regulatory Cooperation.</u> (a) Until the date that the Assignment of the MRAs is allowed to take effect, the Parties will make commercially reasonable efforts to

assist one another in obtaining any FERC, ISO or CPUC consents, authorizations, or other rulings necessary or desired for the commercial operation of the Facilities, including the approval of the Assignment of the MRAs and the development of reasonable MRA rates, terms, and conditions; and provided that each Party will pay its own out-of-pocket expenses (including, without limitation, attorneys' fees) and one-half of all jointly incurred consultants' fees. This commitment to cooperate shall include all commercially reasonable efforts by the AES Subsidiaries to have Southern California Edison Company ("Edison") file a case in chief supporting its original filing no later than May 31, 1998 in Southern California Edison Company, FERC Docket No. ER98-441 (the "Case") unless there is a settlement in principle on all rate issues in such proceeding by such date; provided, further, that if Edison refuses to voluntarily file a case in chief, the AES Subsidiaries in good faith will consider at WESCO's request the need to obtain, and will provide reasonable assistance to any effort by WESCO to obtain, an order or ruling in the Case compelling Edison to file a case in chief supporting its original filing in the Case; and

- (b) During the period described in Section 3.1(a), each Party will in good faith solicit and consider the views of the other before making any filing, appearance, presentation, argument, opinion, or proposal to FERC, ISO or CPUC; provided, however, that until the Assignment of the MRAs takes effect, in the event of a disagreement between the Parties about such a filing, appearance, presentation, argument, opinion, or proposal, each Party will have the final say over its own actions.
- 3.2 MRAs To Be Assigned To WESCO As Rate Schedules. Subject to the proviso of Section 3.6, once the Assignment takes effect, the MRAs on file at FERC in the name of AES Subsidiaries will become WESCO rate schedules for all purposes under Section 205 of the Federal Power Act; provided, however, that without the consent of WESCO, which shall not be unreasonably withheld, the AES Subsidiaries will not seek to withdraw from the Case.
- 3.3 <u>Post-Assignment Control of FERC Proceedings</u>. Subject to Section 3.6, when the Assignment of the MRAs to WESCO takes effect:
- (a) AES Subsidiaries will not make any filing, pleading, communication, analysis, appearance, presentation, argument, opinion, or proposal regarding (i) the MRAs, (ii) the Tolling Agreement, or (iii) the Facilities to the FERC or the CPUC without the prior express consent of WESCO (such consent not to be unreasonably withheld if such items regard the Facilities but not the Tolling Agreement or the MRAs); provided, however, that in the event the AES Subsidiaries are contacted directly by FERC or the CPUC seeking an immediate reply, the AES Subsidiaries will obtain WESCO's consent before responding as circumstances reasonably allow; and provided that WESCO shall not pursuant to this Section 3.3 (a) cause AES Subsidiaries to violate any statute, regulation, or order, as such may be reasonably interpreted by AES Subsidiaries;
- (b) In addition to requiring the continued participation of the AES Subsidiaries in the Case, WESCO may, at its option, cause the AES Subsidiaries to participate or appear in any new regulatory proceedings at the FERC regarding the MRAs, the Tolling Agreement or the Facilities;

- (c) The AES Subsidiaries, will cooperate in a commercially reasonable manner, at their expense, with requests by WESCO for information and other like guidance intended to assist WESCO in achieving its regulatory objectives regarding the Tolling Agreement, the Facilities and/or the MRAs; provided, however, the AES Subsidiaries shall not be required to pay for the costs and fees of consultants, including Putnam, Hayes & Bartlett, to the extent such consultants perform services after the Assignment at the request of WESCO (whether or not the services were requested before the Assignment). Accordingly, for example, after the date of Assignment of the MRAs to WESCO, WESCO shall be responsible for all of Putnam, Hayes & Bartlett's fees and expenses regarding their assistance with respect to matters at issue in the Case;
- (d) If FERC issues any order requiring the AES Subsidiaries to file the Tolling Agreement, or if pursuant to Section 3.3(a) AES is authorized by WESCO to file, or the AES Subsidiaries files, such Agreement with FERC, the AES Subsidiaries shall request confidential treatment of all commercially sensitive information contained therein and shall bear its own expenses, including attorneys' fees, with regard to such matters; and
- (e) The AES Subsidiaries will in good faith, as circumstances allow, solicit and consider the views of WESCO before making any filing, appearance, presentation, argument, opinion or proposal to FERC or the CPUC regarding any contract, tariff, or other regulatory matter, other than the MRAs, the Tolling Agreement or the Facilities to which the AES Subsidiaries are parties including, without limitation, exempt wholesale generator status and non-MRA agreements with the ISO; provided, however, that in the event of a disagreement between the Parties about a regulatory matter not directly related to the MRAs, the Tolling Agreement or the Facilities, the determination of the AES Subsidiaries will govern.
- 3.4 <u>Regulatory Representatives</u>. Each Party has designated at the end of this Agreement one (1) Regulatory Representative and one (1) Alternate Regulatory Representative. These Representatives shall give expedited consideration to issues and questions that arise under this Article III, and shall speak authoritatively on regulatory matters. Each Party shall be entitled to rely on statements by the other Party's Regulatory Representatives.
- 3.5 Non-Liability. Except as expressly set out in this Article III, neither Party owes any duty, or will have any liability, to the other Party arising from any strategy, filing, appearance, presentation, argument, opinion, or proposal that a Party has previously adopted or may adopt in pursuing regulatory objectives before FERC; and each Party expressly waives and disclaims all warranties of future outcomes before any regulatory body.
- 3.6 Partial Assignment. In the event of less than a full assignment of the MRAs to WESCO, Sections 3.2 and 3.3 will be revised to reflect accurately the respective duties, rights and liabilities of the Parties under the MRAs.

ARTICLE IV EVENTS OF DEFAULT; REMEDIES

- 4.1 Events of Default. The following shall constitute events of default in respect of a Party (the "Defaulting Party") under this Agreement (each an "Event of Default"):
- (a) failure by the Defaulting Party to perform any obligation to the other Party (the "Non-Defaulting Party") set forth in this Agreement, or
- (b) there shall have occurred and be continuing any event of default under the

ARTICLE V NOTICES

All notices, demands or requests required or permitted under this Agreement shall be in writing and shall be personally delivered or sent by certified United States mail (postage prepaid, return receipt requested), overnight express mail, courier service or facsimile transmission (with the original transmitted by any of the other aforementioned delivery methods) addressed as follows:

If to the AES Subsidiaries to:

The AES Corporation 1001 North 19th Street Arlington, VA 22209

Attention: General Counsel

(703) 528-4810

and

If to WESCO to:

Williams Energy Services Company One Williams Center, Suite 1800

Tulsa, OK 74172

Attention: Contract Management

(Fax) 918-594-1935

with a copy to:

Williams Holdings of Delaware, Inc. One Williams Center, Suite 4000

Tulsa, OK 74172

Attention: General Counsel

(Fax) 800-479-6690

and.

Jones, Day, Reavis & Pogue 599 Lexington Avenue New York, New York 10022

Attention: William F. Henze II (Fax) 212-755-7306

or to such other Person at such other address as a Party shall designate by like notice to the other Party.

Unless otherwise provided herein, all notices hereunder shall be effective at the close of business on the day actually received, if received during business hours on a Business Day, and otherwise shall be effective at the close of business on the first Business Day after the day on which received.

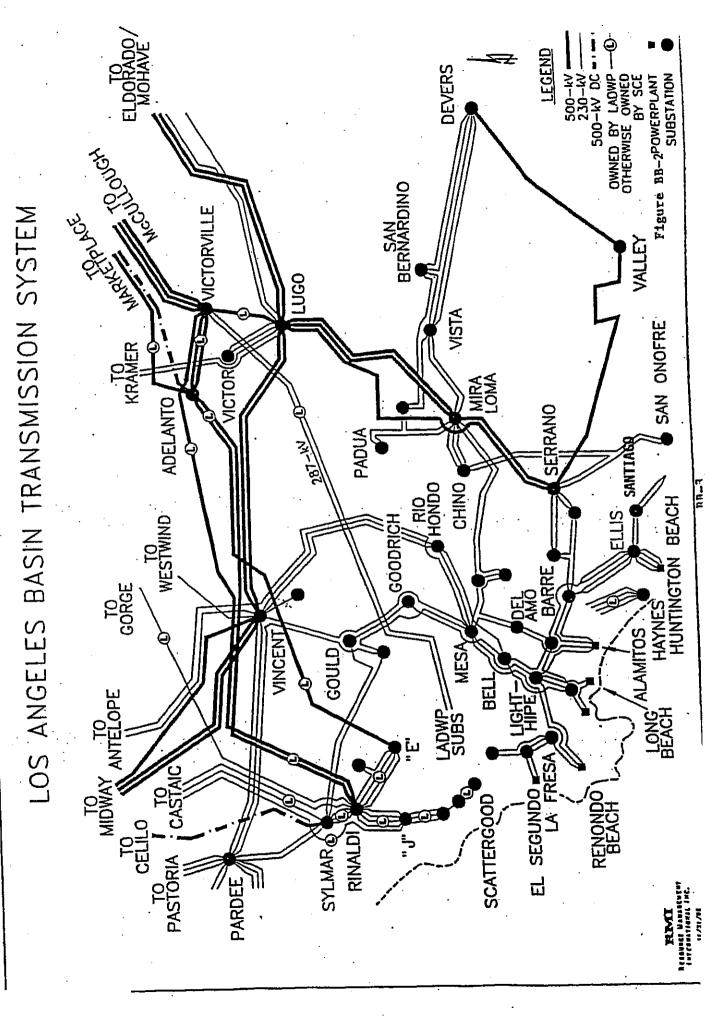
ARTICLE VI MISCELLANEOUS PROVISIONS

- 6.1 Entire Agreement. This Agreement, including all Exhibits hereto, together with the Tolling Agreement, constitutes the entire agreement between the Parties hereto with respect to the matters contained herein and therein, and all prior agreements with respect to the matters covered herein are superseded, and each Party confirms that it is not relying upon any representations or warranties of the other Party, except as specifically set forth herein or incorporated by reference hereto.
- 6.2 Incorporation by Reference. Articles XII (Dispute Resolution), XIV (Liability), XVII (Uncontrollable Force), XX (Assignment), XXII (Conditions) and Sections 18.2 (Remedies), 23.2 (Expenses), 23.3 (Third Party Beneficiaries), 23.4 (Announcements), 23.5 (Confidentiality), 23.8 (Captions), 23.9 (Waiver), 23.10 (Choice of Laws), 23.11 (Successors and Assigns), 23.12 (Counterparts), 23.14 (Severability), 23.15 (Amendment) and 23.16 (Submission to Jurisdiction; Waiver) of the Tolling Agreement are incorporated herein by reference, mutatis mutandis.

IN WITNESS WHEREOF, the Parties hereto have caused this Agreement to be executed by their duly authorized representatives as of the date first set forth above.

IN WITNESS WHEREOF, the Parties hereto have caused this Agreement to be executed by their duly authorized representatives as of the date first set forth above.

WILLIA COMPA	MS ENERGY SERVICES NY
Ву:	
Nume:	
Title:	
AES RE	DONDO BEACH, L.L.C.
Ву:	John Meggiell
Name:	JOHN RUGGINZU
Tide:	CHIEF EXECUTIVE MARAGER
AEŞ AL.	AMITOS, L.L.C.
Ву:	John Reason Da
Nume:	Tota Ruggerell
Title:	CHIEF EXECUTIVE MANAGE
AES HU	NTINGTON BEACH, L.L.C.
Ву:	John Reycall
Name:	TOTO RUGGIETES
Title:	CHIEF EXCLUSIVE LANDINGS
,	



Schedule 2.5 (a)

Option	<u>MW</u>	Location (Delivery Point)
AL1	175	Alamitos
AL2	175	Alamitos
AL3	320	Alamitos
AL4	320	Alamitos
HBX	563	Huntington Beach
RB5	175	Redondo Beach
RB6	175	Redondo Beach
RB7/8	960	Redondo Beach

Options may be exercised in any combination and to any Delivery Point, subject to and limited by the restrictions in the AES Subsidiaries loan agreements, and in the AES Subsidiaries reasonable judgement, the limitations of the facilities themselves.

AL7		はは	Aramitas	
HBS	•	133	HUNTINGTON	GEACH

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Amendment No. 1

Amendment No. 1 dated as of May 15, 1998 (this "Amendment") to that certain Capacity Sale and Tolling Agreement dated as of May 1, 1998 (as amended and supplemented from time to time, the "Tolling Agreement") by and among AES Alamitos, L.L.C., AES Huntington Beach, L.L.C., and AES Redondo Beach, L.L.C. (collectively, the "AES Subsidiaries") and Williams Energy Services Company ("WESCO").

WHEREAS, for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, the parties hereto wish to amend and supplement the Tolling Agreement in certain respects, and wish to agree on certain related matters.

Accordingly, the parties hereto agree as follows:

- 1. <u>Definitions</u>. Capitalized terms used herein without definition have the respective meanings giving to them in the Tolling Agreement, unless otherwise specified or the context otherwise requires.
- 2. <u>Amendment of Schedules</u>. Schedules 4.3, 8.2 and 10.1 to the Tolling Agreement are attached hereto, and supersede and replace all prior versions thereof.
- 3. Operator Matters. (a) The AES Subsidiaries agree that, except pursuant to contractual arrangements in effect with Edison on the date hereof, they will not contract or subcontract for the performance of all or any part of their operation and maintenance obligations under the Tolling Agreement to any Person in respect of which WESCO's approval could be reasonably withheld in accordance with Section 4.1(a) of the certain Consent and Agreement dated as of May 15, 1998 among WESCO, the AES Subsidiaries and Credit Suisse First Boston, New York Branch, as collateral agent; provided, however, that the foregoing shall not restrict routine use or sharing in accordance with Accepted Electrical Practices of maintenance employees of competitors of the Company in the energy marketing business (or of their Affiliates), without notice to WESCO, under circumstances that do not result in the disclosure of non-public information in respect of WESCO or the use, operation, maintenance or status of the Facilities, or information of competitive value to WESCO, in any such case, to the material detriment of WESCO.
- (b) The AES Subsidiaries agree to perform, or cause to be performed, in favor of WESCO any performance obligation of WESCO under the MRAs in respect of the operation, maintenance or dispatch of the Facilities.
- (c) ' If the AES Subsidiaries would not be required to make a Non-Discretionary Capital Expenditure but for the must run status of the Facilities, the AES Subsidiaries shall be entitled to the appropriate portion of the compensation paid to WESCO as

reimbursement for or recovery of such Non-Discretionary Capital Expenditure, if any, by the ISO. "Non-Discretionary Capital Expenditure" means a capital expenditure made by the AES Subsidiaries with respect to the Facilities in order to comply with any law or the terms of any contract to which the AES Subsidiaries or any of them is a party.

- (d) WESCO shall not propose any Discretionary Capital Expenditure to the ISO pursuant to the MRAs unless (i) the AES Subsidiaries shall be reasonably compensated for such Discretionary Capital Expenditure, and (ii) in the AES Subsidiaries' reasonable judgment, the implementation of such Discretionary Capital Expenditure shall not have a material adverse effect on the AES Subsidiaries, including without limitation, with respect to public relations or permitting. "Discretionary Capital Expenditure" means a capital expenditure made by the AES Subsidiaries other than a Non-Discretionary Capital Expenditure.
- 4. Interim Arrangement. Prior to June 1, 1998, Sections 4.3 and 8.6 of the Tolling Agreement shall not be effective.
- Cure Rights for Williams Holdings. (a) From In the event of a default by WESCO in the performance of any of its obligations under the Assigned Agreements (as defined in that certain Consent Agreement dated as of May 15, 1998 among WESCO, the AES Subsidiaries and Credit Suisse First Boston, New York Branch) or upon the occurrence or nonoccurrence of any event or condition under the Assigned Agreements which would immediately or with the passage of any applicable grace period or the giving of notice, or both, enable the AES Subsidiaries to terminate or suspend their obligations under the Assigned Agreements (hereinafter a "default"), none of the AES Subsidiaries will terminate or suspend performance under any of the Assigned Agreements until they first give prompt written notice of such default to Williams Holdings of Delaware, Inc. ("Williams Holdings") and afford Williams Holdings a period of at least thirty (30) days in respect of a monetary default, and at least one hundred eighty (180) days in respect of a non-monetary default, from receipt of such notice to cure such default, each of such periods to run simultaneously with the applicable cure periods set forth in the Assigned Agreements; provided, however, that if Williams Holdings is prohibited from curing any such default by any process, stay or injunction issued by any governmental authority or pursuant to any bankruptcy or insolvency proceeding or other similar proceeding involving the AES Subsidiaries, the time period specified herein for curing a default shall be extended for the period of such prohibition.
- (b) At any time, Williams Holdings shall have the option to assume all of the right, title and interest of WESCO in and to the Assigned Agreements, and upon written notice to WESCO, WESCO will assign, transfer and set over to Williams Holdings all of its right, title and interest in and to the Assigned Agreements, such assignment and assumption to be evidenced by a written instrument reasonably satisfactory in form and substance to Williams Holdings, WESCO, and the AES Subsidiaries; provided, however, that if at the time Williams Holdings shall exercise its option to assume the Assigned Agreements a default shall have occurred and be continuing thereunder, it shall be a condition precedent to the right of Williams Holdings to assume, and to the effectiveness of its assumption of, the Assigned Agreements that such default be cured.

- (c) Notwithstanding the provisions of Section 23.3 of the Tolling Agreement, the parties hereto agree that Williams Holdings is an express third-party beneficiary of the provisions of this Section 5.
- 6. <u>Further Assurances</u>. From time to time, each of the parties hereto will execute and deliver such further instruments and will take such other actions as the AES Subsidiaries, on the one hand, or WESCO, on the other hand, may reasonably request of the other in order to effectuate the purposes of this Amendment and to carry out the terms hereof.
- 7. <u>Miscellaneous</u>. (a) Except as expressly amended hereby, the Tolling Agreement shall remain unmodified and in full force and effect.
- (b) The provisions or Article XXIII (Miscellaneous Provisions) in the Tolling Agreement are hereby incorporated into this amendment by this reference, mutatis mutandis.

IN WITNESS WHEREOF, the parties hereto have caused this Amendment No. 1 to be duly executed as of the date first above written.

AES ALAMITOS, L.L.C.

By:

Name: Title:

AES HUNTINGTON BEACH, L.L.C.

By:

Name:

Title:

AES REDONDO BEACH, L.L.C.

By:

Name:

Title:

WILLIAMS ENERGY SERVICES COMPANY

Title:

Schedule 4.3 - Shortfall Factor

AS = Availability Shortfall (expressed as a percentage)
= (Guaranteed Availability -Year-to-Date Availability) / Guaranteed Availability

			•						_	
If AS is	between	<u>.</u>	Then Short	fall fact	or is:	• .			•	•
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95%	and	100%							•	

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480 MW 538 per KW year 88.0%

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UDC= Unit Dependable Capacity
SF= Shortfalf Factor
UGA= Unit Gusranieed Availability

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Non Avail, Discount	\$1,520,000	-\$380,000	-\$142,176	\$267,829	-\$234,207	492,266	6166,090	62,489,723	4848,608	445,670	288,842	\$426,409	11,340
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SCHEDULE 8.2

Dispatch and Operating Procedures

Scheduling Coordinator

WESCO will be the Scheduling Coordinator ("SC") for all 14 Units, pursuant to the Scheduling Coordinator Agreement dated as of May ____, 1998 ("SCA") between WESCO and the AES Subsidiaries. As SC, pursuant to the SCA, WESCO will have exclusive responsibility for the interface with the ISO for all Non-market Transaction dispatch requests and the PX for all Market Transaction dispatch requests. The dispatch responsibility will include all Net Electric Energy and Ancillary Services. The AES Subsidiaries will be responsible for operation of the Units to the requested Capacity level and for provisions of the requested Ancillary Services each hour.

Maintenance and Outages

Planned Outages. (a) WESCO shall furnish to the AES Subsidiaries on or prior to the Effective Date and on each August 1 during the term a forecast of the operation which includes a monthly estimate of Unit MWhs of the Facilities for the following three years in order to provide the AES Subsidiaries with planning information to support the AES Subsidiaries' scheduling of Planned Outages. WESCO shall provide updates quarterly to the forecast for the next 12 months.

- (b) The AES Subsidiaries shall furnish to WESCO on or prior to the Effective Date and on each September 15 during the Term a forecast of the Planned Outage for all Units for the following three years. The AES Subsidiaries shall provide updates to the forecast in a timely manner, but not less frequently than quarterly.
- (c) The AES Subsidiaries shall coordinate the scheduling of all Planned Outages with WESCO and such schedule shall be consistent with the terms of the MRAs and subject to WESCO's reasonable approval and the provisions of Paragraph (d), below.

The AES Subsidiaries will submit to WESCO a 15-month Planned Outage schedule for each Unit no later than September 15 of each calendar year. WESCO will indicate its approval or objection such approval not to be reasonably withheld to the proposed Planned Outage Schedule by December 15 of the same calendar year. The AES Subsidiaries shall update the Planned Outage Schedule each January 1, April 1, and July 1 for the following 12 months. The quarterly updates shall indicate any proposed changes to previously approved Planned Outages, such changes, except as noted in paragraph (e) below, are subject to WESCO approval. Requests for Planned Outages or changes therein must include the following information:

- The affected Unit and the reason for the outage
- The work to be performed
- The earliest date the outage can begin
- The latest the outage can begin
- The expected duration of the outage
- The date the AES Subsidiaries would propose to begin the outage.

The AES Subsidiaries shall update the Planned Outage Schedule and provide Notice thereof to WESCO from time to time during the Term as provided in Schedule 8.2. Any change in the Planned Outage Schedule or any of the matters set forth therein shall be subject to the approval of WESCO. The AES Subsidiaries shall notify WESCO immediately upon the occurrence of any event or circumstance which could affect any Unit's return to service on the scheduled date thereof.

- (d) Planned Outages shall not be scheduled during any Designated Month. In each Contract Year WESCO will provide the AES Subsidiaries at least two periods, separated by at least ninety (90) Days unless the AES Subsidiaries shall consent otherwise, of two and one-half consecutive non-Designated Months for scheduling of Planned Outages.
- (e) Subject to the provisions of paragraph (d), the AES Subsidiaries will be permitted to change the schedule for a Planned Outage upon three (3) months' Notice to WESCO subject to WESCO consent. For all Planned Outages, the AES Subsidiaries will provide WESCO a request to commence the Planned Outage no earlier than 7 days before the outage and no later than 3 days before the start of the outage. WESCO will provide the AES Subsidiaries with approval and confirmation of the Planned Outage within 24 hours of the planned start date. The advance approval notice is subject to the requirements of the MRAs. The AES Subsidiaries will be responsible to notify immediately WESCO if there is any change to an approved outage. The notification is required with respect to changes in outages that have not begun and outages that are in progress.

Maintenance Outages. The AES Subsidiaries shall coordinate the scheduling of all Maintenance Outages and Maintenance Deratings during the Term with WESCO in accordance with the procedures therefor in this Schedule 8.2 The AES Subsidiaries shall provide Notice to WESCO of (i) the reason for each Maintenance Outage or Maintenance Derating, (ii) the Unit or Units affected, and (iii) the proposed date and time for the commencement and termination of such Maintenance Outage or Maintenance Derating (a "Maintenance Outage Schedule") from time to time during the Term as provided in this Schedule 8.2. Any change in a Maintenance Outage Schedule or in any of the matters set forth therein shall be subject to the procedures set forth therefor in this Schedule 8.2. The AES Subsidiaries shall notify WESCO immediately upon the occurrence of any event or circumstance which could result in the inability of the affected Units to return to service on the scheduled date therefor.

Forced Outages. The AES Subsidiaries shall provide Notice to WESCO as soon as possible concerning any Forced Outage or Forced Derating setting forth (i) the reason for such Forced Outage or Forced Derating, (ii) the Unit or Units affected and (iii) the proposed date and time for the termination of such Forced Outage or Forced Derating (a "Forced Outage Schedule") during the Term as provided in this Schedule 8.2. Any change in a Forced Outage Schedule or in any of the matters set forth therein shall be subject to the procedures set forth therefor in Schedule 8.2.

If the AES subsidiaries must perform a Maintenance Outage, Forced Outage, Maintenance Derating or Forced Derating, the AES Subsidiaries will immediately provide WESCO with an outage request that includes the following information:

- The affected Unit and the reason for the outage or derating
- The work to be performed
- The earliest date the outage or derating can begin (or began)
- The latest the outage can begin (if applicable)
- The expected duration of the outage
- The date the AES Subsidiaries would propose to begin the outage (if applicable)

WESCO will provide the AES Subsidiaries WESCO's preferred outage dates within 24 hours of the receipt outage request. If the WESCO dates and the AES Subsidiaries dates do not coincide, the parties will work in good faith to determine the outage date and if unable to agree, the outage schedule will be determined pursuant to Article XII.

Scheduling

WESCO will provide the AES Subsidiaries with an anticipated daily Unit forecast for the next 7 Days, each Monday no later than 11:00 PPT.

The AES Subsidiaries will provide WESCO a monthly report of actual Unit Planned Outage Hours, Maintenance Outage hours, Forced Outage hours, Maintenance Derating hours, Forced Outage hours, attempted Start-ups (Hot, Cold and Warm), actual Start-ups (Hot, Cold and Warm), Gas consumed, oil consumed, electricity consumed, actual Net Electric Energy delivered and actual MVARs within 10 days following the end of each month for each Unit. The report will indicate whether Unit Maintenance Outage hours during the month will count against the pool of Unit Planned Outage Hours.

WESCO will Dispatch the Units within the limits described in Schedules A, B, 4.1, 5.4, and 6.

The AES Subsidiaries will communicate with WESCO on a daily basis or instantaneously as changes warrant with respect to the availability and status of each Unit. If a WESCO Dispatch Notice includes a Unit Start-up, the AES Subsidiaries will notify WESCO by telephone when the Unit is synchronized and at minimum load ready to be dispatched to the required output. The AES Subsidiaries shall fax a copy of a completed Unit Start-up notice to WESCO within 24 hours of a Unit Start-up. When a dispatch notice requires a Unit Start-up or Shutdown, the AES Subsidiaries will be responsible to coordinate all required switching with the SCE Grid Control Center.

WESCO and the AES Subsidiaries will communicate all dispatch requests, Unit Start-Up Notices and Unit status Notices by telephone and fax. In the event of a failure of the primary communication link between the AES Subsidiaries and WESCO, both parties will try all available means to communicate including cell phones or additional communication devices as installed. WESCO will install a dedicated phone line, phone and fax machine in the following AES control rooms:

- Alamitos 1 and 2 (if units are off notice will be sent to AL 3 & 4)
- Alamitos 3 and 4, will serve as location for Unit 7 peaker
- Alamitos 5 and 6
- Huntington Beach 1 and 2, will serve as location for Unit 5 peaker
- Redondo Beach 5 and 6
- Redondo Beach 7 and 8

The AES Subsidiaries will be responsible to maintain all equipment within the facilities required by WESCO for proper Unit dispatch, AGC control, Unit status and Unit performance. The AES Subsidiaries will be responsible to maintain the Unit AGC signals to the ISO Energy Control Center.

The ISO reserves the right to communicate directly with the AES Subsidiary generating stations in the event of a system emergency. The AES Subsidiaries will be responsible to inform WESCO as soon as possible of all changes to the schedule or Unit status requested by the ISO as a result of a system emergency. The AES Subsidiaries will be responsible to maintain the required communication links to the ISO.

In the event a Unit is unable to meet a scheduled dispatch notice for any hour, the AES Subsidiaries will immediately call the WESCO dispatcher and inform them of the Unit status. The AES Subsidiaries shall fax a Forced Outage Notice for the affected Units immediately following the phone calls. The Forced Outage Notice should include an estimated time and date the Unit will return to normal.

If a WESCO dispatch request requires an additional ancillary service persuant to Article 5, paragraph 5.3, the AES Subsidiaries will be responsible to notify and provide WESCO with a cost for the requested service, within 1 hour of the dispatch request. WESCO will approve or change the dispatch request prior to issue of the Final Daily Dispatch Notice. All WESCO requested dispatch notices are considered accepted by the AES Subsidiaries unless WESCO is notified as stated above.

The Daily Unit Availability Notice, Maintenance Outage Notices and Forced Outage Notices will be used by WESCO to calculate the hourly Unit availability for the month and to report unit availability to the ISO pursuant to the requirements of the MRAs.

WESCO expects to participate in several PX markets. These include the day ahead market, hour ahead market and real time market. There will be several types of dispatch notices each day as a result of the various markets. Attached are copies of the dispatch notices.

The following is a time line for the Day Ahead Market.

Day Ahead Market

All times are latest allowable using PPT in relation to Trading Day. Trading Day is the day the power flows.

This is the current timeline and is subject to revision as the ISO, PX, characteristics of plants and system conditions change.

All communication between WESCO and the AES Subsidiaries will be by fax and confirmed by telephone unless otherwise specified.

The ISO may, pursuant to its Participating Generator Agreement with the AES Subsidiaries, communicate directly to each control room in the event of a system emergency.

Plant operators will telephone and fax Unit status to WESCO every morning and telephone the WESCO dispatcher immediately if the status or available Capacity should change within the day. The AES Subsidiary operator shall immediately confirm the Unit status change by fax to WESCO.

Time	Action
0430 One Day Ahead	AES plant operators fax Availability Notice to WESCO
0500 One Day Ahead	WESCO confirms, by telephone, to plant operators, receipt of Availability Notice.
1400 One Day Ahead	WESCO forwards preferred Day-Ahead schedules to plant operators by fax and confirm receipt by telephone
1500-1700 One Day Ahead	WESCO updates plant operators, by telephone, on adjusted Day-Ahead schedules
1830 Ahead	WESCO will notify plant operators by fax of final Unit Dispatch schedule for One Day the Trading Day, and confirmed by telephone
1845 One Day Ahead	AES plant operators verify, by phone, receipt of Final Unit Dispatch Schedule for the Trading Day.

The following is the time line for the Hour Ahead schedule.

Hour Ahead Market

All times are latest allowable using PPT in relation to Trading Hour.

This is the current timeline and is subject to revision as the ISO, PX, characteristics of plants and system conditions change.

All communication between WESCO and AES will be by fax and confirmed by telephone, unless otherwise specified.

The ISO is will communication directly to each control room in the event of a system emergency.

The AES Subsidiaries will telephone the WESCO dispatcher immediately if status or availability Capacity of a Unit should change within the day. The AES Subsidiary operator shall confirm the telephone notice with a Unit status update fax to WESCO immediately thereafter.

Two hours ahead

WESCO submits its preferred Hour-Ahead schedules, any adjustment bids, any Ancillary Services bids, and any self-provision schedules to the ISO or PX.

One hour ahead

WESCO provides a fax to the AES Subsidiaries of an updated schedule for the dispatch of the affected Units. The AES Subsidiaries will confirm receipt of the fax telephonically to WESCO dispatcher.

The following is the time line for the real time schedule.

Real Time Market

All times are latest allowable using PPT in relation to Trading Hour

This is the current timeline and is subject to revision as the ISO, PX, characteristics of plants, and system conditions change.

All times are latest allowable using PPT in relation to Trading Hour

30 Minutes Ahead

WESCO submit supplemental energy bids to the ISO.

ISO delivers hourly dispatch notice to must-run owner's SCs

During Trading Hour

ISO operates the system, procures imbalance Energy and issues real-time

dispatch

instructions, including Must-Run Dispatch Notices

AES UNIT MAINTENANCE/FORCED OUTAGE REQUEST

Foday's Date://	Affecte	d Unit:		-		
Name of Requestor:			<i>:</i>	•		, .
Type of Outage Requested:	Forced	Main	tenance		•	
Earliest Outage Start Date:/		Start Time:	Hours			
Latest Outage Start Date:/_	_/	Start Time:	Hours			
Preferred Outage Start Date:	<u></u>	Start Time:	Hours			
Outage Duration: Days	Hours	· · ·				
MW Unavailable:		_MW				•
Work To Be Performed:						
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Special Conditions:						
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Emergency Return To Service	e Time:	· · · · · · · · · · · · · · · · · · ·	Hours			-
WESCO Approval:			·			

DAILY UNIT AVAILABILITY NOTICE by AES

Generation Da	to .		particles of the	(notice must be sent b	y 04:30 PPT each day)	•	
Station Unit	Alemania AL 1		Issued By: Issued At:	****			
	ilable No Restriction	•	and the design				
Hour Ending	Available Output	Minimum Output	AGC Available	AGC Min Limit	AGC Max Limit	Ramp Rate	Comments
	(MW)	(MW) (non AGC)	YES/NO	(MAN)	(MM)	MW/Min	,
1:00	<u> </u>						
2:00					,		
3:00				<u> </u>		-	
4:00	 					-	
5:00		<u> </u>	<u> </u>				
6:00		ļ	<u> </u>	<u> </u>			
7:00			 	 			
8:00		<u> </u>	<u> </u>	 	·		
9:00	1	 	<u> </u>	<u> </u>			
10:00		 	 	 	<u> </u>		
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Comments:			,				
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.PREFERED DAY AHEAD UNIT DISPATCH NOTICE by WESCO

led Output AGC	Scheduled ES/NO	AGC Min Limit (IAM)	AGC Mex Limit	Spinning Reserve (MW)	Non Spinning (MM)	Voltage Support Yes/Ho	Comme
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FINAL DAY AHEAD UNIT DISPATCH NOTICE by WESCO

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		ISSUED AL						
Hour Ending	Scheduled Output	AGC Scheduled	AGC Min Limit	AGC Max Limit	Spirning Reserve	Non Spinning	Voltage Support	Comments
	(MW)	YESMO	(MM)	(1454)	(MW)	(MW)	Yee/No	CONTINUE
1:00					·	,,,	100,00	
2:00	,				:			
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UNIT STATUS CHANGE NOTICE by WESCO

Generation	n Date		•			•
Station Unit	Alamios Issued By: AL 1 Issued At	, <u></u>			•	•
Changes Comment	From Scheduled Delivery are high	lighted			•	
			•			
				•		

Hour Ending	Scheduled Output	AGC Scheduled	AGC Min Limit	AGC Max Limit	Comments
	(MW)	YES/NO	(MW)	(MW)	
1:00					
2:00					
3:00	•				
4:00					
5:00					
6:00					
7:00					
8:00					·
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UNIT START-UP NOTICE by WESCO

Date			
Station Unit	Alamitos AL 1	Issued By:	
Date and	Time Fire In Unit		
Date and	1 Time Unit Synchronized		
Date and	d Time Unit Released for dispatch		
Electric	Consumed During Start-Up	Eu jugger in Afgelok Eine bies beitige des Bei	(MWh)
Fuel Co	nsumed During Start-Lin		AMPTILA



AES Alamitos, LLC Attn: Contact

Address

Phone: Address

Fax:

INVOICE Invoice No: 999999 Invoice Date: Terms:

REMITTANCE INSTRUCTIONS Please remit by wire or ACH For the account of WESCO

FNB-Chicago, Chicago IL ABA ########

Due Date:

For Billing Inquiries, cell contact at , () 8:00 am - 5:00 pm (CST) P.O. Box 2848, Tulea, OK 74101-9567

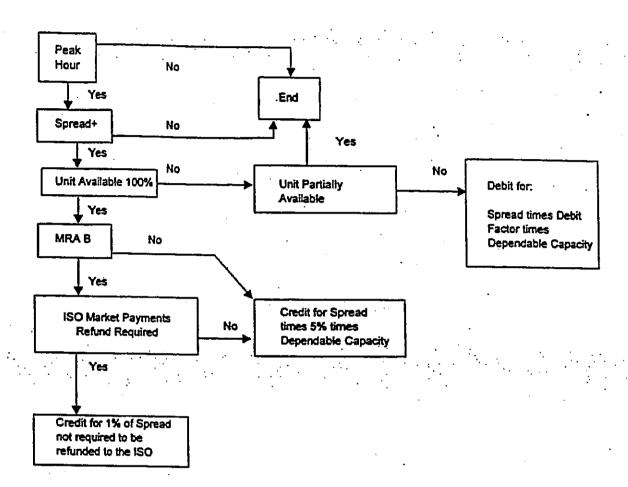
Trans Date Deal#	Trans Type Carrier	Description	Ö	Quantity	Cult	Rate	Item Amt
6/98		Variable Payment Market	•		•		
86/9		Variable Payment Non Market	•		•		. •
6/98		Ancillary Services Payment				•	
86/98		Start Up Payments	•		•		:
6/98		Start Up Heat Rate Adjustment	 				
86/98		Heat Rate True Up					٠
96/9		Fixed Payment					
86/9	: •	Availability Bonus					٠.
86/9		Availability Discount	· ·			**	84,837,00

84,837,00

Invoice Total

Availability Bonus:

<u>Unit 1</u>



Example Gas Meter Adjustment Calculations

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AL6	385	/MMRTI Ict	2450.0	2450.0	2450.0	2460.0	0.00.0	2401.0	2450.0	7430.0	2523.5	5481.0	3910.0	3428.0	3428.0	3428.0	742R	0.035	4512.0	4512.0	4811.3	4098.0	4512.0	3751.5	3044.7	2758.0	2450.0	2450.0		79,415.0
AL 5	Gas	(MWBTUS)	2450.0	24500	2450.0		ı	0.0642	ĺ	ŀ					4704.0	4704.0	47040	200	1. P. C.	4704.0	4704.0	4704.0	4704.0	2940.0	2940.0	2744.0	2450.0	2450.0		61,630.0
ALA	Sas.	(MMBTUs)		1585.0		1585.0	4585.0	1203.0	4707.E	0.7034	C./BBC	3013.9	3172.5	3331.1	3156.6	3140.8	3204.2	0 0000	3230.0	2140.0	3564.0	3470.2	4092.7	2722.5	2761.9	2082.0	1593.9	1589.2		66,600.5
AL 3	Gas	(MMBTUs)	0.0	0.0	0.0	UU	200	200	200	5 6	200	0.0	0.0	0.0	0.0	0.0	0.0	1	200	2.0	0.0	0'0	0.0	0.0	0.0	0.0	0.0	0.0		0.0
AL 2	915	(MMBTUs)	0.0	0.0	0.0	9	00	00	6.0	2	200	D'O	0.0	0.0	0.0	0.0	9	5	9	20	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	,	0.0
AL.1	Gas	(MMBTUs)	290.0	290.0	290.0	290.0	280.0	280.0	Ann n	4000	0,000	IO.62.71	1725.0	1725.0	1725,0	1725,0	1725.0	170K D	4775	0,23,0	600.0	777.0	0.899	920.0	290.0	290.0	290.0	, 290.0		21,393.0
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SoCal Gas	· Unit 7	(MMBTUs)	0.0	0.0	0.0	0.0	00	0.0	00	9	2 6		0.0	0.0	2167.9	2194.5	2181.2	0	00		2.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0		6,543,6
Socal Gas	Und 5 & 0	(MMBTUs)	4800.0	4900.0	4800.0	4900.0	4900.0	4900,0	4800.0	4900.0	7024	0.4561	7530.0	8130.0	6130.0	6130.0	0.0510	9216.0	D 31 CO	2 9	9210.0	2200.0	9216.0	6600.0	6000.0	2200.0	4900.0	4000.0	•	161,045.0
SoCal Gas	Units 1,2,3 &4	(MWBTUs)	1875.0	1675.0	1675.0	1875.0	1875.0	4897.5	4897.5	4897.5	A 4807 A	7.100	4597.5	4897.5	4697.5	4897.5	4697.5	4897.5	4897 8	2000	4400.0	4300.0	4800.0	3800.0	3100.0	3000.0	1900.0	1675.0		90,222.5
Hour			1:00	2:00	3:00	00:1	2:00	9:00	7.00	00:8	00.0	00.00	10:00	11:00	12:00	13:00	14:00	15:00	18:00	100	3	18:00	19:00	20:00	21:00	22:00	23:00	0:00		Total

Schedule 10.1

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Calculation of The Non Availability Discount Factor

Assume

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Unit Fixed Payment

• Year-To-Date Unit Avalability
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Schedule 10.1

Spread

Spread=PXCP-(VPP+(GUHR)*GP/1000)+PSTP
Where;
PXCP=Initial Day Ahead California PX Unconstrained Clearing Price (\$/MWH)
VPP=Variable Payment Price (\$/MWH)
GUHR=Guaranteed Unit heat rate at the dependable capacity (BTU/KWh) per Schedule 7
PSTP= Prorated Start-up payment (\$)
GP=Hourly Gas Price (\$/MMBTU)

Heat Rate True Up

HRTUP=Actual Gas Cost - Guaranteed Gas Cost Where:

Actual Gas Cost = Adjusted Unit Hourly Gas Consumption (MMBTU) * Hourly Gas Price (\$/MMBTU)

Guaranteed Gas Cost = (Guaranteed Unit Heat Rate at WESCO Unit Dispatch Load (BTU/KWh) *

Actual Unit output (MWh) * Hourly Gas Price (\$/MMBTU) / 1000)

Notes:

- If HRTUP is negative, WESCO will credit AES, if HRTUP is positive, AES will pay WESCO HRTUP for the applicable hour.
- 2. Adjusted unit hourly gas consumption is calculated from the Unit gas meters and adjusted to the Revenue meters

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Amendment No. 3

FEDERAL EIERGY
REGULATION COMMISSION
Amendment No. 2 dated as of <u>Narch 5</u>. 2002 (this "Amendment No. 2") to that certain Capacity Sale and Tolling Agreement dated as of May 1, 1998 (as amended and supplemented from time to time, the "Tolling Agreement") by and among AES Alamitos. L.L.C., AES Huntington Beach, L.I.C., and AFS Redondo Beach, L.L.C (collectively, the "AES Subsidiaries") and Williams Energy Marketing & Trading Company (formerly Williams Energy Services Company) ("Williams EM&T").

WHEREAS, for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledge, the parties hereto wish to amend and supplement the Tolling Agreement in certain respects, and wish to agree on certain related matters.

Accordingly, the parties hereto agree as follows:

- 1. <u>Definitions and Section References</u>. Capitalized terms used herein without definition have the respective meanings given to them in the Tolling Agreement, unless otherwise specified or the context otherwise requires. Section references are to the Tolling Agreement.
 - Availability Bonus Amendment. Effective May 1 ___, 2002.
- (a) The text of Section 1.9 is deleted in its entirety and replaced with the following:

"Availability Banus has the meaning specified in Section 4.4."

(b) The texts of Section 1.13 and Section 1.98 are deleted in their entirety, and each is replaced with the following:

"[Intentionally Omitted]."

- (c) Schedule 10.1 is amended to (i) delete in their entirety the Sections with the headings "Availability Bonus", "Availability Bonus Calculation", and "Spread" and (ii) replace the Section with the heading "Spread" with the following: "Availability Bonus Section 4.4."
 - (d) Section 4.4 is deleted in its entirety and replaced with the following:
- "4.4 Availability Bonus. (a) On each date a Fixed Payment is due following a Designated Month, WESCO shall pay the AES Subsidiaries the Availability Bonus, if any, applicable to each of the Facilities, as calculated pursuant to Section 4.4(b) and Section 4.4(c).
- (b) (i) If the megawatt weighted average Availability of all of the Units at all Facilities during a Designated Month ("Portfolio Availability") is greater than or equal to 75%, and (ii) if the megawatt weighted average Availability of all Units at a Facility (Alamitos,

Huntington Beach, or Redondo Beach, as the case may be) during Peak Times of same Designated Month (each, in respect of the relevant Facility, the "Peak Time Facility Availability") is greater than 86%; then (iii) subject to Section 4.4(c), the Availability Bonus for such Facility in respect of such Designated Month shall equal:

For Alamitos:

Forty-rive thousand dollars (\$45,000) multiplied by (Peak

Time Facility Availability minus 86%).

For Huntington Beach: Ten thousand dollars (\$10,000) multiplied by (Peak Time

Facility Availability minus 86%).

For Redondo Beach:

Thirty thousand dollars (\$30,000) multiplied by (Peak

Time Facility Availability minus 86%); and

(iv) if the Portfolio Availability is less than 75% or if the Peak Time Facility Availability is less than 86% for a Facility, then the Availability Bonus for such Facility for such Designated Month shall be zero.

- For calendar years 2002, 2003, and 2004, Availability Bonus amounts calculated pursuant to Section 4.4(b)(iii) shall be reduced by 50%."
- Miscellaneous. (a) Except as expressly amended hereby, the Tolling Agreement shall remain unmodified and in full force and effect.
- The provisions of Article XXIII (Miscellaneous Provisions) in the Tolling Agreement are hereby incorporated into this Amendment No. 2 by this reference, mutatis mutundis.

IN WITNESS WHEREOF, the parties hereto have caused this Amendment No. 2 to be duly executed as of the date first above written.

AES ALAMITOS, L.L.C.

AES REDONDO BEACH, L.L.C.

Name: President Mark Word Title: President Are Southwin	By: Marie: Mark Doorkasse LLC. Title: President per south and
AES HUNTINGTON BEACH, L.L.C.	WILLIAMS ENERGY MARKETING &
By: Mark Work A South and I	By: Namer Philip d. Scalzo Vice President

APPENDIX E

J.P. Morgan Ventures Energy Corporation's 2012 Asset Appendices

						Lo	ocation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Commodities Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
	ER06-1407	Noble Bliss Windpark	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21
	ER08-578	Noble Chateaugay Windpark	Noble Chateaugay Windpark, LLC**	Noble Chateaugay Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
	ER08-579	Noble Wethersfield Windpark	Noble Wethersfield Windpark, LLC**	Noble Wethersfield Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	РЈМ	Northeast	2006	7.5
	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus, LLC	N/A	РЈМ	Northeast	2006	24
	ER02-2310	Crescent Ridge	Crescent Ridge LLC**	N/A	N/A	РЈМ	Northeast	2005	51
	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75
	ER06-1335	Evergreen Wind Power	Evergreen Wind Power, LLC**	New Brunswick Power Generation Corporation	N/A	NBPC	Northeast	2007	42
	ER06-1122	High Trail Wind Farm	High Trail Wind Farm, LLC**	N/A	N/A	РЈМ	Northeast	2007	198
	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
	ER07-1199	Munnsville Wind Farm	Munnsville Wind Farm, LLC**	Coral Energy	N/A	NYIS	Northeast	2007	34.5
	ER09-429	Sheldon Energy LLC	Sheldon Energy LLC**	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Vermont Wind, LLC	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.;	N/A	ISO-NE	Northeast	2011	40
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	soco	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach 7	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-1	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	56.4 MW (total for all Rocky Reach units)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C- 10	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1974	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1974	See Above

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-2	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-3	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C- 4	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-5	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-6	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-7	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-8	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above

Filing Entity and its Energy Affiliates* Docket No. where MBR Authority was Granted Name LP Morgan ED05 1222 Docket No. Where MBR Authority Reneration Name						Location			
	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)		
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C- 9	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above
Settlers Trail Wind Farm LLC	ER11-2904	Settlers Trail	Settlers Trail Wind Farm, LLC	EC&R Investo Mgmt II, LLC	December 13, 2011	MISO	Central	2011	150
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

[^] Indicates affiliated power marketers.

Excludes interests in generation in region of Electric Reliability Council of Texas.

^{**} Indicates that ownership interest is a passive non-controlling and non-managing interest.

^{***} Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Loc	cation	Size
					Balancing authority area	Geographic region (per Appendix D)	
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

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Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW
J.P. Morgan Ventures Energy Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Commodities Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
	ER06-1407	Noble Bliss Windpark	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21
	ER08-578	Noble Chateaugay Windpark	Noble Chateaugay Windpark, LLC**	Noble Chateaugay Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
	ER08-579	Noble Wethersfield Windpark	Noble Wethersfield Windpark, LLC**	Noble Wethersfield Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic Wind	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	PJM	Northeast	2006	7.5
	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus, LLC	N/A	РЈМ	Northeast	2006	24
	ER02-2310	Crescent Ridge	Crescent Ridge LLC**	N/A	N/A	РЈМ	Northeast	2005	51
	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75
	ER06-1335	Evergreen Wind	Evergreen Wind Power, LLC**	New Brunswick Power Generation Corporation	N/A	NBPC	Northeast	2007	42
	ER06-1122	High Trail Wind Farm	High Trail Wind Farm, LLC**	N/A	N/A	РЈМ	Northeast	2007	198
	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
	ER07-1199	Munnsville Wind Farm	Munnsville Wind Farm, LLC**	Coral Energy	N/A	NYIS	Northeast	2007	34.5
	ER09-429	Sheldon Energy LLC	Sheldon Energy LLC**	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Vermont Wind, LLC	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	soco	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	soco	Southeast	1971-2000	844
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-1	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	56.4 MW (total for all Rocky Reach units)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C- 10	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1974	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1974	See Above

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-2	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-3	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-4	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-5	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-6	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-7	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-8	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above

						Location			
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-9	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above
Settlers Trail Wind Farm LLC	ER11-2904	Settlers Trail	Settlers Trail Wind Farm, LLC	EC&R Investo Mgmt II, LLC	December 13, 2011	MISO	Central	2011	150
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

[^] Indicates affiliated power marketers.

^{*} Excludes interests in generation in region of Electric Reliability Council of Texas.

^{**} Indicates that ownership interest is a passive non-controlling and non-managing interest.

^{***} Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Lo	cation	Size
	and use	2,9	ti andici i cu	Balancing authority area	Geographic region (per Appendix D)		
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

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		Generation Name	Owned By	Controlled By***		Lo	cation		Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted				Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
J.P. Morgan Ventures Energy Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Commodities Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
Noble Bliss	Noble Bliss Windpark	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5	
	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21
	ER08-578	Noble Chateaugay Windpark	Noble Chateaugay Windpark, LLC**	Noble Chateaugay Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5

		Generation Name	Owned By	Controlled By***		Lo	cation	In-Service	Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted				Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)		
	ER08-579	Noble Wethersfield Windpark	Noble Wethersfield Windpark, LLC**	Noble Wethersfield Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	PJM	Northeast	2006	7.5
	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus, LLC	N/A	РЈМ	Northeast	2006	24
	ER02-2310	Crescent Ridge	Crescent Ridge LLC**	N/A	N/A	РЈМ	Northeast	2005	51
	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75
	ER06-1335	Evergreen Wind Power	Evergreen Wind Power, LLC**	New Brunswick Power Generation Corporation	N/A	NBPC	Northeast	2007	42
	ER06-1122	High Trail Wind Farm	High Trail Wind Farm, LLC**	N/A	N/A	РЈМ	Northeast	2007	198
	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
	Munnsville Wind Farm, LLC** ER07-1199 Wind Farm Farm, LLC** ER09-429 Sheldon Energy LLC Sheldon Energy LLC**		Coral Energy	N/A	NYIS	Northeast	2007	34.5	
		Sheldon Energy	Sheldon Energy	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5

			Owned By	Controlled By***		Lo	cation	In-Service Date	Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name			Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)		
	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40
	ER11-4501	Caney River Wind Project	Caney River Wind Project, LLC	Caney River Wind Project, LLC	N/A	SPP / Westar Energy	Central	2011	199.8
	ER11-3414	Blue Canyon Windpower VI	Blue Canyon Windpower VI, LLC	Blue Canyon Windpower VI, LLC	N/A	SPP / Western Farmers Electric Coop.	Central	2011	99
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

		Generation Name	Owned By			Lo	cation		Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted			Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8

						Lo	cation		Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach 7	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-1	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	56.4 MW (total for all Rocky Reach units)

		Generation Name	Owned By	Controlled By***		Lo	cation		Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted				Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C- 10	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1974	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1974	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-2	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-3	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-4	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-5	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-6	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above

	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Location			
Docket No. where MBR Authority was Granted					Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
ER05-1232	Rocky Reach C-7	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
ER05-1232	Rocky Reach C-8	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above
ER05-1232	Rocky Reach C- 9	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above
N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
	where MBR Authority was Granted ER05-1232 ER05-1232	where MBR Authority was GrantedGeneration NameER05-1232Rocky Reach C-7ER05-1232Rocky Reach C-8ER05-1232Rocky Reach C-9N/A (QF)OLS Chino	where MBR Authority was Granted Generation Name Owned By ER05-1232 Rocky Reach C-7 Public Utility District No. 1 of Chelan County, Washington ER05-1232 Rocky Reach C-8 Public Utility District No. 1 of Chelan County, Washington ER05-1232 Rocky Reach C-9 Public Utility District No. 1 of Chelan County, Washington N/A (QF) OLS Chino OLS Energy Chino (30% owned) N/A (QF) OLS Chino OLS Energy Chino OLS Energy Chino (30% owned)	where MBR Authority was GrantedGeneration NameOwned ByControlled By***ER05-1232Rocky Reach C- 7Public Utility District No. 1 of Chelan County, WashingtonJ.P. Morgan Ventures Energy CorporationER05-1232Rocky Reach C- 8Public Utility District No. 1 of Chelan County, WashingtonJ.P. Morgan Ventures Energy CorporationER05-1232Rocky Reach C- 9Public Utility District No. 1 of Chelan County, WashingtonJ.P. Morgan Ventures Energy CorporationN/A (QF)OLS ChinoOLS Energy Chino (30% owned)OLS Energy ChinoN/A (QF)OLS ChinoOLS Energy ChinoOLS Energy	where MBR Authority was GrantedGeneration NameOwned ByControlled By***Date Control Transferred***ER05-1232Rocky Reach C- 7Public Utility District No. 1 of Chelan County, WashingtonJ.P. Morgan Ventures Energy CorporationMarch 1, 2011ER05-1232Rocky Reach C- 8Public Utility District No. 1 of Chelan County, WashingtonJ.P. Morgan Ventures Energy CorporationMarch 1, 2011ER05-1232Rocky Reach C- 	Docket No. where MBR Authority was Granted Controlled By*** Date Control Authority Area	Docket No. where MBR Authority was Granted Name	Docket No. where MBR Authority was Granted Controlled By*** Date Control Transferred*** Region (per Appendix D) In-Service Date

[^] Indicates affiliated power marketers.

Excludes interests in generation in region of Electric Reliability Council of Texas.

^{**} Indicates that ownership interest is a passive non-controlling and non-managing interest.

^{***} Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Loc	cation	Size
					Balancing authority area	Geographic region (per Appendix D)	
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

		Generation Name	Owned By			Lo	cation		Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted			Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
J.P. Morgan Ventures Energy Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^ J.P. Morgan Commodities	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
	Noble Bliss Noble Bliss	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5	
	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21
	ER08-578	Noble Chateaugay Windpark	Noble Chateaugay Windpark, LLC**	Noble Chateaugay Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
	ER08-579	Noble Wethersfield Windpark	Noble Wethersfield Windpark, LLC**	Noble Wethersfield Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	PJM	Northeast	2006	7.5
	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus, LLC	N/A	РЈМ	Northeast	2006	24
	ER02-2310	Crescent Ridge	Crescent Ridge LLC**	N/A	N/A	РЈМ	Northeast	2005	51
	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75
	ER06-1335	Evergreen Wind Power	Evergreen Wind Power, LLC**	New Brunswick Power Generation Corporation	N/A	NBPC	Northeast	2007	42
	ER06-1122	High Trail Wind Farm	High Trail Wind Farm, LLC**	N/A	N/A	РЈМ	Northeast	2007	198
	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
	ER07-1199	Munnsville Wind Farm	Munnsville Wind Farm, LLC**	Coral Energy	N/A	NYIS	Northeast	2007	34.5
	ER09-429	Sheldon Energy LLC	Sheldon Energy LLC**	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40
	ER11-4501	Caney River Wind Project	Caney River Wind Project, LLC	Caney River Wind Project, LLC	N/A	SPP / Westar Energy	Central	2011	199.8
	ER11-3414	Blue Canyon Windpower VI	Blue Canyon Windpower VI, LLC	Blue Canyon Windpower VI, LLC	N/A	SPP / Western Farmers Electric Coop.	Central	2011	99
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach 7	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	soco	Southeast	1971-2000	844
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-1	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	56.4 MW (total for all Rocky Reach units)

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C- 10	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1974	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1974	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-2	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-3	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-4	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-5	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Rocky Reach C-6	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1961	See Above

Docket No. where MBR					Location			
Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
ER05-1232	Rocky Reach C-7	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1961	See Above
ER05-1232	Rocky Reach C-8	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	BPA	Northwest	1973	See Above
ER05-1232	Rocky Reach C-9	Public Utility District No. 1 of Chelan County, Washington	J.P. Morgan Ventures Energy Corporation	March 1, 2011	ВРА	Northwest	1973	See Above
N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
E	ER05-1232 ER05-1232	7 RR05-1232 Rocky Reach C-8 RR05-1232 Rocky Reach C-9 ROCky Reach C-9 ROCky Reach C-9	7 District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C- 8 Public Utility District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C- 9 Public Utility District No. 1 of Chelan County, Washington OLS Chino OLS Energy Chino (30% owned)	District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C- 8 Public Utility District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C- 9 Public Utility District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C- 9 Public Utility District No. 1 of Chelan County, Washington Ventures Energy Corporation District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C-8 Public Utility District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C-9 Public Utility District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C-9 Public Utility District No. 1 of Chelan County, Washington RR05-1232 Rocky Reach C-9 Corporation RR05-1232 Rocky Reach C-9 Chelan County, Washington RR05-1232 Rocky Reach C-9 Chelan County, Washington RR05-1232 Rocky Reach C-9 Chelan County, Corporation RR05-1232 Rocky Reach C-9 Chelan County, Washington RR05-1232 Rocky Reach C-9 Chelan County, Corporation RR05-1232 Rocky Reach C-9 Chelan	District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-8 RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C-9 District No. 1 of Chelan County, Washington RO5-1232 Rocky R	R05-1232 Rocky Reach C- 7 Public Utility District No. 1 of Chelan County, Washington R05-1232 Rocky Reach C- 8 Public Utility District No. 1 of Chelan County, Washington J.P. Morgan Ventures Energy Corporation March 1, 2011 BPA Northwest Northwest J.P. Morgan Ventures Energy Corporation March 1, 2011 BPA Northwest Northwest Northwest Northwest Northwest Northwest OLS Chino OLS Energy Chino (30% owned) OLS Energy Chino OLS Energy N/A CISO Southwest	RO5-1232 Rocky Reach C- 7 Public Utility District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C- 8 Public Utility District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C- 9 Public Utility District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C- 9 Public Utility District No. 1 of Chelan County, Washington RO5-1232 Rocky Reach C- 9 Public Utility District No. 1 of Chelan County, Washington Ventures Energy Corporation March 1, 2011 BPA Northwest 1973 Northwest 1973 Northwest 1973 Ventures Energy Corporation Northwest 1973 Northwest 1973 Northwest 1973 Northwest 1973 Northwest 1973 Ventures Energy Corporation Ventures Energy Corporation Northwest 1973 Northwest 1973 Northwest 1973 Ventures Energy Corporation Ventures Energy Corporation Northwest 1973	

[^] Indicates affiliated power marketers.

Excludes interests in generation in region of Electric Reliability Council of Texas.

^{**} Indicates that ownership interest is a passive non-controlling and non-managing interest.

^{***} Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Loc	cation	Size
					Balancing authority area	Geographic region (per Appendix D)	
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

JPMorgan Chase & Co. Energy Affiliates (as defined in 18 C.F.R. § 35.36(a)(9)) MARKET-BASED RATE AUTHORITY AND GENERATION ASSETS

						Loc	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan									
Ventures Energy									
Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Commodities									
Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
Noble Environmental Power, LLC	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81

						Loc	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Noble									
Environmental		Noble Bliss	Noble Bliss	Noble Bliss					
Power, LLC	ER06-1407	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
Noble Environmental Power, LLC	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
Noble		•	•	•					
Environmental		Noble Bellmont	Noble Bellmont	Noble Bellmont					
Power, LLC	ER08-577	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	21
Noble		Noble	•	Noble					
Environmental		Chateaugay	Noble Chateaugay	Chateaugay					
Power, LLC	ER08-578	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5
Noble		Noble	Noble	Noble					
Environmental		Wethersfield	Wethersfield	Wethersfield					
Power, LLC	ER08-579	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic Wind	Jersey-Atlantic Wind, LLC**	Atlantic City Electric	N/A	PJM	Northeast	2006	7.5
-	N/A (QF)	WIIIU	Willia, LLC	Company	N/A	PJIVI	Northeast	2000	7.3
JPM Capital Corporation/ FC									
Energy Finance I,		Wind Park Bear	Wind Park Bear	PPL Energy					
Inc	N/A (QF)	Creek	Creek, LLC**	Plus, LLC	N/A	PJM	Northeast	2006	24
JPM Capital Corporation/ FC									
Energy Finance I,			Crescent Ridge						
Inc	ER02-2310	Crescent Ridge	LLC**	N/A	N/A	PJM	Northeast	2005	51

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital Corporation/ FC Energy Finance I, Inc	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1335	Evergreen Wind Power	Evergreen Wind Power, LLC**	New Brunswick Power Generation Corporation	N/A	NBPC	Northeast	2007	42
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1122	High Trail Wind Farm	High Trail Wind Farm, LLC**	N/A	N/A	PJM	Northeast	2007	198
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
JPM Capital Corporation/ FC Energy Finance I, Inc	ER07-1199	Munnsville Wind Farm	Munnsville Wind Farm, LLC**	Coral Energy	N/A	NYIS	Northeast	2007	34.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital Corporation/ FC Energy Finance I, Inc	ER09-429	Sheldon Energy LLC	Sheldon Energy LLC**	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5
JPM Capital Corporation/ FC Energy Finance I, Inc	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40
JPM Capital Corporation	ER11-113	Sandy Ridge Facility	Sandy Ridge Wind, LLC**	Algonquin Power Fund (America) Inc.	N/A	РЈМ	Northeast	2011	50
J.P. Morgan Investment Management Inc.	ER12-1562	AES Somerset Facility	Somerset Cayuga Holding Company, Inc.**	Somerset Operating Company, LLC	N/A	NYISO	Northeast	1984	678
J.P. Morgan Investment Management Inc.	ER12-1563	AES Cayuga Facility	Somerset Cayuga Holding Company, Inc.**	Cayuga Operating Company, LLC	N/A	NYISO	Northeast	1955	313
JPMorgan Capital Corporation	ER12-1228	Majestic II Project	High Majestic II Wind Properties, LLC**	High Majestic II Holdings, LLC	N/A	SPS	Southwest	2012	79.6

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Redondo Beach 7	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Loc	cation	Size	
					Balancing authority area	Geographic region (per Appendix D)		
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A	

						Loc	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan									
Ventures Energy									
Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan									
Ventures Energy									
Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan									
Commodities									
Canada	ED00 1141	NT/A	NT/A	NY/A	NT/A	NT/A	NT/A	NT / A	NT/A
Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble		N. l.1. Clinton	Noble Clinton	Noble Clinton					
Environmental	ER06-1413	Noble Clinton	Windpark I, LLC**	Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
Power, LLC Noble	EKU0-1415	Windpark I	LLC	LLC	N/A	NIIS	Normeast	2008	100.3
Environmental		Noble Ellenburg	Noble Ellenburg	Noble Ellenburg					
Power, LLC	ER06-1408	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	2008	81
Noble	LICO-1700	** mapark	11 mapaik, LLC	" mapaik, LLC	11/13	11110	Tiornicast	2000	01
Environmental		Noble Bliss	Noble Bliss	Noble Bliss					
Power, LLC	ER06-1407	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
Noble								, , ,	
Environmental		Noble Altona	Noble Altona	Noble Altona					
Power, LLC	ER06-1409	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	102
Noble			, ,						
Environmental		Noble Bellmont	Noble Bellmont	Noble Bellmont					
Power, LLC	ER08-577	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	21

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Noble		Noble		Noble					
Environmental		Chateaugay	Noble Chateaugay	Chateaugay					
Power, LLC	ER08-578	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5
Noble		Noble	Noble	Noble					
Environmental		Wethersfield	Wethersfield	Wethersfield					
Power, LLC	ER08-579	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic Wind	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	PJM	Northeast	2006	7.5
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus, LLC	N/A	PJM	Northeast	2006	24
JPM Capital Corporation/ FC Energy Finance I, Inc	ER02-2310	Crescent Ridge	Crescent Ridge LLC**	N/A	N/A	PJM	Northeast	2005	51
JPM Capital Corporation/ FC Energy Finance I, Inc	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75

						Location			
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital				New Brunswick					
Corporation/ FC Energy Finance I,		Evergreen Wind	Evergreen Wind	Power Generation					
Inc	ER06-1335	Power	Power, LLC**	Corporation	N/A	NBPC	Northeast	2007	42
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1122	High Trail Wind	High Trail Wind Farm, LLC**	N/A	N/A	РЈМ	Northeast	2007	198
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
JPM Capital Corporation/ FC Energy Finance I, Inc	ER07-1199	Munnsville Wind Farm	Munnsville Wind Farm, LLC**	Coral Energy	N/A	NYIS	Northeast	2007	34.5
JPM Capital Corporation/ FC Energy Finance I, Inc	ER09-429	Sheldon Energy LLC	Sheldon Energy LLC**	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital Corporation/ FC Energy Finance I, Inc	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40
JPM Capital Corporation	ER11-113	Sandy Ridge Facility	Sandy Ridge Wind, LLC**	Algonquin Power Fund (America) Inc.	N/A	PJM	Northeast	2011	50
J.P. Morgan Investment Management Inc.	ER12-1562	AES Somerset Facility	Somerset Cayuga Holding Company, Inc.**	Somerset Operating Company, LLC	N/A	NYISO	Northeast	1984	678
J.P. Morgan Investment Management Inc.	ER12-1563	AES Cayuga Facility	Somerset Cayuga Holding Company, Inc.**	Cayuga Operating Company, LLC	N/A	NYISO	Northeast	1955	313
JPMorgan Capital Corporation	ER12-1228	Majestic II Project	High Majestic II Wind Properties, LLC**	High Majestic II Holdings, LLC	N/A	SPS	Southwest	2012	79.6
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach 7	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504

						Location			
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

[^] Indicates affiliated power marketers.

^{*} Excludes interests in generation in region of Electric Reliability Council of Texas.

^{**} Indicates that ownership interest is a passive non-controlling and non-managing interest.

^{***} Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan									
Ventures Energy									
Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan	2107 333	1771	1011	11/11	1071	11/11	10/11	1011	11/11
Commodities									
Canada									
Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
Noble			, , ,	, , , , ,					
Environmental Power, LLC	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
Noble									
Environmental Power, LLC	ER06-1407	Noble Bliss Windpark	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
Noble									
Environmental		Noble Altona	Noble Altona	Noble Altona					
Power, LLC	ER06-1409	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	102
Noble		N.1.1. D.11	N. 1.1. D. 11	N.1.1. D.11					
Environmental Power, LLC	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Noble		Noble		Noble					
Environmental		Chateaugay	Noble Chateaugay	Chateaugay					
Power, LLC	ER08-578	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5
Noble		Noble		Noble					
Environmental		Wethersfield	Noble Wethersfield	Wethersfield					
Power, LLC	ER08-579	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic Wind	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	PJM	Northeast	2006	7.5
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus,	N/A	PJM	Northeast	2006	24
JPM Capital Corporation/ FC Energy Finance I, Inc	ER02-2310	Crescent Ridge	Crescent Ridge LLC**	N/A	N/A	PJM	Northeast	2005	51
JPM Capital Corporation/ FC Energy Finance I, Inc	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital				New Brunswick					
Corporation/ FC		F	F	Power					
Energy Finance I, Inc	ER06-1335	Evergreen Wind Power	Evergreen Wind Power, LLC**	Generation Corporation	N/A	NBPC	Northeast	2007	42
JPM Capital	EKU0-1333	Power	Power, LLC***	Corporation	N/A	NDPC	Normeast	2007	42
Corporation/ FC Energy Finance I,		High Trail Wind	High Trail Wind						
Inc	ER06-1122	Farm	Farm, LLC**	N/A	N/A	PJM	Northeast	2007	198
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
JPM Capital Corporation/ FC Energy Finance I, Inc	ER07-1199	Munnsville Wind Farm	Munnsville Wind Farm, LLC**	Coral Energy	N/A	NYIS	Northeast	2007	34.5
JPM Capital Corporation/ FC Energy Finance I, Inc	ER09-429	Sheldon Energy LLC	Sheldon Energy LLC**	Sheldon Energy LLC	N/A	NYIS	Northeast	2009	112.5
JPM Capital Corporation/ FC Energy Finance I, Inc	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital Corporation	ER11-113	Sandy Ridge Facility	Sandy Ridge Wind, LLC**	Algonquin Power Fund (America) Inc.	N/A	РЈМ	Northeast	2011	50
J.P. Morgan Investment Management Inc.	ER12-1562	AES Somerset Facility	Somerset Cayuga Holding Company, Inc.**	Somerset Operating Company, LLC	N/A	NYISO	Northeast	1984	678
J.P. Morgan Investment Management Inc.	ER12-1563	AES Cayuga Facility	Somerset Cayuga Holding Company, Inc.**	Cayuga Operating Company, LLC	N/A	NYISO	Northeast	1955	313
JPMorgan Capital Corporation	ER12-1228	Majestic II Project	High Majestic II Wind Properties, LLC**	High Majestic II Holdings, LLC	N/A	SPS	Southwest	2012	79.6
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

JPMorgan Chase & Co. Energy Affiliates (as defined in 18 C.F.R. § 35.36(a)(9)) MARKET-BASED RATE AUTHORITY AND GENERATION ASSETS

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda-Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach 7	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

						Loc	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

- ^ Indicates affiliated power marketers.
- * Excludes interests in generation in region of Electric Reliability Council of Texas.
- ** Indicates that ownership interest is a passive non-controlling and non-managing interest.
- *** Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Loc	cation	Size
			,		Balancing authority area	Geographic region (per Appendix D)	
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Commodities Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
Noble Environmental Power, LLC	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
Noble Environmental Power, LLC	ER06-1407	Noble Bliss Windpark	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
Noble Environmental Power, LLC	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
Noble Environmental Power, LLC	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Noble		Noble		Noble					
Environmental		Chateaugay	Noble Chateaugay	Chateaugay					
Power, LLC	ER08-578	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5
Noble		Noble	Noble	Noble					
Environmental		Wethersfield	Wethersfield	Wethersfield			**************************************	27/1	10.0
Power, LLC	ER08-579	Windpark	Windpark, LLC**	Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Jersey-Atlantic Wind	Jersey-Atlantic Wind, LLC**	Atlantic City Electric Company	N/A	РЈМ	Northeast	2006	7.5
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Wind Park Bear Creek	Wind Park Bear Creek, LLC**	PPL Energy Plus, LLC	N/A	РЈМ	Northeast	2006	24
JPM Capital Corporation/ FC Energy Finance I, Inc	ER02-2310	Crescent Ridge	Crescent Ridge	N/A	N/A	РЈМ	Northeast	2005	51
JPM Capital Corporation/ FC Energy Finance I, Inc	ER05-1262	Flat Rock Windpower	Flat Rock Windpower LLC**	N/A	N/A	NYIS	Northeast	12/2005 (Phase I - 198 MW); 6/2006 (Phase II – 33 MW)	231
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1093	Flat Rock Windpower II	Flat Rock Windpower II LLC**	New York Power Authority	N/A	NYIS	Northeast	2006	90.75
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1335	Evergreen Wind	Evergreen Wind Power, LLC**	New Brunswick Power Generation Corporation	N/A	NBPC	Northeast	2007	42

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
JPM Capital Corporation/ FC Energy Finance I, Inc	ER06-1122	High Trail Wind Farm	High Trail Wind Farm, LLC**	N/A	N/A	РЈМ	Northeast	2007	198
JPM Capital Corporation/ FC Energy Finance I, Inc	N/A (QF)	Madison Windpower	Madison Windpower LLC**	New York Power Authority	N/A	NYIS	Northeast	2000	11.55
JPM Capital Corporation/ FC Energy Finance I, Inc JPM Capital Corporation/ FC Energy Finance I,	ER07-1199 ER09-429	Munnsville Wind Farm Sheldon Energy LLC	Munnsville Wind Farm, LLC** Sheldon Energy LLC**	Coral Energy Sheldon Energy LLC	N/A N/A	NYIS NYIS	Northeast Northeast	2007 2009	34.5 112.5
Inc JPM Capital Corporation/ FC Energy Finance I, Inc	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.; Inc.	N/A	ISO-NE	Northeast	2011	40
JPM Capital Corporation	ER11-113	Sandy Ridge Facility	Sandy Ridge Wind, LLC**	Algonquin Power Fund (America) Inc.	N/A	РЈМ	Northeast	2011	50
J.P. Morgan Investment Management Inc.	ER12-1562	AES Somerset Facility	Somerset Cayuga Holding Company, Inc.**	Somerset Operating Company, LLC	N/A	NYISO	Northeast	1984	678

						Lo	cation		Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
J.P. Morgan Investment Management Inc.	ER12-1563	AES Cayuga Facility	Somerset Cayuga Holding Company, Inc.**	Cayuga Operating Company, LLC	N/A	NYISO	Northeast	1955	313
JPMorgan Capital Corporation	ER12-1228	Majestic II Project	High Majestic II Wind Properties, LLC**	High Majestic II Holdings, LLC	N/A	SPS	SPP	2012	79.6
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184

						Lo	cation		Summer Rating (MW)
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	PJM	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

[^] Indicates affiliated power marketers.

^{*} Excludes interests in generation in region of Electric Reliability Council of Texas.

^{**} Indicates that ownership interest is a passive non-controlling and non-managing interest.

^{***} Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name and use	Owned by	Controlled by	Date control transferred	Loc	cation	Size
			2,		Balancing authority area	Geographic region (per Appendix D)	
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

JPMorgan Chase & Co. Energy Affiliates (as defined in 18 C.F.R. § 35.36(a)(9))

MARKET-BASED RATE AUTHORITY AND GENERATION ASSETS

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
J.P. Morgan Ventures Energy Corporation ^	ER05-1232	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Ventures Energy Corporation^	ER09-335	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
J.P. Morgan Commodities Canada Corporation^	ER09-1141	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Noble Environmental Power, LLC	ER06-1413	Noble Clinton Windpark I	Noble Clinton Windpark I, LLC**	Noble Clinton Windpark I, LLC	N/A	NYIS	Northeast	2008	100.5
Noble Environmental Power, LLC	ER06-1408	Noble Ellenburg Windpark	Noble Ellenburg Windpark, LLC**	Noble Ellenburg Windpark, LLC	N/A	NYIS	Northeast	2008	81
Noble Environmental Power, LLC	ER06-1407	Noble Bliss Windpark	Noble Bliss Windpark, LLC**	Noble Bliss Windpark, LLC	N/A	NYIS	Northeast	2008	100.5
Noble Environmental Power, LLC	ER06-1409	Noble Altona Windpark	Noble Altona Windpark, LLC**	Noble Altona Windpark, LLC	N/A	NYIS	Northeast	N/A	102
Noble Environmental Power, LLC	ER08-577	Noble Bellmont Windpark	Noble Bellmont Windpark, LLC**	Noble Bellmont Windpark, LLC	N/A	NYIS	Northeast	N/A	21

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Noble Environmental Power, LLC	ER08-578	Noble Chateaugay Windpark	Noble Chateaugay Windpark, LLC**	Noble Chateaugay Windpark, LLC	N/A	NYIS	Northeast	N/A	106.5
Noble Environmental Power, LLC	ER08-579	Noble Wethersfield Windpark	Noble Wethersfield Windpark, LLC**	Noble Wethersfield Windpark, LLC	N/A	NYIS	Northeast	N/A	126
JPM Capital Corporation	ER11-4029	Sheffield Project	Vermont Wind, LLC**	Burlington Electric Department; Vermont Electric Cooperative, Inc.; and Washington Electric Cooperative, Inc.	N/A	ISO-NE	Northeast	2011	40
JPM Capital Corporation	ER11-113	Sandy Ridge Facility	Sandy Ridge Wind, LLC**	Algonquin Power Fund (America) Inc.	N/A	РЈМ	Northeast	2011	50
J.P. Morgan Investment Management Inc.	ER12-1562	AES Somerset Facility	Somerset Cayuga Holding Company, Inc.**	Somerset Operating Company, LLC	N/A	NYISO	Northeast	1984	678
J.P. Morgan Investment Management Inc.	ER12-1563	AES Cayuga Facility	Somerset Cayuga Holding Company, Inc.**	Cayuga Operating Company, LLC	N/A	NYISO	Northeast	1955	313
JPM Capital Corporation	ER12-1228	Majestic II Project	High Majestic II Wind Properties, LLC**	High Majestic II Holdings, LLC	N/A	SPS	Southwest	2012	79.6
JPM Capital Corporation	ER12-1680	Minonk Facility	Minonk Wind, LLC**	Algonquin Power Fund (America) Inc.	N/A	РЈМ	Northeast	2012	200

						Lei	eation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
Central Power & Lime, LLC^	ER09-609	Central Power & Lime	Central Power & Lime, LLC	Central Power & Lime, LLC	N/A	FPC	Southeast	1988	139
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Colquitt	Colquitt EMC	J.P. Morgan Ventures Energy Corporation	N/A	SOCO	Southeast	N/A	376.2 (total with Satilla EMC)
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Satilla	Satilla EMC	J.P. Morgan Ventures Energy Corporation	N/A	soco	Southeast	N/A	See above
Utility Contract Funding, L.L.C.^	ER02-2102	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes I, L.L.C.^	ER00-2885	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Cedar Brakes II, L.L.C.^	ER01-2765	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Ironwood LLC^	ER07-1116	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Allegheny LLC^	ER07-1112	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Triton Power Michigan LLC ^	ER02-1437	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE CA LLC^	ER07-1113	Alamitos 1	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1956	184
BE CA LLC^	ER07-1113	Alamitos 2	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1957	184
BE CA LLC^	ER07-1113	Alamitos 3	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1961	336
BE CA LLC^	ER07-1113	Alamitos 4	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1962	336

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE CA LLC^	ER07-1113	Alamitos 5	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1969	504
BE CA LLC^	ER07-1113	Alamitos 6	AES Alamitos, LLC	BE CA LLC	N/A	CISO	Southwest	1966	504
BE CA LLC^	ER07-1113	Huntington Beach 1	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
BE CA LLC^	ER07-1113	Huntington Beach 2	AES Huntington Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1958	225.8
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Panda- Brandywine, L.P.	Panda- Brandywine, L.P.	J.P. Morgan Ventures Energy Corporation	N/A	РЈМ	Northeast	1996	230
J.P. Morgan Ventures Energy Corporation^	ER05-1232	Grays Harbor Energy LLC	Grays Harbor Energy LLC	J.P. Morgan Ventures Energy Corporation	N/A	BPA	Northwest	2008	480
BE CA LLC^	ER07-1113	Redondo Beach 5	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1954	183.8
BE CA LLC^	ER07-1113	Redondo Beach 6	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1957	183.8
BE CA LLC^	ER07-1113	Redondo Beach	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE CA LLC^	ER07-1113	Redondo Beach 8	AES Redondo Beach, LLC	BE CA LLC	N/A	CISO	Southwest	1967	504
BE KJ LLC^	ER07-1117	Kinder-Jackson	Jackson Preferred Holdings LP	BE KJ LLC	N/A	MISO	Central	2002	545
BE Louisiana LLC^	ER07-1358	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

						Lo	cation		
Filing Entity and its Energy Affiliates*	Docket No. where MBR Authority was Granted	Generation Name	Owned By	Controlled By***	Date Control Transferred***	Balancing Authority Area	Geographic Region (per Appendix D)	In-Service Date	Summer Rating (MW)
BE Rayle LLC^	ER07-1118	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
BE Alabama LLC^	ER07-1356	Tenaska Lindsay Hill	Tenaska Alabama Partners LP	BE Alabama LLC	N/A	SOCO	Southeast	1971-2000	844
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29
N/A	N/A (QF)	OLS Chino	OLS Energy Chino (30% owned)	OLS Energy Chino	N/A	CISO	Southwest	1987	29

- ^ Indicates affiliated power marketers.
- * Excludes interests in generation in region of Electric Reliability Council of Texas.
- ** Indicates that ownership interest is a passive non-controlling and non-managing interest.
- *** Where long-term off take agreements are listed, these are believed to have been in place as of the in-service date.

Electric Transmission Assets and/or Natural Gas Intrastate Pipelines and/or Gas Storage Facilities

Filing entity and its energy affiliates	Asset name	Owned by	Controlled by	Date control transferred	Loc	cation	Size
unmates					Balancing authority area	Geographic region (per Appendix D)	
JPMorgan Chase & Co.	N/A	N/A	N/A	N/A	N/A	N/A	N/A

APPENDIX F

California Independent System Operator Corporation and Calbear Energy LP

Scheduling Coordinator Agreement



CALIFORNIA INDEPENDENT SYSTEM OPERATOR

AND

CALBEAR ENERGY LP

SCHEDULING COORDINATOR AGREEMENT

Scheduling Coordinator Agreement

THIS AGREEMENT is made this 10 th day of MARCH, 2006 and is entered into, by and between:

(1) CalBear Energy LP having a registered or principal executive office at 717 Texas Avenue, Suite 1000, Houston, Texas 77002 (the "Scheduling Coordinator")

and

(2) California Independent System Operator Corporation, a California nonprofit public benefit corporation having a principal executive office located at such place in the State of California as the ISO Governing Board may from time to time designate (the "ISO").

Whereas:

- A. The Scheduling Coordinator has applied for certification by the ISO under the certification procedure referred to in Section 2.2.3 of the ISO Tariff.
- B. The Scheduling Coordinator wishes to schedule Energy and Ancillary Services on the ISO Controlled Grid under the terms and conditions set forth in the ISO Tariff.

NOW IT IS HEREBY AGREED as follows:

1. Definitions

- A. Terms and expressions used in this Agreement shall have the same meanings as those contained in the Master Definitions Supplement to the ISO Tariff.
- B. The "ISO Tariff" shall mean the ISO Operating Agreement and Tariff as amended from time to time, together with any Appendices or attachments thereto.

2. Covenant of the Scheduling Coordinator

The Scheduling Coordinator agrees that:

A. the ISO Tariff governs all aspects of scheduling of Energy and Ancillary Services on the ISO Controlled Grid, including (without limitation), the financial and technical criteria for Scheduling Coordinators, bidding, settlement, information reporting requirements and confidentiality restrictions;

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- В. it will abide by, and will perform all of the obligations under the ISO Tariff placed on Scheduling Coordinators in respect of all matters set forth therein including, without limitation, all matters relating to the scheduling of Energy and Ancillary Services on the ISO Controlled Grid, ongoing obligations in respect of scheduling, Settlement, system security policy and procedures to be developed by the ISO from time to time, billing and payments, confidentiality and dispute resolution;
- it shall ensure that each UDC, over whose Distribution System Energy or C. Ancillary Services are to be transmitted in accordance with Schedules, Adjustment Bids or bids for Ancillary Services submitted to the ISO by the Scheduling Coordinator, enters into a UDC operating agreement in accordance with Section 4 of the ISO Tariff:
- it shall ensure that each Generator for which it schedules Energy or on D. whose behalf it submits to the ISO Adjustment Bids or bids for Ancillary Services enters in to a Generator agreement in accordance with Section 5 of the ISO Tariff:
- E. it shall have the primary responsibility to the ISO, as principal, for all Scheduling Coordinator payment obligations under the ISO Tariff:
- F. its status as a Scheduling Coordinator is at all times subject to the ISO Tariff.

3. **Term and Termination**

- This Agreement shall commence on the date the Scheduling Coordinator is certified by the ISO as a Scheduling Coordinator.
- This Agreement shall terminate upon acceptance by FERC of a notice of termination. The ISO shall timely file any notice of termination with FERC.

4. **Assignment**

Either party may assign its obligations under this Agreement with the other party's consent, such consent shall not to be unreasonably withheld.

5. **Partial Invalidity**

If any provision of this Agreement, or the application of such provision to any persons, circumstance or transaction, shall be held invalid, the remainder of this Agreement, or the application of such provision to other persons or circumstances or transactions, shall not be affected thereby.

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6. Settlement Account

The Scheduling Coordinator shall maintain at all times an account with a bank capable of Fed-Wire Transfer to which credits or debits shall be made in accordance with the billing and Settlement provisions of Section 11 of the ISO Tariff. Such account shall be the account referred to in Clause 7 hereof or as notified by the Scheduling Coordinator to the ISO from time to time by giving at least 7 days written notice before the new account becomes operational.

7. Notices

Any notice, demand or request made to or by either party regarding this Agreement shall be made in accordance with the ISO Tariff and unless otherwise stated or agreed shall be made to the representative of the other party indicated below.

ISO:

Name of Primary Representative: Michael D. Dozier

Name of Alternative Representative: Philip D. Pettingill

Address: 151 Blue Ravine Road

Folsom

State: CA

Zip Code: 95630

E-Mail Address: mdozier@caiso.com

Phone No: (916) 608-5708

Fax No:

(916) 608-7292

Scheduling Coordinator: CalBear Energy LP

Name of Primary Representative: Alan Padgett

Calpine Merchant Services Company, Inc.

As agent for CalBear Energy LP

Name of Alternative Representative: JoAnn Russell

Address: 717 Texas Avenue, Suite 1000

Houston

State: TX

Zip Code: 77002

E-Mail Address: apadgett@calpine.com

Phone No: (713) 570-4800

Fax No:

(713) 830-8902

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Settlement Account No: For the account of: Bear Stearns Securities Corp

A/C #: 0925-3186

Sub-Account #: 102-32898-10 Attention: CalBear Energy

Title:

Sort Code: 021-0000-89

Bank:

Citibank, NA

8. Agreement to be bound by ISO Tariff

The ISO Tariff is incorporated herein and made a part hereof. In the event of a conflict between the terms and conditions of this Agreement and any other terms and conditions set forth in the ISO Tariff, the terms and conditions of the ISO Tariff shall prevail.

9. Electronic Contracting

All submitted applications, schedules, bids, confirmations, changes to information on file with the ISO and other communications conducted via electronic transfer (e.g. direct computer link, FTP file transfer, bulletin board, e-mail, facsimile or any other means established by the ISO) shall have the same legal rights, responsibilities, obligations and other implications as set forth in the terms and conditions of the ISO Tariff as if executed in written format.

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IN WITNESS WHEREOF, the Parties have caused this Agreement to be executed by their respective authorized officials.

California Independent System Operator Corporation:
By:
Name: DAMES W DETMERS
Title: / If OPERATIONS
Date: 3/10/6/6
CalBear Energy LP:
By: John J. Mussell
Name: 50 Ann P. Russell
Title: Managing Director
Oato:

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APPENDIX G

California Independent System Operator Corporation and AES Huntington Beach LLC

Participating Generator Agreement

CALIFORNIA INDEPENDENT SYSTEM OPERATOR CORPORATION

AND

AES HUNTINGTON BEACH, L.L.C.

PARTICIPATING GENERATOR AGREEMENT



PARTICIPATING GENERATOR AGREEMENT (PGA)

THIS AGREEMENT is dated this 31st day of March, 2009 and is entered into, by and between:

(1) AES Huntington Beach, L.L.C. having its registered and principal place of business located at 21730 Newland Street, Huntington Beach, California 92646 (the "Participating Generator");

and

(2) California Independent System Operator Corporation, a California nonprofit public benefit corporation having a principal executive office located at such place in the State of California as the CAISO Governing Board may from time to time designate, currently 250 Outcropping Way, Folsom, California 95630 (the "CAISO").

The Participating Generator and the CAISO are hereinafter referred to as the "Parties".

Whereas:

- A. The CAISO Tariff provides that the CAISO shall not accept Bids for Energy or Ancillary Services generated by any Generating Unit interconnected to the CAISO Controlled Grid, or to the Distribution System of a Participating TO or of a UDC otherwise than through a Scheduling Coordinator.
- B. The CAISO Tariff further provides that the CAISO shall not be obliged to accept Bids relating to Generation from any Generating Unit interconnected to the CAISO Controlled Grid unless the relevant Generator undertakes in writing to the CAISO to comply with all applicable provisions of the CAISO Tariff.
- C. The Participating Generator wishes to be able to submit Bids to the CAISO through a Scheduling Coordinator and, therefore, wishes to undertake to the CAISO that it will comply with the applicable provisions of the CAISO Tariff.
- **D.** The Parties are entering into this Agreement in order to establish the terms and conditions on which the CAISO and the Participating Generator will discharge their respective duties and responsibilities under the CAISO Tariff.

NOW THEREFORE, in consideration of the mutual covenants set forth herein, **THE PARTIES AGREE** as follows:



ARTICLE I

DEFINITIONS AND INTERPRETATION

- 1.1 Master Definitions Supplement. All terms and expressions used in this Agreement shall have the same meaning as those contained in the Master Definitions Supplement to the CAISO Tariff.
- **1.2** Rules of Interpretation. The following rules of interpretation and conventions shall apply to this Agreement:
 - (a) if there is any inconsistency between this Agreement and the CAISO Tariff, the CAISO Tariff will prevail to the extent of the inconsistency;
 - (b) the singular shall include the plural and vice versa;
 - (c) the masculine shall include the feminine and neutral and vice versa;
 - (d) "includes" or "including" shall mean "including without limitation";
 - (e) references to a Section, Article or Schedule shall mean a Section, Article or a Schedule of this Agreement, as the case may be, unless the context otherwise requires;
 - (f) a reference to a given agreement or instrument shall be a reference to that agreement or instrument as modified, amended, supplemented or restated through the date as of which such reference is made;
 - (g) unless the context otherwise requires, references to any law shall be deemed references to such law as it may be amended, replaced or restated from time to time;
 - (h) unless the context otherwise requires, any reference to a "person" includes any individual, partnership, firm, company, corporation, joint venture, trust, association, organization or other entity, in each case whether or not having separate legal personality;
 - (i) unless the context otherwise requires, any reference to a Party includes a reference to its permitted successors and assigns;
 - (j) any reference to a day, week, month or year is to a calendar day, week, month or year; and
 - (k) the captions and headings in this Agreement are inserted solely to facilitate reference and shall have no bearing upon the interpretation of any of the terms and conditions of this Agreement.



ARTICLE II

ACKNOWLEDGEMENTS OF PARTICIPATING GENERATOR AND CAISO

- 2.1 CAISO Responsibility. The Parties acknowledge that the CAISO is responsible for the efficient use and reliable operation of the CAISO Controlled Grid consistent with achievement of planning and Operating Reserve criteria no less stringent than those established by the Western Electricity Coordinating Council and the North American Electric Reliability Corporation and further acknowledges that the CAISO may not be able to satisfy fully these responsibilities if the Participating Generator fails to fully comply with all of its obligations under this Agreement and the CAISO Tariff.
- 2.2 Scope of Application to Parties. The Participating Generator and CAISO acknowledge that all Generators, except those specified in Section 2.2.1 of this Agreement, wishing to submit Bids to the CAISO through a Scheduling Coordinator must sign this Agreement in accordance with Section 4.6 of the CAISO Tariff.
- 2.2.1 Exemption for Certain Generators. The Generator with an existing power purchase agreement with a UDC is not required to sign a Participating Generator Agreement if: (a) the Generator sells all of its Energy (excluding any Energy consumed by auxiliary Load equipment electrically connected to that Generator's Generating Unit at the same point) and Ancillary Services to the UDC; (b) the Generator sells any Energy through "over the fence" arrangements as authorized under Section 218(b) of the California Public Utilities Code; or (c) the Generator employs landfill gas technology for the generation of electricity as authorized under 218(c) of the California Public Utilities Code. With respect to subsections (a) and (b), an existing power purchase agreement shall mean an agreement which has been entered into and is effective as of December 20, 1995. With respect to subsection (c), an existing power purchase agreement shall mean an agreement which has been entered into and is effective as of December 31, 1996.



ARTICLE III

TERM AND TERMINATION

3.1 Effective Date. This Agreement shall be effective as of the later of the date it is executed by the Parties or the date accepted for filing and made effective by FERC, if such FERC filing is required, and shall remain in full force and effect until terminated pursuant to Section 3.2 of this Agreement.

3.2 Termination

- **3.2.1 Termination by CAISO.** Subject to Section 5.2, the CAISO may terminate this Agreement by giving written notice of termination in the event that the Participating Generator commits any material default under this Agreement and/or the CAISO Tariff which, if capable of being remedied, is not remedied within thirty (30) days after the CAISO has given, to the Participating Generator, written notice of the default, unless excused by reason of Uncontrollable Forces in accordance with Article X of this Agreement. With respect to any notice of termination given pursuant to this Section, the CAISO must file a timely notice of termination with FERC, if this Agreement was filed with FERC, or must otherwise comply with the requirements of FERC Order No. 2001 and related FERC orders. The filing of the notice of termination by the CAISO with FERC will be considered timely if: (1) the filing of the notice of termination is made after the preconditions for termination have been met, and the CAISO files the notice of termination within sixty (60) days after issuance of the notice of default; or (2) the CAISO files the notice of termination in accordance with the requirements of FERC Order No. 2001. This Agreement shall terminate upon acceptance by FERC of such a notice of termination, if filed with FERC, or thirty (30) days after the date of the CAISO's notice of default, if terminated in accordance with the requirements of FERC Order No. 2001 and related FERC orders.
- 3.2.2 Termination by Participating Generator. In the event that the Participating Generator no longer wishes to submit Bids and transmit Energy over the CAISO Controlled Grid, it may terminate this Agreement, on giving the CAISO not less than ninety (90) days written notice, provided, however, that in accordance with Section 4.1.3, the Participating Generator may modify Schedule 1 to eliminate Generating Units which it no longer owns or no longer has contractual entitlement to and such modification shall be effective upon receipt by the CAISO. With respect to any notice of termination given pursuant to this Section, the CAISO must file a timely notice of termination with FERC, if this Agreement has been filed with FERC, or must otherwise comply with the requirements of FERC Order No. 2001 and related FERC orders. The filing of the notice of termination by the CAISO with FERC will be considered timely if: (1) the request to file a notice of termination is made after the preconditions for termination have been met, and the CAISO files the notice of termination within



thirty (30) days of receipt of such request; or (2) the CAISO files the notice of termination in accordance with the requirements of FERC Order No. 2001. This Agreement shall terminate upon acceptance by FERC of such a notice of termination, if such notice is required to be filed with FERC, or upon ninety (90) days after the CAISO's receipt of the Participating Generator's notice of termination, if terminated in accordance with the requirements of FERC Order No. 2001 and related FERC orders.

ARTICLE IV

GENERAL TERMS AND CONDITIONS

- 4.1 Generating Units
- **4.1.1 Identification of Generating Units.** The Participating Generator has identified the Generating Units that it owns, operates or has a contractual entitlement to in Schedule 1, as required by Section 4.6.4 of the CAISO Tariff.
- **4.1.2 Technical Characteristics.** The Participating Generator has provided to the CAISO in Schedule 1 the required information regarding the capacity and operating characteristics of each of the Generating Units listed in that schedule. Pursuant to Sections 8.9 and 8.10 of the CAISO Tariff, the CAISO may verify, inspect and test the capacity and operating characteristics provided in Schedule 1.
- 4.1.3 Notification of Changes. Sixty (60) days prior to changing any technical information in Schedule 1, the Participating Generator shall notify the CAISO of the proposed changes. Pursuant to Sections 8.9 and 8.10 of the CAISO Tariff. the CAISO may verify, inspect and test the capacity and operating characteristics provided in the revised Schedule 1. The CAISO shall post on the CAISO Website a schedule showing, for at least one year in advance: (i) the proposed dates on which the CAISO's Master File will be updated, which dates shall occur at least every three months; (ii) the dates on which the information contained in the revised Master File will become effective; and (iii) the deadlines by which changed technical information must be submitted to the CAISO in order to be tested and included in the next scheduled update of the CAISO's Master File. Unless the Participating Generator fails to test at the values in the proposed change(s), the change will become effective upon the effective date for the next scheduled update of the Master File, provided the Participating Generator submits the changed information by the applicable deadline and is tested by the deadline. Subject to such notification this Agreement shall not apply to any generating unit identified in Schedule 1 which the Participating Generator no longer owns or no longer has contractual entitlement to.



- **4.2** Agreement Subject to CAISO Tariff. The Parties will comply with all applicable provisions of the CAISO Tariff. This Agreement shall be subject to the CAISO Tariff which shall be deemed to be incorporated herein.
- 4.3 Obligations Relating to Ancillary Services
- 4.3.1 Submission of Bids. When the Scheduling Coordinator on behalf of the Participating Generator submits a Bid, the Participating Generator will, by the operation of this Section 4.3.1, warrant to the CAISO that it has the capability to provide that service in accordance with the CAISO Tariff and that it will comply with CAISO Dispatch Instructions for the provision of the service in accordance with the CAISO Tariff.
- **4.3.2 Certification.** The Participating Generator shall not use a Scheduling Coordinator to submit a Bid for the provision of an Ancillary Service or submit a Submission to Self-Provide an Ancillary Service unless the Scheduling Coordinator serving that Participating Generator is in possession of a current certificate pursuant to Sections 8.3.4 and 8.4 of the CAISO Tariff.
- 4.4 Obligations relating to Major Incidents
- **4.4.1 Major Incident Reports.** The Participating Generator shall promptly provide such information as the CAISO may reasonably request in relation to major incidents, in accordance with Section 4.6.7.3 of the CAISO Tariff.

ARTICLE V

PENALTIES AND SANCTIONS

- Penalties. If the Participating Generator fails to comply with any provisions of this Agreement, the CAISO 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 or CAISO Tariff provision 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 the CAISO ADR Procedures, shall be construed as waiving the rights of the Participating Generator to oppose or protest any penalty proposed by the CAISO to the FERC or the specific imposition by the CAISO 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 the CAISO Tariff, the CAISO shall be permitted to take any of the measures, contained or referenced in the CAISO Tariff, which the CAISO deems to be necessary to correct the situation.



ARTICLE VI

COSTS

Operating and Maintenance Costs. The Participating Generator shall be responsible for all its costs incurred in connection with operating and maintaining the Generating Units identified in Schedule 1 for the purpose of meeting its obligations under this Agreement.

ARTICLE VII

DISPUTE RESOLUTION

7.1 Dispute Resolution. The Parties shall make reasonable efforts to settle all disputes arising out of or in connection with this Agreement. In the event any dispute is not settled, the Parties shall adhere to the CAISO ADR Procedures set forth in Section 13 of the CAISO Tariff, which is incorporated by reference, except that any reference in Section 13 of the CAISO Tariff to Market Participants shall be read as a reference to the Participating Generator and references to the CAISO Tariff shall be read as references to this Agreement.

ARTICLE VIII

REPRESENTATIONS AND WARRANTIES

- **8.1** Representation and Warranties. Each Party represents and warrants that the execution, delivery and performance of this Agreement by it has been duly authorized by all necessary corporate and/or governmental actions, to the extent authorized by law.
- **8.2 Necessary Approvals.** The Participating Generator represents that all necessary leases, approvals, permits, licenses, easements, rights of way or access to install, own and/or operate its Generating Units have been or will be obtained by the Participating Generator prior to the effective date of this Agreement.



ARTICLE IX

LIABILITY

9.1 Liability. The provisions of Section 14 of the CAISO Tariff will apply to liability arising under this Agreement, except that all references in Section 14 of the CAISO Tariff to Market Participants shall be read as references to the Participating Generator and references to the CAISO Tariff shall be read as references to this Agreement.

ARTICLE X

UNCONTROLLABLE FORCES

10.1 Uncontrollable Forces Tariff Provisions. Section 14.1 of the CAISO Tariff shall be incorporated by reference into this Agreement except that all references in Section 14.1 of the CAISO Tariff to Market Participants shall be read as a reference to the Participating Generator and references to the CAISO Tariff shall be read as references to this Agreement.

ARTICLE XI

MISCELLANEOUS

- 11.1 Assignments. Either Party may assign or transfer any or all of its rights and/or obligations under this Agreement with the other Party's prior written consent in accordance with Section 22.2 of the CAISO Tariff. Such consent shall not be unreasonably withheld. Any such transfer or assignment shall be conditioned upon the successor in interest accepting the rights and/or obligations under this Agreement as if said successor in interest was an original Party to this Agreement.
- 11.2 Notices. Any notice, demand or request which may be given to or made upon either Party regarding this Agreement shall be made in accordance with Section 22.4 of the CAISO Tariff, provided that all references in Section 22.4 of the CAISO Tariff to Market Participants shall be read as a reference to the Participating Generator and references to the CAISO Tariff shall be read as references to this Agreement, and unless otherwise stated or agreed shall be made to the representative of the other Party indicated in Schedule 3. A Party must update the information in Schedule 3 of this Agreement as information changes. Such changes shall not constitute an amendment to this Agreement.



- 11.3 Waivers. Any waiver at any time by either Party of its rights with respect to any default under this Agreement, or with respect to any other matter arising in connection with this Agreement, shall not constitute or be deemed a waiver with respect to any subsequent default or other matter arising in connection with this Agreement. Any delay, short of the statutory period of limitations, in asserting or enforcing any right under this Agreement shall not constitute or be deemed a waiver of such right.
- 11.4 Governing Law and Forum. This Agreement shall be deemed to be a contract made under, and for all purposes shall be governed by and construed in accordance with, the laws of the State of California, except its conflict of law provisions. The Parties irrevocably consent that any legal action or proceeding arising under or relating to this Agreement to which the CAISO ADR Procedures do not apply, shall be brought in any of the following forums, as appropriate: any court of the State of California, any federal court of the United States of America located in the State of California, or, where subject to its jurisdiction, before the Federal Energy Regulatory Commission.
- 11.5 Consistency with Federal Laws and Regulations. This Agreement shall incorporate by reference Section 22.9 of the CAISO Tariff as if the references to the CAISO Tariff were referring to this Agreement.
- **11.6 Merger.** This Agreement constitutes the complete and final agreement of the Parties with respect to the subject matter hereof and supersedes all prior agreements, whether written or oral, with respect to such subject matter.
- 11.7 Severability. If any term, covenant, or condition of this Agreement or the application or effect of any such term, covenant, or condition is held invalid as to any person, entity, or circumstance, or is determined to be unjust, unreasonable, unlawful, imprudent, or otherwise not in the public interest by any court or government agency of competent jurisdiction, then such term, covenant, or condition shall remain in force and effect to the maximum extent permitted by law, and all other terms, covenants, and conditions of this Agreement and their application shall not be affected thereby, but shall remain in force and effect and the Parties shall be relieved of their obligations only to the extent necessary to eliminate such regulatory or other determination unless a court or governmental agency of competent jurisdiction holds that such provisions are not separable from all other provisions of this Agreement.

11.8 [NOT USED]

11.9 Amendments. This Agreement and the Schedules attached hereto may be amended from time to time by the mutual agreement of the Parties in writing. Amendments that require FERC approval shall not take effect until FERC has accepted such amendments for filing and made them effective. Nothing contained herein shall be construed as affecting in any way the right of the



CAISO to unilaterally make application to FERC for a change in the rates, terms and conditions of this Agreement under Section 205 of the FPA and pursuant to FERC's rules and regulations promulgated thereunder, and the Participating Generator shall have the right to make a unilateral filing with FERC to modify this Agreement pursuant to Section 206 or any other applicable provision of the FPA and FERC's rules and regulations thereunder; provided that each Party shall have the right to protest any such filing by the other Party and to participate fully in any proceeding before FERC in which such modifications may be considered. Nothing in this Agreement shall limit the rights of the Parties or of FERC under Sections 205 or 206 of the FPA and FERC's rules and regulations thereunder, except to the extent that the Parties otherwise mutually agree as provided herein.

11.10 Counterparts. This Agreement may be executed in one or more counterparts at different times, each of which shall be regarded as an original and all of which, taken together, shall constitute one and the same Agreement.

IN WITNESS WHEREOF, the Parties hereto have caused this Agreement to be duly executed on behalf of each by and through their authorized representatives as of the date hereinabove written.

California Independent System Operator Corporation

1

Ву:	(4163P)	
· Name: Title:	Steve Berberich Vice President & Chief Operating Officer	(B)
Date:	March 31, 2011	
AES H By:	untington Beach, L.L.C.	
	WEIKKO WRZA	
Title: /	AES HUNTINGTON BEACH PLANT.	MANAGER
Date:	03/30/2011	

Section 1: Technical Characteristics of Participating Generator Units AES Hungtington Beach, L.L.C.

1/ Current effective values for purposes of submitting Self-Schedules and Bids for Energy and/or Ancillary Services in the CAISO Markets may differ from those set forth in this Schedule 1, depending on the results of CAISO performance testing pursuant to Sections 8.9, 8.10 and Appendix K. Ancillary Services Requirements Protocol of the CAISO Tariff. This and other values are subject to certification by the CAISO in accordance with Section 4.3.2 of the Participating Generating Unit operating data must be provided at a time and in a format specified by the CAISO in response to CAISO requests pursuant to CAISO Tariff Sections 4.6.4 and

Section 2: Limitations AES Huntington Beach, L.L.C.

1 The ramp rate from 20N 3 Unit can be ramped from 4 Unit can be ramped from 5 Neither HB1 or HB2 can 20 MW for at least one 1 hour. 7 If either Unit 3 or Unit 3, If either Unit 3 and 4 thour. 8 If Unit 1, Unit 2, Unit 3, Begin; and Unit 3 and Unit is required to startul if Unit 3 and Unit 4 are 1 If Unit 3 and Unit 4 are 1 If Unit 4 are 1 If Unit 4 are 1 If Unit 5 and Unit 6 are 1 If Unit 6 and Unit 6 are 1 If Unit 7 and Unit 6 are 1 If Unit 7 and Unit 6 and 1 If Unit 7 and Unit 7 and Unit 6 and 1 If Unit 7 and Unit 7 and Unit 8 and Unit 8 and Unit 8 and Unit 9 a	The ramp rate from 20MW to 65MW @ 2.5MW/min, 65MW to 204MW @ 4.3MW/min, 204MW to 226MW @ 1.1MW/min Unit can be ramped from 91MW to 215MW @ 2.25MW/min, 215MW to 225MW/min, 20 MW min, 20
2 3 4 4 5 6 6 9 9	te from 20MW to 65MW @ 2.5MW/min, 65MW to 204MW @ 4.3MW/min, 204MW to 2256MW @ 1.1MW/min ramped from 91MW to 215MW @ 2.25MW/min, 215MW with the 215MW @ 2.25MW/min, 215MW/min ramped from 91MW to 215MW @ 2.25MW/min and 20 MW and 65 MW (Forbidden Range). Each time HB1 or HB2 is dispatched to 20 MW, it must remain at least one be dispatched to a load between 20 MW and 65 MW (Forbidden Range). Each time HB1 or HB2 is dispatched from 20 MW to 65 MW or greater, it must remain dispatched at 65 MW or greater for at least one Unit 2 is online and Unit 3 and Unit 4 are offline and Unit 3 or Unit 4 is required to start up, then the Unit that is online must be dispatched equal or less than ting the start up time of the Unit being required to start up. 13 or Unit 4 are offline, and Unit 3 or Unit 4 is required to start up, Unit 1 or 2 must complete start-up before Unit 3 or Unit 4 start-up can be 10 hours. Total startup time on Unit 3 or Unit 4 will be 28 hours because of Auxiliary Steam limitations. 14. Unit 3. Unit 4 are offline, and Unit 3 and Unit 4 both are required to start up, Unit 1 or 2 must complete start-up before Unit 3 or Unit 4 start-up can hit 3 and Unit 4 must have a minimum lag time for successive startups of 18 hours. Thus the total startup hours for Unit 3 or Unit 4 depending on which 10 is startup last will be 46 hours. 15 Unit 4 are required to be shut down, the shut down is needed to be staggered by the minimum of one hour between units.
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CAISO IMPOSED PENALTIES AND SANCTIONS Section 5.1

TO BE INSERTED UPON FERC APPROVAL



NOTICES

Section 11.2

Participating Generator

Name of Primary

Representative:

Weikko Wirta

Title:

Plant Manager

Company:

AES Huntington Beach, L.L.C.

Address:

21730 Newland Street

City/State/Zip Code:

Huntington Beach, CA 92646

Email Address:

Weikko.Wirta@aes.com

Phone:

(714) 374-1421

Fax No:

(714) 374-1495

Name of Alternative

Representative:

Jose Perez

Title:

Team Leader

Company:

AES Huntington Beach, L.L.C.

Address:

21730 Newland Street

City/State/Zip Code:

Huntington Beach, CA 92646

Email Address:

Jose.Perez@aes.com

Phone:

(714) 374-1411

Fax No:

(714) 374-1495



CAISO

Name of Primary

Representative:

Ms. Roni L. Reese

Title:

Sr. Contracts Analyst

Address:

250 Outcropping Way

City/State/Zip Code:

Folsom, CA 95630

Email address:

rreese@caiso.com

Phone:

(916) 608-7027

Fax:

(916) 608-7292

Name of Alternative

Representative:

Christopher J. Sibley

Title:

Lead Contract Negotiator

Address:

250 Outcropping Way

City/State/Zip Code:

Folsom, CA 95630

Email address:

csibley@caiso.com

Phone:

(916) 608-7030

Fax:

(916) 608-7292

UNITED STATES OF AMERICA FEDERAL ENERGY REGULATORY COMMISSION

California Independent System Operator Corporation,

Petitioner

Docket No. EL13-___-000

BE CA LLC

and

J.P. Morgan Ventures Energy Corporation, Respondents

v.

NOTICE OF PETITION FOR DECALARATORY ORDER AND REQUEST FOR EXPEDITED TREATMENT

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Take notice that on November _____, 2012, the California Independent System Operator Corporation ("Petitioner" or "ISO") filed a Petition for Declaratory Order and Request for Expedited Treatment ("Petition") against BE CA LLC and J.P. Morgan Ventures Energy Corporation ("Respondents") pursuant to Rules 207(a)(2) and 212 of the Federal Energy Regulatory Commission's ("Commission") Rules of Practice and Procedure (18 C.F.R. §§ 207(a)(2) and 212), requesting that the Commission declare that BE CA LLC and J.P. Morgan Ventures Energy Corporation (collectively, "J.P. Morgan") are parties to this proceeding pursuant to Rules 102(c)(2) and (f)(3) of the Commission's Rules of Practice and Procedure, shorten the time for responses to this request so that such submissions are due by November 29, 2012, that in the event no answers in opposition to the Petition are filed that the Commission determine the Petition is unopposed and grant the relief requested, that the Commission designate a Settlement Judge in its notice of this filing who is directed to convene a settlement conference not later than December 4, 2012 if any answer or protest disputing this petition is filed, and that the Commission issue a declaratory order to enforce the ISO's authority and rights under its tariff to obtain reliability services under a Reliability Must-Run agreement with AES Huntington Beach LLC and to determine consent to the conversion of Huntington Beach Generators Units 3 and 4 to synchronous condenser operations by J.P. Morgan is not required under contracts between AES Huntington Beach LLC and J.P. Morgan.

The Commission has determined that BE CA LLC and J.P. Morgan Ventures Energy Corporation are parties to this proceeding within the meaning of Rules 102(c)(2) and (f)(3)of the Commission's Rules of Practice and Procedure. The Commission designates the Hon. ______to act as Settlement Judge in this proceeding to convene a settlement conference at the offices of the Commission at 888 First Street NE, Washington D.C. in the event that an answer in opposition to the Petition is filed not later than 10:00 a.m. December 4, 2012.

The Petitioner certifies that copies of the Petition were served on the contacts for the Respondents as listed on the Commission's list of Corporate Officials.

Any person desiring to intervene or to protest this filing must file in accordance with Rules 211 and 214 of the Commission's Rules of Practice and Procedure (18 CFR 385.211 and 385.214). Protests will be considered by the Commission in determining the appropriate action to be taken, but will not serve to make protestants parties to the proceeding. Any person wishing to become a party must file a notice of intervention or motion to intervene, as appropriate. The Respondent's answer and all interventions, or protests must be filed on or before November 29, 2012. The Respondent's answer, motions to intervene, and protests must be served on the Petitioners.

The Commission encourages electronic submission of protests and interventions in lieu of paper using the "eFiling" link at http://www.ferc.gov. Persons unable to file electronically should submit an original and 14 copies of the protest or intervention to the Federal Energy Regulatory Commission, 888 First Street, N.E., Washington, D.C. 20426.

This filing is accessible on-line at http://www.ferc.gov, using the "eLibrary" link and is available for review in the Commission's Public Reference Room in Washington, D.C. There is an "eSubscription" link on the web site that enables subscribers to receive email notification when a document is added to a subscribed docket(s). For assistance with any FERC Online service, please email FERCOnlineSupport@ferc.gov, or call (866) 208-3676 (toll free). For TTY, call (202) 502-8659.

Comment Date: 5:00 pm Eastern Time on November 27, 2012.

Magalie R. Salas Secretary

CERTIFICATE OF SERVICE

I hereby certify that in accordance with Rule 2010 of the Commission's Rules of Practice and Procedure, 18 C.F.R. § 385.2010 (2012), I have this day served by certified mail and e-mail a copy of the foregoing Petition upon:

Ike Gibbs
Executive Director – Compliance Director
& Assistant General Counsel
J.P. Morgan Global Commodities
700 Louisiana Street, Suite 1000
Houston, TX 77002

Telephone: 713-236-3322

Email: <u>ike.gibbs@jpmorgan.com</u>

Paul Tramonte Vice President, Compliance Officer J.P. Morgan Global Commodities 700 Louisiana Street, Suite 1000 Houston, TX 77002

Telephone: 713-236-3079

Email: paul.tramonte@jpmorgan.com

Both are shown as the persons upon whom service should be made for BE CA LLC and J.P. Morgan Ventures Energy Corporation, as listed on the Commission's list of Corporate Officials.

Dated at Washington, D.C. this 15th day of November 2012.

/s/

Katharine E. Leesman Van Ness Feldman LLP 1050 Thomas Jefferson Street NW Washington D.C., 20005 (202) 298-1805 kxl@vnf.com