



FILED

11-13-07
04:59 PM

**BEFORE THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF CALIFORNIA**

Order Instituting Rulemaking to Develop Additional
Methods to Implement the California Renewables
Portfolio Standard Program.

R.06-02-012
(Filed February 16, 2006)

**POST-WORKSHOP COMMENTS OF THE INDEPENDENT
ENERGY PRODUCERS ASSOCIATION ON TRADABLE
RENEWABLE ENERGY CREDITS**

INDEPENDENT ENERGY PRODUCERS
ASSOCIATION
Steven Kelly
Policy Director
1215 K Street, Suite 900
Sacramento, CA 95814
Telephone: (916) 448-9499
Facsimile: (916) 448-0182
Email: steven@iepa.com

Date: November 13, 2007

**BEFORE THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF CALIFORNIA**

Order Instituting Rulemaking to Develop Additional
Methods to Implement the California Renewables
Portfolio Standard Program.

R.06-02-012
(Filed February 16, 2006)

**POST-WORKSHOP COMMENTS OF THE INDEPENDENT
ENERGY PRODUCERS ASSOCIATION ON TRADABLE
RENEWABLE ENERGY CREDITS**

The Independent Energy Producers Association (“IEP”) is pleased to comment on the topics identified in the Ruling of Administrative Law Judge Anne Simon, issued October 16, 2007, related to Tradable Renewable Energy Credits (RECs).

The ALJ’s Ruling requesting post-workshop comments discussed a set of guiding principles and then posed a series of topic-specific questions. IEP’s comments are organized in the following manner. Provided immediately below is a response to the “proposed guiding principles.” Following these comments, provided in Attachment A, are specific responses to the Topic Specific questions posed in the ALJ’s Ruling.

I. Proposed Guiding Principles

As a general rule, the Commission should be mindful that the purpose of the tradable REC is twofold: (a) make renewable projects more commercially viable for a state that established aggressive goals on RPS development as a matter of policy (e.g.

33% by 2020) and (b) create a means by which load-serving entities (LSEs) can more readily contract with renewable developers given the realities of limited transmission infrastructure. In an environment in which transmission constraints may undermine the delivery of energy from renewable projects to the off-taker, a tradable REC provides the means to enable the development of a clean generation project providing local energy benefits where needed (e.g. southern California) while simultaneously providing environmental attributes/benefits to a regulated entity with an RPS mandate located in another region (e.g. northern California). This is a good outcome and should be encouraged.

The ALJ's Ruling presented a set of Principles for parties' comment. The Ruling asked whether parties have objections to one or more of the Principles.

1. Use of REC trading for RPS compliance should be consistent with the legislative goals for the RPS program.

IEP supports this objective.

2. REC trading should result in minimal disruption to the current RPS program.

IEP notes that since passage of the California RPS in 2001, only approximately 350 MWs of new renewables have come online over the past 6 years. That's approximately 50 MWs a year. REC trading would not, nor would it be possible to, disrupt this track record.

3. REC trading should not increase the cost of RPS compliance in the near term, and should lower the cost of RPS compliance over the longer term.

IEP does not object to this principle. While IEP does not know what "the cost of RPS compliance is today" nor does anyone know what the cost will be in the future, rational economic theory suggests that LSEs will not purchase tradable RECs for compliance purposes if tradable RECs cost more than the alternative, i.e. RPS compliance absent the use of tradable RECs.

4. REC trading should promote development of new infrastructure in California and neighboring states for renewable energy generation.

IEP strongly supports this principle. However, meeting RPS targets, whether 20% or 33%, requires maintaining the existing renewable infrastructure as well as fostering new infrastructure. Tradable RECs can and should be used to support and foster the entire renewable infrastructure needed to attain RPS goals.

5. REC trading rules, guidelines, and policies should not be inconsistent with the development of a regional REC trading regime.

IEP strongly supports this principle. However, a tradable REC program employed in California should not be delayed pending the development of a regional trading regime. California should act now and lead in this effort. If changes are required in the future to ensure better linkage with regional/national/international efforts, then those changes can and should be made at that time.

6. REC trading rules, guidelines, and policies should take account of the process of implementing California's greenhouse gas (GHG) reduction policy and the potential for federal programs for GHG reduction.

IEP does not understand the nature of this principle. We agree that, to the extent information is available today, then the REC trading rules should take account of the emerging California GHG reduction policy. However, that policy (a) will not be known fully for another 18 months, and (b) may be subject to future changes (either via the legislature or regulation). The tradable REC program need not and should not be held in abeyance pending certainty in this market. As a practical matter, while related, the two legislative mandates are different and have in a sense created different products in the marketplace.

7. REC trading rules, guidelines, and policies should meet the Commission's requirements for REC trading set out in D.03-06-071.

This area needs further analysis.

8. REC trading rules, guidelines, and policies should be simple, transparent, easily administered, uniformly applied, and equitable to all LSEs.

IEP supports this principle.

II. Specific Questions for Consideration

See Attachment A.

**ATTACHMENT A:
IEP Responses to Questions Re Tradable RECS**

B. Specific Questions for Consideration

Staff has proposed the following questions to follow up on the workshop and allow parties ample opportunity to present relevant additional information and policy recommendations. Please use the questions to inform your comments, either by responding to the questions directly, or by addressing the issues raised by the questions in a more narrative format. Please incorporate or specifically refer to materials presented at the workshop whenever you rely on material presented at the workshop or base your policy recommendations on material presented at the workshop.

1. Basics of a tradable REC market

At the September workshop, Dr. Jurgen Weiss presented an economic analysis of REC market design in California. He has prepared a summary of his analysis, attached as Attachment C. Dr. Weiss' analysis illustrates the effects of market conditions (supply and demand) in the regulated region on a REC market. A focus on California's market conditions is provided by the presentation of Sara Kamins, Energy Division staff, "[Tradable RECs for RPS Compliance: California context](#)" at:

<http://www.cpuc.ca.gov/static/energy/electric/renewableenergy/recrepresentations.htm>, which is attached as Attachment D. In responding to the following questions, please include a discussion of *specific* areas of agreement or disagreement with the analysis presented in Attachments C and D.

(1) Of the following statements from Attachment D, please agree or disagree with each, and provide justification based on specific experiences and/or economic analysis.

(a) Tradable RECs will not affect current factors limiting new renewable energy projects in California. The limiting factors include: lack of adequate transmission infrastructure, complex and lengthy permitting processes, and in-state delivery requirements for RPS-eligible generation.

The key factors limiting the development of renewable generation are (a) lack of long-term bilateral contracts, (b) absence of market design to foster merchant development, and (c) in some instances, permitting factors (lack of land, lack of financing, local opposition, etc). The blending of a long-term, bilateral contract market with a short-term, energy/RECs market will help to send the proper price signals to investors and LSEs regarding new renewable investment. Tradable RECs, as a supplement to long-term

bilateral contracting and the development of an efficient market design, can improve the environment for renewable development as the state works on the key factors limiting development of renewable generation.

The in-state delivery requirement is not a limit per se; rather it may affect the price of renewables to the extent that renewables which are not able to meet the “in-state delivery requirement” are deemed ineligible for purposes of the California RPS.

To the extent transmission is a limiting factor, RECs facilitate the maximum construction of renewable generation today while the state determines what, when, and where to build new transmission infrastructure over the next decade. RECs help to identify viable renewable transmission zones and, thus, assist in the identification and prioritization of needed investment in transmission infrastructure.

Importantly, the catalysts for new renewable development are likely to be a blend of long-term bilateral contracting and/or appropriate market price signals. While a long-term bilateral arrangement for unbundled RECs is conceivable, such a deal is not likely until underlying market fundamentals (i.e. underlying market design) is proven efficient and effective. Thus, for the near-term, tradable RECs are likely to be considered a short-term procurement strategy used to (a) fill gaps in RPS procurement and/or (b) facilitate meeting procurement obligations of smaller LSEs such as CCA.

(b) Tradable RECs will provide buyers and sellers of RPS-eligible generation with additional contracting flexibility in the near term and long term.

Agree. A tradable REC provides an additional attribute sought in the marketplace from renewable facilities. Currently, renewable facilities provide two distinguishable (i.e. unbundled) products to the marketplace: energy and capacity. If tradable RECs were permitted, then renewable facilities would have three distinguishable/unbundled products to offer to the marketplace: energy, capacity, and environmental attributes. Some consumers/LSEs may desire all three products and seek a “bundled” deal. Others, e.g. an entity sufficient in either energy or RA capacity, may only want a portion of the 3-product portfolio. Providing for tradable RECs would allow the developer to bundle and/or unbundle the commodities as sought by the LSEs. From a developer perspective, this enhanced product differentiation and market flexibility will enhance the market value of the generation facility, improve financing, and make more viable the project as a whole.

(c) Tradable RECs will facilitate RPS compliance for small LSEs, but will only marginally affect large IOUs' RPS compliance in the near term (i.e. until the 20% target is reached).

Disagree. This is not necessarily an issue that creates a large LSE vs. small LSE distinction. Tradable RECs will help any large LSE and any small LSE that is sufficient in energy and capacity, but short on RPS compliance. In addition, tradable RECs will help any large LSE and small LSE that requires additional RPS resources, yet which is located in an area that is transmission constrained vis-à-vis eligible renewable resources, irrespective of its energy/capacity load/resource balance.

(d) Given the stringent RPS targets and limited supply of surplus renewable energy in the near term (at least until the 20% target is reached), the California REC market would reflect a supply and demand imbalance.

To probability that a market imbalance arises between the supply/demand of tradable RECs exists, then this probability likely is the same in terms of an imbalance arising between supply/demand of bundled renewables. As a practical matter, because the tradable REC is an *additional* tool being made available to the LSEs, no supply/demand disruption will occur. Rather, the price of the REC will rise/lower to reflect a balance of supply/demand. If the cost of a REC is too high, demand will lower. If the cost of a REC is low, demand will increase. This will occur in parallel with the LSE's regular renewable procurement activities.

(2) What are the most likely sources of RECs that could be traded in the 2008-2011 timeframe? Please focus on RECs associated with generation that will meet the delivery requirements of Pub. Util. Code § 399.16(a)(3).

The most likely source of RECs that could be traded in the 2008-2011 timeframe will be those renewable resources not already contracted (or counted by regulators) to provide RECs to a LSE. While this may sound trite, what it really means is that the LSEs themselves will be the determinants of the availability of RECs. For example, if the IOUs choose to not re-contract with eligible renewable facilities currently operating under Standard Offer Contracts, then these facilities may have RECs available to offer to the marketplace. As a practical matter, during this relatively short timeframe, few if any purely "merchant" facilities will become operational. However, if the Commission allows for tradable RECs for RPS compliance purposes as a matter of policy, then this will send the signal to the market place to incent more generation, thereby increasing the potential for new "merchant" facilities constructed absent a contract.

Please be specific. Examples, which are meant to stimulate, not limit, comments, follow:

(a) If a response is, “generation from renewable qualifying facilities (QFs) with expiring contracts,” please make a rough quantification of how many MW of capacity, of what type of renewable generation, beginning in which year(s), would be available to provide RECs that could be traded in the 2008-2011 timeframe.

IEP does not have access to this information at this time. Only the IOUs know the rate at which their QF contracts are terminated over the next few years.

(b) If a response is, “renewable generation from neighboring states prior to commitment to those states’ RPS programs,” please make a rough quantification of how many MW of capacity of what type of renewable generation, beginning in which year(s), from what state(s), and how much of this developable capacity is already built or permitted, would be available to provide RECs that could be traded in the 2008-2011 timeframe. Also, please specify the publicly-available sources of information about potential development of such generation.

IEP does not have access to this information at this time.

(3) Please revisit the following two issues discussed in pre-workshop comments in light of the presentations and discussion at the workshop:

(a) How, if at all, would REC trading, as compared to the current firming and shaping rules for delivery of RPS-eligible power into California, provide more flexibility or be less costly for procuring out-of-state renewable energy? Please provide specific examples of situations in which REC trading would enable procurement of energy from new renewable resources located outside of California and delivering energy into California that would not otherwise be possible.

Presently, an out-of-state renewable resource must deliver its energy to the border of California to be deemed eligible. Assume that the delivery point in the northern California border. Attaining that physical delivery point, however, only gets one “inside California” to face the many transmission constraints located solely within California (e.g. Path 15, Path 26). If RECs were available for use, then the renewable developer would be able to deliver energy to N. California to serve load there, and provide the environmental attributes to an LSE in southern California without having to navigate the difficult transmission constraints that may arise if it were trying to move the physical power nearly 1000 miles north to south. This will increase sales to the developer (in this hypothetical, selling attributes to

an entity in the south when the attributes are not sought in the north) and decrease costs to the consumer (in this hypothetical, buying attributes for energy delivered in the north at a price lower than renewable attributes could be purchased in the south).

(b) How, if at all, would REC trading, as compared to current RPS flexible delivery rules, provide more flexibility or be less costly in overcoming transmission congestion constraints? Please provide specific examples of situations in which REC trading would enable renewable energy projects to be developed in transmission constrained areas in California that would not otherwise be feasible.

See answer above.

(4) Describe the foreseeable market in California and neighboring states for null power in the timeframe 2008-2011. Please discuss:

- **Market demand for in-state null intermittent power;**

In the foreseeable future, Null Power will continue to provide at least 67% of California's supply needs (i.e. 100% of total demand minus 33% RPS).

Low-cost, low-GHG emitting intermittent null power could be particularly useful as the state of California moves to electrify its transportation system. For example, null power associated with intermittent wind resources will have a tendency in some locations to be delivered during off-peak periods. This is the time period when many analysts believe electric, plug-in vehicles will be re-charging. Hence, these parties will benefit from the availability of low-cost power from wind resources, *even if intermittent*, as it will serve as a substitute for relatively higher cost, higher GHG emitting off-peak fossil-based power.

- **Market demand for null firmed power delivered in California from out-of-state facilities;**

Firmed power generally is more desirable than non-firmed, but only at a price. In the future, if TOU pricing becomes affective, then any null power from intermittents, whether firmed or not, may prove attractive as a means to lowering off-peak, TOU pricing.

- **Characteristics of the existing spot market that affect procurement of null intermittent power; and**

IEP is not sure what this question is asking.

- **How, if at all, would the implementation of the California Independent Systems Operator's (CAISO) market redesign and technology upgrade (MRTU) affect the demand for and the treatment of null intermittent power and out-of-state null firmed power?**

The CAISO MRTU redesign should result in greater transparency in pricing in more discrete geographic zones. Supply and demand will affect the value of the intermittent and/or firmed null power.

Indirectly, the supply and demand of the null power may affect the price/value of the renewable attributes. To the extent that the MRTU market redesign makes projections of null power prices more difficult (i.e. price volatility increases such that market certainty decreases), then the MRTU redesign may make the REC market more critical as the RECs will become a more stable, predictable revenue stream for the developer.

(5) Please comment on Dr. Weiss's assessment of the elasticity of RPS demand and supply curves.

Dr. Weiss asserts that REC markets deviate from the Ideal. First, he asserts that REC market demand is perfectly inelastic (i.e. voluntary demand is small and willingness to pay low).

On the contrary, much evidence exists that the voluntary market is growing significantly. Importantly, this growth has been occurring in an era where incumbent utilities nationally have worked against renewables in general and REC markets specifically. Any growth in this environment is impressive given these obstacles, and probably understates real demand. Secondly, as GHG policy grows and expands and as climate change effects become more pronounced, then demand growth will accelerate.

Dr. Weiss asserts that the REC supply is very elastic up to capacity. He further suggests that this leads to a boom/bust cycle.

Historically, the boom/bust cycle associated with renewables is more aligned with uncertainty associated with state/federal policy (e.g. renewable mandates such as PURPA, RPS programs, and federal PTC, investment tax credits, etc), changing legislative/regulatory programs, etc. However, we are now entering into an era in which demand is driven by what appear to be relatively more stable, public policy concerns over climate change and carbon policy. This should stabilize the demand for renewables in general and RECs in particular.

As a result, we disagree with Dr. Weiss that the REC supply will necessarily be characterized by boom/bust cycles. Programmatic stability,

from both a regulatory and legislative perspective, is critical to ensure a stable market in RECs.

Dr Weiss asserts that the presence of these two phenomenon, inelastic demand and elastic supply, will make it more difficult to finance new projects.

Demand for non-carbon fuels will be a primary driver in renewable development. A REC market should be viewed as an additional tool available for LSEs to meet their RPS mandate and/or low-carbon policy objectives. If the REC market is not a better tool than what's already in the tool-chest to achieve these goals, LSEs will not use it. A REC market will not undermine the market that exists today, but rather improve on that market. Thus, it shouldn't be perceived as hindering project development per se.

(6) If demand for tradable RECs for RPS compliance exceeds supply in the California REC market (at least in the near term), do you agree with Dr. Weiss's analysis that REC prices would tend to float to the RPS penalty amount (\$50/MWh)? Would prices float to any other price cap the Commission might implement?

If demand for RECs exceeds the supply, then the LSE will have two options: (a) pay more for RECs up to the market clearing price for RECs or the RPS penalty amount, or (b) contract with renewable generators for energy, capacity, and/or environmental attributes as is done today. The only reason that the price for a REC per se would float to some higher price is because the option to build/operate results in a still higher cost. Alternatively, the price may move higher because the LSE has made certain market assumptions about the availability of RECs (and/or new construction), failed to act to hedge market assumptions in the forward market(s), and is caught "short" in the market with a regulatory compliance deadline looming of which it was fully aware. Rather than assume that the REC market is the problem in this case, it should be viewed as an alternative for compliance: the real problem is imprudent planning by the LSE.

(a) If REC prices floated to the penalty amount or a price cap, would a market for tradable RECs drive up the price of bundled RPS contracts?

See answer above. Look to imprudent planning rather than imprudent "products" in the market place. A bundled RPS product is as likely to reduce the price of a tradable REC as a unbundled REC price is to drive up the price of a bundled RPS (and vice versa).

(b) If REC prices floated to the penalty amount or a price cap, how would this affect California ratepayers in the short term? In the long term?

If REC prices float to the penalty amount or a price cap, California ratepayers are not likely to be affected because the IOUs are suppose to be procuring at least 1% of load every year, thus new renewables/replacement renewables should be “in the pipeline” to relieve short-term upward REC price pressures. In the long term, RPS procurement practices will counteract any upward pressure on REC pricing above and beyond what one would expect from a bundled renewable product.

(c) If REC prices floated to the penalty amount or a price cap, would all RPS non-compliance costs then be transferred from utility shareholders to ratepayers? Would some portion of noncompliance costs be transferred?

Non-compliance penalty costs should be borne by shareholders. To the extent that imprudent planning results in “short” purchases at relatively high prices, then the Commission has its remedies.

RECs should not be viewed as a tool that increases ratepayer risk. The mere fact that RECs may be used for RPS compliance purposes does not, per se, suggest greater ratepayer risk. Rather, RECs provide relatively cost-effective means to achieve RPS goals in light of delivery requirements.

(7) Dr. Weiss presents an analysis of REC markets showing a bimodal pricing distribution, colloquially referred to as “boom-bust” pricing.

(a) Please describe any situations in a California REC market in which the boom-bust pricing pattern is likely not to apply.

The design of the long-term RPS program in California, particularly the regulatory requirement to achieve 1% sales increase every year up to the targeted amount, creates steady demand that should mitigate any risk of a boom/bust cycle. In addition, the California GHG policy provides an additional demand pull on renewables, here again mitigating the potential for a boom/bust cycle in construction of new renewables and/or the repowering of the existing fleet. The presence of an additional RPS compliance “tool” such as a tradable REC should reduce the likelihood of boom/bust cycles, rather than exacerbate that likelihood.

To the extent that “boom-bust” cycles arise in the tradable RECs market, IEP believes that this is a symptom of imperfections in the market for renewables that arise elsewhere (e.g. inadequate forward procurement). In these instances, rather than eliminate opportunities presented by a tradable REC market, attention should be focused on the causes of inadequate renewable generation infrastructure investment necessary to create the generation facilities in the first instance.

(b) In the timeframe 2008-2011, are contracts for RECs likely to provide developers of new renewable facilities in California and neighboring states with additional financial resources (both in terms of cash flow for the facility and in terms of willingness of investors and/or lenders to provide capital for development of the facility)? Why or why not?

Experience has shown that Tradable RECs can be useful in supporting the financing of new renewable facilities. See Texas example. We may not know for sure whether contracts for RECs during the 2008-2011 timeframe will provide necessary additional resources, but not knowing that answer precisely in advance is no reason not to implement the policy and see if it is helpful.

(c) Please describe how the design of a tradable REC market for compliance with the California RPS should take into account the boom-bust pricing tendency. Please specify whether your design proposal posits a REC market whose principal purpose is:

- (i) providing compliance flexibility for California RPS-obligated LSEs; or**
- (ii) stimulating development of new renewable energy generation capable of delivering into California; or**
- (iii) Either (i) or (ii) depending on whether the timeframe considered is 2008-2011 or 2012-2020; or**
- (iv) both (i) and (ii).** In providing additional flexibility to LSEs, this may stimulate new development. As noted above, the tradable REC should be viewed first and foremost as an additional “arrow in the quiver” and, if it’s not cost-effective in the marketplace, it will not be utilized.

2. Staff straw proposal

At the September workshop, Energy Division staff presented a straw proposal for using tradable RECs for RPS compliance. A revised, current version of the staff straw proposal is attached as Attachment E. Please base comments on Attachment E, not on the staff proposal made at the workshop. Please treat the staff straw proposal as a *proposal*. In framing comments, however, imagine that the proposal describes a real system of using tradable RECs for RPS compliance under the existing RPS statutory framework. Please draw on your responses to questions in other sections, as appropriate.

[NOTE: IEP's Comments on the Staff Proposal are provided as markup to the matrix. Provided herein as Attachment A-1 located below.]

(1) For each area of the straw proposal, please address the following issues, as well as any other issues that would contribute to a complete discussion of the straw proposal. Please provide all information necessary to support the analysis presented in the comments. Where relevant, please comment on the rationale provided by staff for each area.

- (a) Impact on and integration with the existing methods of RPS compliance, including both procurement methods and existing flexible compliance rules.**
- (b) Impact on and integration with the existing methods of RPS reporting.**
- (c) Impact on the development of new renewable resources in California and neighboring states.**
- (d) Impact on RPS compliance in the timeframe 2008-2011.**
- (e) Impact on RPS compliance in the timeframe 2012-2020,**
- (f) Impact on the development of a market for tradable RECs for RPS compliance.**
- (g) Impact on and integration with a possible market of tradable allowances for compliance with the Global Warming Solutions Act, Assembly Bill (AB) 32 (Nuñez/Pavley), 2006 Stats. ch. 488.**

[see IEP Attachment A-1 below]

(2) In order to evaluate the TREC usage limits section of the straw proposal, please comment on whether the minimum quota proposal would help:

- (a) maintain a focus on new renewable infrastructure development;**
- (b) reduce ratepayer compliance costs that might otherwise result from a high demand for RECs relative to available supply;**
- (c) enable RPS procurement to remain a hedge against volatile natural gas prices;**
- (d) respond to the impact of supply and demand on REC market prices and liquidity by imposing more stringent minimum contracting requirements for short-term REC contracts than for short-term bundled contracts.**

[see IEP Attachment A-1 below]

(3) In order to evaluate the cost recovery section of the straw proposal, please comment on whether, if authorized by the Commission, an unbundled REC

market for RPS compliance should be viewed as a commodity market, in which prices converge and each unit does not have a different intrinsic value?

If no:

- **Is the value of an unbundled REC:**
 - i. **correlated to the production cost of the underlying renewable energy?**
 - ii. **the price difference between a bundled renewable energy contract and a bundled fossil contract?**
 - iii. **other**

If yes:

- **What factor(s) influence the commodity market price?**
- **What methodologies can be used to evaluate the reasonableness of a REC price from the ratepayer's perspective?**
- **Could the Commission practically implement the above proposed methodology? If not, what is the next best alternative approach?**

In theory, the price of the REC should converge, as it only represents the underlying environmental attributes of the otherwise eligible, renewable resource. What may vary would be the capacity price, based on factors such as geographic location, availability, etc., and/or the energy price (based on firmness, etc) such that the total underlying revenue stream associated with the power from the eligible renewable generating facility (i.e. sum of capacity, energy, and REC) may vary significantly.

(4) Please identify any aspects of the straw proposal that you consider unnecessary or duplicative, and briefly explain the basis of your views.

The staff proposal does not need to address the “market design” for RECs, per se. Rather, the focus should be on defining the type of REC product sought by the commission that may be used for purposes of RPS compliance. Once properly defines and prescribed, markets (e.g. primary and secondary) will emerge to facilitate the transfer of the REC to regulated entities. One should not expect LSEs to employ RECs for compliance purposes unless they provide value, lower overall costs, etc.

(5) What elements, if any, in addition to those identified in the straw proposal would be necessary to create a market for tradable RECs and administer an RPS program that included tradable RECs, while advancing the goals of the RPS program and complying with the requirements of § 399.16? Please be specific and explain why each additional element would be necessary.

An efficient and operational WREGIS program used for tracking/accounting for the creation, transfer, and retirement of a unique Certificate is very helpful. Once a useful product such as the WREGIS Certificate is properly defined and registered, efficient markets will emerge to facilitate the transfer of the Certificate to the regulated entities. The “design” of such markets need not be a primary obligation of the Commission.

(6) As noted in the Amended Scoping Memo, after a workshop on REC trading for RPS compliance, the parties will then have the opportunity to “comment on the desirability, or lack thereof, of adopting a system like one of those developed through the workshop process, or be able to make another proposal that could be contrasted in some detail with the previous possibilities.” (pp. 4-5.)

(a) If the straw proposal were adopted as set forth in Attachment E, would you recommend that the Commission authorize REC trading as a compliance tool for RPS compliance?

As noted in IEP’s responses contained in Attachment A-1, we generally agree with the direction of the Staff Proposal. However, in a number of areas, we disagree and this needs to be weighed more fully. Of particular importance is the matter presented in the Staff Proposal that (a) seems to mis-understand the functionality and purpose of WREGIS, and thus, (b) implies that LSEs may “unbundle” the environmental attributes unilaterally without the consent of the seller. If correct in our understanding of the staff proposal in this regard, we would have significant concerns.

(b) If you would not recommend that the Commission authorize a REC trading regime as outlined in the straw proposal, please either develop an alternative REC trading proposal, or state and explain that your view that no REC trading regime would be satisfactory.

IEP supports the concept of REC trading. If one approaches the policy matter as simply recognizing that RECs are one additional means to achieve RPS compliance, assuming accurate verification/tracking (hence, the need for WREGIS and a unique serial number associated with kWhs delivered to the grid from eligible renewable resources), then the Commission’s focus on trading rules, patterns, and motives is misplaced and overly complicates policy design and implementation.

3. REC Attributes

The possible development of a market for tradable RECs for California RPS compliance and the development of methods for compliance with AB 32 bring into sharp focus the importance of understanding all the attributes of a tradable REC. The background on this issue includes the Scoping Memo and Ruling of Assigned Commissioner (April 28, 2006), which identified "the characteristics or attributes of any RECs allowed for RPS compliance" as one of the issues to be addressed in this proceeding. (p. 2.) Subsequently, in Senate Bill (SB) 107 (Simitian), 2006 Stats. ch. 464, the Legislature provided (in the section now codified at Pub. Util. Code § 399.12(g)(2)) that 'Renewable energy credit' includes all renewable and environmental attributes associated with the production of electricity from the eligible renewable energy resource, except for an emissions reduction credit issued pursuant to Section 40709 of the Health and Safety Code and any credits or payments associated with the reduction of solid waste and treatment benefits created by the utilization of biomass or biogas fuels. In D.07-02-011, as modified by D.07-05-057, the Commission addressed aspects of the standard terms and conditions for RPS contracts related to R.06-02-012 AES/tcg environmental attributes. The section on Environmental Attributes from Appendix A to D.04-06-014 (at pp. A-2—A-3) is reproduced as Attachment D-1. Those standard terms and conditions as set out in D.07-02-011, as modified by D.07-05-057, are reproduced as Attachment D-2. Taking into account these documents, the requirements of Pub. Util. Code § 399.16, and the pending implementation of AB 32 (with the caveats and uncertainties expressed in footnote 9, above), please comment on the following issues.

(1) With respect to biogas that is an RPS-eligible resource, should the benefits of capturing methane in the production of the biogas be included in the attributes of the REC associated with the biogas?

No.

(2) How should the "net zero emissions" requirement in the last sentence of the Green Attributes definition in Attachment D-2 be applied to the capture of methane to produce RPS-eligible biogas?

IEP defers discussion pending further elaboration.

(3) Should a REC include avoided carbon emissions associated with conventional generation displaced by the renewable generation giving rise to the REC? As a policy matter, why or why not? Please include all factual information necessary to support the policy choice expressed. Identify any assumptions or predictions about AB 32 that are related to the policy reference expressed (e.g., "In a load-based regulatory framework in which emissions reductions from RPS compliance are included in the cap...") Please

also make clear what definition of "avoided emissions" is being used in the response.

No. A REC presents a kWh of energy delivered to the grid by an eligible renewable resource. Its function is to be used to measure against RPS compliance obligations. Mixing a REC with other statewide/federal mandates will (a) unnecessarily increase administrative complexity, (b) risk undermining the integrity of the RPS program (as well as the other "mandated programs"), and (c) undermine public support. Keep them separate.

(4) In view of the current uncertainties associated with the implementation of AB 32, what are the potential pitfalls, if any, both for the RPS program itself and the interaction of RPS with potential GHG regulatory methods, of determining that a tradable REC used for compliance with the California RPS includes avoided carbon emissions? Of determining that a REC does not include avoided carbon emissions? In responding to this question, please review the presentation on Carbon Market and REC Market Interactions made by Kristin Ralff Douglas at the workshop, but note that the examples in that presentation are intended to be illustrative only, and do not reflect any determination that a particular method of implementing AB 32 has been developed.

See answer above.

(5) Are there any potential legal impediments to or uncertainties about the implementation of the policy preferences you expressed in response to questions 1-4? What are they? How might they be overcome? Please explain in detail.

If you keep the means for compliance of various mandated programs separable, at least from a paper-trail/reporting perspective, you minimize legal impediments. It's only when the Commission attempts to mix/match that the potential for legal impediments arise, and they likely arise exponentially.

(6) Would particular decisions about the implementation of AB 32 alter your views about the issues discussed in Questions 1-5, above? What decisions would have an impact? What impact would they have? Why?

IEP is not aware of any potential decisions related to AB 32 that would alter the views provided in Questions 1-5.

4. Standard terms and conditions

(1) What changes, if any, should be made in the standard terms and conditions set forth in Attachment D-2 to reflect and/or accommodate the policy preference and legal analysis set forth in your responses to questions 1-6 in Section 3?

As a general rule, standardization of contract terms and conditions has the tendency to create more problems than solutions, because it's difficult to create standard contract terms and conditions that match the changing marketplace and physical realities faced by developers. Less is more, in some instances.

(2) What changes, if any, should be made to the standard terms and conditions to accommodate the use of tradable RECs for RPS compliance, even if you think no other changes are required in response to the questions in Section 3, above?

Nothing needs to be addressed in terms of imposing standard contract terms and conditions. The Commission needs to simply articulate a policy that sends clear signals to buyers/sellers in the marketplace regarding (a) what types of RECs will be approved (e.g. WREGIS, some other kind?) and/or (b) guidelines as to what a REC must contain for purposes of RPS compliance (e.g. unique serial number; locational attributes, if any; technology attributes, if any; etc.)

(3) What changes, if any, should be made to the standard terms and conditions to conform to Pub. Util. Code § 399.14(a)(2)(D), which provides in part that “A contract for the purchase of electricity generated by an eligible renewable energy resource shall, at a minimum, include the renewable energy credits associated with all electricity generation specified under the contract.”

No changes need to be made, except to clarify that when a LSE purchases a “bundled product” from a seller to be applied against RPS obligations, then the specification that the environmental attributes and/or WREGIS Certificate, AS PRESCRIBED IN THE CONTRACT, will be transferred.

Clearly, when an LSE purchases a REC (particularly a WREGIS REC), that is precisely what is being transferred.

(4) If any changes at all should be made to the standard terms and conditions, how should the RECs be treated that are associated with energy delivered under contracts using ...

- (a) the standard terms and conditions set forth in Attachment D-1, or**
- (b) the standard terms and conditions set forth in Attachment D-2?**

IEP defers discussion pending further elaboration.

**Attachment A-1
IEP Comments on Staff Proposal
Contained in ALJ Ruling Attachment E**

Compliance Questions	Staff Proposal	IEP Comments
Market Participants:		
<ul style="list-style-type: none"> Who can participate in the California compliance REC market? 	There are no limits on market participation	Agree
Should the REC trading rules differ for third parties (any non RPS-obligated entity)?	To the greatest extent possible, rules should be consistent for all participants	Agree
TREC Usage Limits		
<ul style="list-style-type: none"> Pursuant to Pub. Util. Code § 399.16(a)(7), the Commission may limit the quantity of tradable RECs (TRECs) procured for RPS compliance. Should there be a limit on the quantity of tradable RECs that can be used by LSEs for RPS compliance? Should the limit be different for different classes of LSEs? 	<p>To address usage limits, a minimum quota mechanism, similar to the one set forth in D.07-05-028 for short term contracts, will be applied to RECs.</p> <p>The minimum quota will allow, in any calendar year, LSEs to count short-term REC contracts for RPS compliance only if, in the same calendar year, the LSE signs long-term bundled contracts or bundled contracts with new facilities whose aggregated annual expected deliveries total at least 0.25% of its prior year's retail sales.</p>	<p>Usage limits are provided to the Commission as an option ("may limit").</p> <p>Absent explicit evidence (rather than theory) that TRECs are (rather than could) undermining RPS compliance, the use of TRECs should not be limited.</p> <p>TRECs should be viewed as an additional means to attain RPS compliance, not the only means. However, limits do not need to be prescribed at this time.</p>
Flexible Compliance:		
Banking		
<ul style="list-style-type: none"> Should tradable RECs have an "expiration date"? • Should RPS-obligated LSEs be able to "bank" tradable RECs without limitation as to quantity? Should RPS-obligated LSEs be able to "bank" tradable 	<p><u>Banking within WREGIS</u> In order for tradable RECs to be used for RPS compliance, they must be retired in WREGIS within three compliance years (including compliance year in which it was generated).</p> <p><u>Banking after WREGIS.</u></p>	<p>WREGIS allows for banking of certificates. Within WREGIS, certificates are initially placed in the generator's account until expired, if ever, or transferred. Seeking to require the retirement of certificates</p>

<p>RECs without temporal limitations?</p> <p><i>Note: Currently, there are no temporal or quantity restrictions for banking bundled RPS contracts. Flexible compliance is tracked for each LSE in its Reporting and Compliance Spreadsheet submitted in biannual performance reports required by D.06-10-050.</i></p>	<p>After RECs are retired in WREGIS, they can be banked indefinitely for RPS compliance purposes.</p> <p>The flexible compliance for RECs and RPS bundled procurement will be tracked by the Compliance spreadsheets submitted as part of the biannual Compliance Reports (D.06-10-050).</p>	<p>within WREGIS is inappropriate. On the other hand, setting a requirement on LSEs related to the vintaging of WREGIS certificates is within the Commission’s authority. In this regard, three year “vintage rule” on TRECs held by LSEs seems reasonable.</p> <p>Regarding banking after WREGIS, once RECs are retired within WREGIS they “have been used.” They cannot be “banked” thereafter within WREGIS. If a LSE wishes to “bank” RECs within WREGIS, it may transfer the REC to its own account until used (i.e. retired). Limits on the use of RECs at this point are a function of commission rules as noted above.</p>
<p>Flexible Compliance: Earmarking</p>		
<p>• Should earmarking⁵ be allowed for TRECs?</p>	<p>No tradable RECs can be used for earmarking.</p> <p>No forward REC contracts can be used for earmarking.</p>	<p>Agree.</p> <p>Earmarking should not apply to RECs. WREGIS-based RECs are created upon delivery to the grid of renewable-based energy. They do not exist prior to that point. Allowing earmarking of RECs would create unnecessary administrative complexity</p>
<p>Treatment of Bundled Contracts</p>		

<ul style="list-style-type: none"> • What types of existing and future bundled RPS contracts can be unbundled for REC trading (excluding contracts pursuant to Pub. Util. Code § 399.16(a) for which no RECs will be created)? 	<p>Beginning on January 1, 2009, LSEs can unbundle and sell the RECs (that are tracked in WREGIS) from currently operational RPS projects. (Once the RECs are sold, they cannot be used for RPS compliance by the selling LSE. The null power also cannot be used for RPS compliance by any LSE.)</p> <p>Beginning on January 1, 2009, LSEs can unbundle and sell RECs (that are tracked in WREGIS), on a forward basis, from Commission-approved RPS projects that are not yet online. (Once the RECs are sold, they cannot be used for RPS compliance by the selling LSE. The null power also can not be used for RPS compliance.)</p> <p>However, LSEs cannot unbundle the first year of a bundled contract if it has been set aside for RPS earmarking</p> <ul style="list-style-type: none"> • LSEs can unbundle subsequent years of an earmarked bundled 	<p>Disagree.</p> <p>If the contract between the buyer and seller for delivery of energy, capacity, and/or renewable attributes (RECs) is silent on the disposition of RECs, whether or not the generation facility is “currently operational” or not, then LSEs may not unilaterally unbundle RECs. This would represent a “taking” under the contract.</p> <p>If the LSE has legally assumed the right to take ownership of the REC, then it would legally have the authority to dispense with the REC per Commission rules. If this were to occur, then the underlying power would properly be considered “null power” and that power (kWh) should not be used for purposes of RPS compliance.</p>
<p>Cost Recovery</p>		
<ul style="list-style-type: none"> • What is the review and approval process for IOU REC contracts? (<i>Currently, all IOU bundled RPS contracts must be filed by advice letter. The contract review process for short-term bundled contracts is being separately developed in R.06-02-012.</i>) • What price evaluation mechanism should the Commission use to evaluate whether a REC contract price 	<p><u>Review process:</u> Long-term REC contracts (either from a solicitation or bilateral) must be filed with the Commission by advice letter. All short-term REC contracts should follow the same approval process that is established in R.06-02-012 for short-term bundled contracts.</p> <p><u>Price evaluation criteria:</u> IOUs should solicit REC contracts in their annual</p>	<p>Agree.</p> <p>Agree.</p>

<p>is reasonable?</p> <ul style="list-style-type: none"> • Should the Commission establish standard terms and conditions (modifiable and/or non-modifiable) to be contained in REC contracts? 	<p>renewable RFOs. As part of this process, the IOUs must modify their least cost, best fit (LCBF) evaluation methodologies to shortlist the most competitive REC contracts.</p> <p>The LCBF methodology should compare the benefits and costs of bundled contracts with REC transactions and evaluate them relative to the LSE's entire RPS portfolio</p> <p>A price cap will also be used to protect ratepayers from unreasonable costs. The price cap for any REC contract (short term, long term, bid into a solicitation, bilateral) is \$35/REC levelized using the IOU's approved discount rate. Bilateral REC contracts are allowed also and are subject to the \$35/REC levelized price cap.</p> <p><u>Standard terms and conditions:</u> Each REC contract must contain a Commission-approved term identifying the RECs and their attributes transferred to the buyer. This term is not modifiable.</p>	<p>Agree</p> <p>Disagree. Price caps do not need to be imposed. Price caps simply distort the market. Rather, the Commission has its existing authorities to approve or deny the purchase of RECs by regulated entities.</p> <p>If price caps were imposed, they should be imposed no less than the penalty cost for RPS non-compliance or the market-price of bundled renewables, whichever is greater. Otherwise, the Commission will be incenting behavior in the marketplace that may well undermine RPS compliance.</p> <p>There must be a clear definition in the contract identifying exactly what's being bought/sold. Both parties must agree. No need to create a non-modifiable term, as the Commission will review</p>
--	---	--

		each transaction before approval.
--	--	--

2970/010/X94295.v1

CERTIFICATE OF SERVICE

I, Melinda LaJaunie, certify that I have on this 13th day of November 2007 caused a copy of the foregoing

**POST-WORKSHOP COMMENTS OF THE INDEPENDENT
ENERGY PRODUCERS ASSOCIATION ON TRADABLE
RENEWABLE ENERGY CREDITS**

to be served on all known parties to R.06-02-012, R.06-05-027, R.06-03-004, R.06-04-009 listed on the most recently updated service list available on the California Public Utilities Commission website, via email to those listed with email and via U.S. mail to those without email service. I also caused courtesy copies to be hand-delivered as follows:

Commissioner, President Michael R. Peevey
California Public Utilities Commission
State Building, Room 5218
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Anne E. Simon
California Public Utilities Commission
State Building, Room 5024
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Burton Mattson
California Public Utilities Commission
State Building, Room 5104
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Dorothy Duda
California Public Utilities Commission
State Building, Room 5109
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Maryam Ebke
California Public Utilities Commission
State Building, Room 5116
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Charlotte TerKeurst
California Public Utilities Commission
State Building, Room 5117
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Jonathan Lakritz
California Public Utilities Commission
State Building, Room 5020
505 Van Ness Avenue
San Francisco, CA 94102

ALJ Meg Gottstein
California Public Utilities Commission
State Building, Room 2106
505 Van Ness Avenue
San Francisco, CA 94102

I declare under penalty of perjury under the laws of the State of California that the foregoing is true and correct. Executed this 13th day of November 2007 at San Francisco, California.

/s/ Melinda LaJaunie
Melinda LaJaunie

Service List R.06-02-012
Last Updated 11/9/07

ENERGY AMERICA, LLC
ONE STAMFORD PLAZA, 8TH FLOOR
263 TRESSER BLVD.
STAMFORD, CT 6901

WILLIAM CRONIN
ENERGY AMERICA, LLC
Energy America, LLC
ONE STAMFORD FPLAZA, 8TH FLOOR
263 TRESSER BLVD.
STAMFORD, CT 6901

DANIEL V. GULINO
dgulino@ridgewoodpower.com

PRAXAIR PLAINFIELD, INC.
rick_noger@praxair.com

KEITH MC CREA
keith.mccrea@sablau.com

CAROL A. SMOOTS
csmoots@perkinscoie.com

RHONE RESCH
rresch@seia.org

LARRY F. EISENSTAT
DICKSTEIN SHAPIRO LLP
CPV Renewable Energy Company, LLC
1825 EYE STREET, NW
WASHINGTON, DC 20006

RICHARD LEHFELDT
DICKSTEIN SHAPIRO LLP
CPV Renewable Energy Company, LLC
1825 EYE STREET, NW
WASHINGTON, DC 20006

LISA M. DECKER
lisa.decker@constellation.com

GARSON KNAPP
garson_knapp@fpl.com

OCCIDENTAL POWER SERVICES,
INC.
ej_wright@oxy.com

APS ENERGY SERVICES COMPANY,
INC.
stacy.aguayo@apses.com

JENINE SCHENK
jenine.schenk@apses.com

NEW WEST ENERGY
rsnichol@srpnet.com

RASHA PRINCE
rprince@semprautilities.com

DAVID L. HUARD
dhuard@manatt.com

RANDALL W. KEEN
rkeen@manatt.com

CONSTELLATION NEW ENERGY, INC.
bill.chen@constellation.com

3 PHASES ENERGY SERVICES
energy@3phases.com

MICHAEL MAZUR
mmazur@3phasesRenewables.com

SUSAN MUNVES
susan.munves@smgov.net

DANIEL W. DOUGLASS
douglass@energyattorney.com

GREGORY S. G. KLATT
klatt@energyattorney.com

AMERICAN UTILITY NETWORK
pssed@adelphia.net

PAUL DELANEY
pssed@adelphia.net

CATHY A. KARLSTAD
cathy.karlstad@sce.com

WILLIAM V. WALSH
william.v.walsh@sce.com

SOCAL WATER/BEAR VALLEY
ELECTRIC
kswitzer@gswater.com

KEITH SWITZER
kswitzer@gswater.com

ANN MOORE
amoore@ci.chula-vista.ca.us

STRATEGIC ENERGY, LTD.
customerrelations@sel.com

AIMEE M. SMITH
amsmith@sempra.com

FREDERICK M. ORTLIEB
fortlieb@sandiego.gov

SEMPRA ENERGY SOLUTIONS
email@semprasolutions.com

THEODORE ROBERTS
troberts@sempra.com

CORAL POWER, LLC
hharris@coral-energy.com

REID A. WINTHROP
rwinthrop@pilotpowergroup.com

THOMAS DARTON
tdarton@pilotpowergroup.com

PILOT POWER GROUP, INC.
tdarton@pilotpowergroup.com

JOHN W. LESLIE
jleslie@luce.com

GLORIA BRITTON
GloriaB@anzaelectric.org

WILL PLAXICO
wplaxico@heliosenergy.us

AOL UTILITY CORP.
lalehs101@hotmail.com

KERRY EDEN
kerry.eden@ci.corona.ca.us

TAMLYN M. HUNT
thunt@cecmail.org

JOSEPH LANGENBERG
Joe.Langenberg@gmail.com

DAVID ORTH
dorth@krcd.org

JANE H. TURNBULL
jaturnbu@ix.netcom.com

JANIS C. PEPPER
pepper@cleanpowermarkets.com

MARCEL HAWIGER
marcel@turn.org

STEPHEN A. S. MORRISON
stephen.morrison@sfgov.org

Gretchen T. Dumas
gtd@cpuc.ca.gov

Noel Obiora
nao@cpuc.ca.gov

THERESA L. MUELLER
theresa.mueller@sfgov.org

MICHAEL A. HYAMS
mhyams@sfwater.org

EVELYN KAHL
ek@a-klaw.com

ROD AOKI
rsa@a-klaw.com

ARTHUR L. HAUBENSTOCK
alhj@pge.com

CHARLES MIDDLEKAUFF
crmd@pge.com

WILLIAM H. CHEN
bill.chen@constellation.com

BRIAN CRAGG
bcragg@goodinmacbride.com

JAMES D. SQUERI
jsqueri@goodinmacbride.com

JOSEPH F. WIEDMAN
jwiedman@goodinmacbride.com

KAREN E. BOWEN
jkarp@winston.com

MICHAEL B. DAY
mday@goodinmacbride.com

JOSEPH M. KARP
jkarp@winston.com

JEFFREY P. GRAY
jeffgray@dwt.com

STANDISH O'GRADY
sho@ogrady.us

MATHEW A. FOGELSON
MAFv@pge.com

SARA STECK MYERS
ssmyers@worldnet.att.net

GABE PETLIN
gpetlin@3degreesinc.com

JANICE G. HAMRIN
jhamrin@resource-solutions.org

EVELYN C. LEE
ECL8@pge.com

JENNIFER CHAMBERLIN
jchamberlin@strategicenergy.com

JOHN DUTCHER
ralf1241a@cs.com

WILLIAM H. BOOTH
wbooth@booth-law.com

LINDA Y. SHERIF
sherifl@calpine.com

JEREMY D. WEINSTEIN
jeremy.weinstein@pacificcorp.com

JODY S. LONDON
jody_london_consulting@earthlink.net

CLIFF CHEN
cchen@ucsusa.org

GREGORY MORRIS
gmorris@emf.net

NEAL DE SNOO
ndesnoo@ci.berkeley.ca.us

CLYDE MURLEY
clyde.murley@comcast.net

JP ROSS
jpross@sungevity.com

R. THOMAS BEACH
tomb@crossborderenergy.com

L. JAN REID
janreid@coastecon.com

JOHN R. REDDING
johnredding@earthlink.net

JAMES WEIL
jweil@aglet.org

CAROLYN KEHREIN
cmkehrein@ems-ca.com

JUDITH SANDERS
jsanders@caiso.com

JOHN DALESSI
jdalessi@navigantconsulting.com

WILLIAM W. WESTERFIELD III
www@eslawfirm.com

ANDREW B. BROWN
abb@eslawfirm.com

DAN L. CARROLL
dcarroll@downeybrand.com

DOUGLAS K. KERNER
dkk@eslawfirm.com

GREGGORY L. WHEATLAND
glw@eslawfirm.com

JAN MCFARLAND
janmcfar@sonic.net

STEVEN KELLY
steven@iepa.com

DONALD N. FURMAN
SENIOR VICE PRESIDENT
PPM ENERGY, INC.
PPM Energy, Inc.
1125 NW COUCH STREET, SUITE 700
PORTLAND, OR 97209

RYAN FLYNN
ryan.flynn@pacificcorp.com

KAREN MCDONALD
karen.mcdonald@powerex.com

SEAN J. FINNERTY
sfinnerty@cpv.com

DANIEL M. HECHT
dhecht@sempratrading.com

WILLIAM P. SHORT
bshort@ridgewoodpower.com

STEVEN S. SCHLEIMER
steven.schleimer@barclayscapital.com

AMY C. ROMA
ACRoma@hhlaw.com

MARK L. PERLIS
DICKSTEIN SHAPIRO LLP
1825 EYE STREET, NW
WASHINGTON, DC 20006

MARY ANNE SULLIVAN
MASullivan@hhlaw.com

CHRISTOPHER O'BRIEN
obrienc@sharpsec.com

VENKAT SURAVARAPU
vsuravarapu@cera.com

KEVIN PORTER
porter@exeterassociates.com

TODD JAFFE
tjaffe@energybusinessconsultants.com

RALPH E. DENNIS
ralph.dennis@constellation.com

SAMARA MINDEL
smindel@knowledgeinenergy.com

CATHY S. WOOLLUMS
cswoollums@midamerican.com

STEVEN SIEGEL
ssiegel@biologicaldiversity.org

JASON ABIECUNAS
abiecunasjp@bv.com

ANN HENDRICKSON
ahendrickson@commerceenergy.com

ROY D. MCCOY
rmccoy@ercot.com

JOHN SNIFFEN
jsniffen@elementmarkets.com

ELIZABETH BAKER
bbaker@summitblue.com

KEVIN J. SIMONSEN
kjsimonsen@ems-ca.com

STACY AGUAYO
stacy.aguayo@apses.com

DAVID SAUL
dsaul@pacificsolar.net

SUSAN G. TRAUTMANN
ericj@eslawfirm.com

CHRISTOPHER HILEN
chilen@sppc.com

ELENA MELLO
emello@sppc.com

TREVOR DILLARD
tdillard@sierrapacific.com

JOE GRECO
jgreco@caithnessenergy.com

ELIZABETH DOUGLASS
elizabeth.douglass@latimes.com

HARVEY EDER
harveyederpspc.org@hotmail.com

STEVE CHADIMA
steve@energyinnovations.com

JACK MCNAMARA
jackmack@suesec.com

DAVID TOWNLEY
David.Townley@townleytech.com

CASE ADMINISTRATION
case.admin@sce.com

FRANK W. HARRIS
frank.w.harris@sce.com

GARY L. ALLEN
gary.allen@sce.com

JAMES B. WOODRUFF
woodrujb@sce.com

LIZBETH MCDANNEL
lizbeth.mcdannel@sce.com

RONALD MOORE
rkmoore@gswater.com

DAN PERKINS
Dan@EnergySmartHomes.net

DANIEL A. KING
daking@sempra.com

LINDA WRAZEN
lwrazen@sempraglobal.com

THOMAS P. CORR
tcorr@sempra.com

YVONNE GROSS
ygross@sempraglobal.com

DONALD C. LIDDELL, P.C.
liddell@energyattorney.com

MICHAEL SHAMES
mshames@ucan.org

SCOTT J. ANDERS
scottanders@sandiego.edu

MARCIE MILNER
marcie.milner@shell.com

CENTRAL FILES
centralfiles@semprautilities.com

DESPINA NIEHAUS
dniehaus@semprautilities.com

BILL MASON
billm@enxco.com

CARL STEEN
csteen@bakerlaw.com

JUDE LEBLANC
jleblanc@bakerlaw.com

MICHAEL J. GILMORE
michaelgilmore@inlandenergy.com

HAROLD M. ROMANOWITZ
hal@rwitz.net

MARC D. JOSEPH
mdjoseph@adamsbroadwell.com

BILLY BLATTNER
wblattner@semprautilities.com

DIANE I. FELLMAN
diane_fellman@fpl.com

NINA SUETAKE
nsuetake@turn.org

ROBERT FINKELSTEIN
bfinkelstein@turn.org

DAN ADLER
Dan.adler@calcef.org

BILL GOLOVE
whgolove@chevron.com

DEVRA WANG
dwang@nrdc.org

DOUGLAS E. COVER
dcover@esassoc.com

JAMES STACK
jamesstack@fscgroup.com

KAREN TERRANOVA
filings@a-klaw.com

SEEMA SRINIVASAN
sls@a-klaw.com

SETH D. HILTON
sdhilton@stoel.com

SNULLER PRICE
snuller@ethree.com

ASHLEE M. BONDS
abonds@thelen.com

EDWARD V. KURZ
evk1@pge.com

GRAIG COOPER
gcooper@cpv.com

LENNY HOCHSCHILD
lennyh@evomarkets.com

MELANIE FALLS
mfalls@cpv.com

PETER V. ALLEN
pvallen@thelen.com

REGULATORY FILE ROOM
lawcpuccases@pge.com

SHERIDAN J. PAUKER
spauker@wsgr.com

VALERIE WINN
vjw3@pge.com

NIELS KJELLUND
nxk2@pge.com

ROBERT J. REINHARD
reinhard@mofo.com

CALIFORNIA ENERGY MARKETS
cem@newsdata.com

CALIFORNIA ENERGY MARKETS
cem@newsdata.com

JANINE L. SCANCARELLI
jscancarelli@flk.com

JUDY PAU
judypau@dwt.com

ROBERT B. GEX
bobgex@dwt.com

LISA WEINZIMER
lisa_weinzimer@platts.com

LAW DEPARTMENT FILE ROOM
cpuccases@pge.com

ARNO HARRIS
arno@recurrentenergy.com

ED LUCHA
ELL5@pge.com

GRACE LIVINGSTON-NUNLEY
gx12@pge.com

KATE BEARDSLEY
KEBD@pge.com

MAGGIE CHAN
MMCL@pge.com

STEPHANIE LA SHAWN
S1L7@pge.com

ROBIN J. WALTHER
rwalth@pacbell.net

NICOLAS PROCOS
procos@alamedapt.com

KEITH WHITE
keithwhite@earthlink.net

JACK PIGOTT
jpigott@optisolar.com

ANDREW J. VAN HORN
andy.vanhorn@vhcenergy.com

RICK C. NOGER
rick_noger@praxair.com

AVIS KOWALEWSKI
kowalewskia@calpine.com

KEVIN DUGGAN
duggank@calpine.com

PETER W. HANSCHEN
phansch@mofo.com

PATRICIA THOMPSON
pthompson@summitblue.com

RYAN PLETKA
pletkarj@bv.com

PHILIPPE AUCLAIR
philha@astound.net

WILLIAM F. DIETRICH
dietrichlaw2@earthlink.net

NELLIE TONG
nellie.tong@us.kema.com

RAMONA GONZALEZ
ramonag@ebmud.com

PAUL D. HUNT
pdh9@columbia.edu

PAUL FENN
paulfenn@local.org

MRW & ASSOCIATES, INC.
mrw@mrwassoc.com

BARRY H. EPSTEIN
bepstein@fablaw.com

CYNTHIA WOOTEN
cwooten@lumenxconsulting.com

REED V. SCHMIDT
rschmidt@bartlewells.com

ERIC LARSEN
elarsen@rcmdigesters.com

JANICE LIN
janice@strategenconsulting.com

BRENDA LEMAY
brenda.lemay@horizonwind.com

NANCY RADER
nrader@calwea.org

RYAN WISER
rhwiser@lbl.gov

BRAD BAUER
brad@mp2capital.com

MICHAEL LAINE
michael@mp2capital.com

WHITNEY BARDWICK
whitney@mp2capital.com

BRIAN C. FRECKMANN
brian@banyansec.com

DAI OWEN
downen@ma.org

LYNN M. ALEXANDER
lynn@lmaconsulting.com

C. SUSIE BERLIN
sberlin@mccarthy.com

DAVID OLIVARES
davido@mid.org

THOMAS S KIMBALL
tomk@mid.org

JOY A. WARREN
joyw@mid.org

BARBARA R. BARKOVICH
brbarkovich@earthlink.net

RICHARD MCCANN
rmccann@umich.edu

DAVID MORSE
demorse@omsoft.com

CALIFORNIA ISO
e-recipient@caiso.com

GRANT A. ROSENBLUM
grosenblum@caiso.com

SAEED FARROKHPAY
saeed.farrokhpay@ferc.gov

DENNIS W. DE CUIR
dennis@ddecur.com

KEVIN DAVIES
kevin@solardevelop.com

DAVID OLIVER
david.oliver@navigantconsulting.com

KIRBY DUSEL
kdusel@navigantconsulting.com

ERIN RANSLOW
cpucrulings@navigantconsulting.com

LAURIE PARK
lpark@navigantconsulting.com

DOUG DAVIE
dougdpucmail@yahoo.com

JEDEDIAH J. GIBSON
jgg@eslawfirm.com

BRUCE MCLAUGHLIN
mclaughlin@braunlegal.com

DANIELLE MATTHEWS SEPERAS
dseperas@calpine.com

PATRICK STONER
pstoner@lgc.org

RYAN BERNARDO
bernardo@braunlegal.com

SCOTT BLAISING
blaising@braunlegal.com

LYNN M. HAUG
lmh@eslawfirm.com

ROB ROTH
rroth@smud.org

MARCO LEMES
mlemes@smud.org

MICHAEL DEANGELIS
mdeange@smud.org

VIKKI WOOD
vwood@smud.org

RICH LAUCKHART
rlauckhart@globalenergy.com

KAREN LINDH
karen@klindh.com

CATHIE ALLEN
californiadockets@pacificorp.com

KYLE L. DAVIS
kyle.l.davis@pacificorp.com

CLARE BREIDENICH
cbreidenich@yahoo.com

DONALD SCHOENBECK
dws@r-c-s-inc.com

TIMOTHY CASTILLE
castille@landsenergy.com

PETER BREHM
pbrehm@infiniacorp.com

Amanda C. Baker
ab1@cpuc.ca.gov

Andrew Schwartz
as2@cpuc.ca.gov

Anne E. Simon
aes@cpuc.ca.gov

Anne Gillette
aeg@cpuc.ca.gov

Beth Moore
blm@cpuc.ca.gov

Brian D. Schumacher
bds@cpuc.ca.gov

PUC/X94283.v1

Burton Mattson
bwm@cpuc.ca.gov

Cathleen A. Fogel
cf1@cpuc.ca.gov

Cheryl Lee
cnl@cpuc.ca.gov

Donald R. Smith
dsh@cpuc.ca.gov

Dorothy Duda
dot@cpuc.ca.gov

Ellen S. LeVine
esl@cpuc.ca.gov

Jaclyn Marks
jm3@cpuc.ca.gov

Julie A. Fitch
jf2@cpuc.ca.gov

Julie Halligan
jmh@cpuc.ca.gov

Louis M. Irwin
lmi@cpuc.ca.gov

Mark R. Loy
mrl@cpuc.ca.gov

Paul Douglas
psd@cpuc.ca.gov

Sara M. Kamins
smk@cpuc.ca.gov

Sean A. Simon
svn@cpuc.ca.gov

SUZANNE KOROSEC
skorosec@energy.state.ca.us

JAMES MCMAHON
JMcMahon@navigantconsulting.com

CLARE LAUFENBERG
claufenb@energy.state.ca.us

HEATHER RAITT
hrait@energy.state.ca.us

KATE ZOCCHETTI
kzocchet@energy.state.ca.us

ROSS MILLER
rmiller@energy.state.ca.us

BILL KNOX
bknox@energy.state.ca.us

HOLLY B. CRONIN
hcronin@water.ca.gov

Service List R.06-03-004
Last Updated 11/8/07

DAVID KOPANS
david.kopans@fatspaniel.com

JEFFERY D. WOLFE
jeff@grosolar.com

JOHN SCHUSTER
john.schuster@utcpower.com

KEITH MCCREA
kmccrea@sablav.com

MICHELLE COURTER
info@solarpathfinder.com

TERENCE PARKER
UNITED SOLAR OVONIC, LLC
3800 LAPEER ROAD
AUBURN HILLS, MI 48326

PACYINZ LYFOUNG
manjusuri@yahoo.com

LORI A. GLOVER
lglover@solidsolar.com

STEVEN D. PATRICK
spatrick@sempra.com

HOWARD CHOY
hchoy@isd.co.la.ca.us

NORMAN A. PEDERSEN
npedersen@hanmor.com

MICHAEL MAZUR
mmazur@3phasesRenewables.com

ROBERT D. HOFFMAN
bob@energydynamix.net

HARVEY M. EDER
PUBLIC SOLAR POWER COALITION
Public Solar Power Coalition
1218 12TH STREET, NO. 25
SANTA MONICA, CA 90401

SUSAN MUNVES
susan.munves@smgov.net

MARY LUEVANO
mluevano@globalgreen.org

PHILLIPE HARTLEY
ph@phatmedia.com

STEVE CHADIMA
steve@energyinnovations.com

DANIEL W. DOUGLASS
douglass@energyattorney.com

AKBAR JAZAYEIRI
akbar.jazayeri@sce.com

AMBER DEAN
amber.dean@sce.com

CASE ADMINISTRATION
Case.Admin@sce.com

MICHAEL D. MONTOYA
mike.montoya@sce.com

R. OLIVIA SAMAD
olivia.samad@sce.com

RONALD MOORE
rkmoore@gswater.com

BRAD BURKE
brad@bradburkearchitect.com

DAVID A. FIELD
dfield@openenergycorp.com

MICHAEL YAMBRACH
michaely@sepcor.net

DAN PERKINS
Dan@EnergySmartHomes.net

THEODORE E. ROBERTS
troberts@sempra.com

ANDREW MCALLISTER
andrew.mcallister@energycenter.org

IRENE M. STILLINGS
irene.stillings@energycenter.org

STEVE RAHON
lschavrien@semprautilities.com

DAVID J. COYLE
ANZA ELECTRIC COOPERATIVE, INC
58470 HIGHWAY 371
ANZA, CA 92539-1909

GENE BECK
gbeck@etfinancial.com

ROD LARSON
rod.larson@sbcglobal.net

JUDY STALEY
legislative@recsolar.com

STUART HALLIN
shallin@recsolar.com

JACQUES DE DEKEN
Jacques@cerox.com

JANIS C. PEPPER
pepper@cleanpowermarkets.com

MARC D. JOSEPH
mdjoseph@adamsbroadwell.com

NINA SUETAKE
nsuetake@turn.org

Diana L. Lee
dil@cpuc.ca.gov

STEPHEN A.S. MORRISON
stephen.morrison@sfgov.org

THERESA L. MUELLER
theresa.mueller@sfgov.org

ERICA MACKIE, P.E.
emackie@gridalternative.org

MATT GOLDEN
matt.golden@sustainablespace.com

EVELYN KAHL
ek@a-klaw.com

SEEMA SRINIVASAN
sls@a-klaw.com

JAMES MCTARNAGHAN
jwmctarnaghan@duanemorris.com

PAUL LACOURCIERE
placourciere@thelen.com

BRIAN T. CRAGG
bcragg@goodinmacbride.com

ENRIQUE GALLARDO
enriqueg@lif.org

JAMES D. SQUERI
jsqueri@goodinmacbride.com

JOSEPH F. WIEDMAN
jwiedman@goodinmacbride.com

MICHAEL B. DAY
mday@goodinmacbride.com

THOMAS J. MACBRIDE, JR.
tmacbride@goodinmacbride.com

JOSEPH M. KARP
jkarp@winston.com

SARAH TUNTLAND
sarahtuntland@yahoo.com

RANDALL J. LITTENEKER
rjl9@pge.com

STACY W. WALTER
sww9@pge.com

SARA STECK MYERS
ssmyers@att.net

LYNNE M. BROWN
l_brown246@hotmail.com

ARNO HARRIS
arno@recurrentenergy.com

H. CLINTON PORTER
cp@kacosolar.com

BRIAN CHERRY
bkc7@pge.com

GRANT KOLLING
grant.kolling@cityofpaloalto.org

ALEXIS K. WODTKE
lex@consumercal.org

ALYSSA NEWMAN
anewman@solarcity.com

GOPAL SHANKER
gopal@recolteenergy.com

SUE KATELEY
info@calseia.org

JOSHUA HARRIS
jharris@volkerlaw.com

LIZ MERRY
lmerry@norcalsolar.org

ERIC LARSEN
elarsen@rcmdigesters.com

GREGG MORRIS
gmorris@emf.net

NONYA COLLIER
nonyac@greenlining.org

ROBERT GNAIZDA
robertg@greenlining.org

THALIA N.C. GONZALEZ
thaliag@greenlining.org

MELISSA W. KASNITZ
general@dralegal.org

JANICE LIN
janice@strategenconsulting.com

J. P. ROSS
jpross@sungevity.com

GARY GERBER
gary@sunlightandpower.com

TOM BEACH
tomb@crossborderenergy.com

STEPHEN MILLER
stephen@seiinc.org

TIM ROSENFELD
tdr-hmw@sbcglobal.net

SUSAN E. BROWN
sebesq@comcast.net

LEIF RONNIE PETTERSSON
ronnie@energyrecommerce.com

RAGHU BELUR
rbelur@enphaseenergy.com

MICHAEL E. BOYD
michaelboyd@sbcglobal.net

JULIE BLUNDEN
julie.blunden@sunpowercorp.com

ROBERT HAMMON
rob@consol.ws

MEGAN MACNEIL MYERS
meganmmyers@yahoo.com

JOHN R. REDDING
johnredding@earthlink.net

MICHAEL KYES
michaelkyes@sbcglobal.net

VINCENT SCHWENT
vschwent@sbcglobal.net

CAROLYN KEHREIN
cmkehrein@ems-ca.com

JOHN JENSEN
jjensen@kirkwood.com

GREGGORY L. WHEATLAND
glw@eslawfirm.com

JAN MCFARLAND
janmcfar@sonic.net

JANE E. LUCKHARDT
jluckhardt@downeybrand.com

JASMIN MARSTON
j.marston@suntechnics.com

KRISTEN F. SOARES
ksoares@usc.edu

LYNN M. HAUG
lmh@eslawfirm.com

WILLIAM W. WESTERFIELD III
www@eslawfirm.com

WILLIAM W. WESTERFIELD, 111
www@eslawfirm.com

CHRISTOPHER T. ELLISON
cte@eslawfirm.com

KAREN NORENE MILLS
kmills@cfbf.com

ANN L. TROWBRIDGE
atrowbridge@daycartermurphy.com

KENT SHELDON
ksheldon@sma-america.com

JESSICA NELSON
notice@psrec.coop

MARK JOHNSON
markgsp@sbcglobal.net

WILLIAM R. SPROULL
bills@clearEdgepower.com

RYAN FLYNN
ryan.flynn@pacificcorp.com

ROGER C. LAUBACHER
rogerlaubacher@pvpowered.com

PETER BREHM
pbrehm@infiniacorp.com

HEATHER HUNT
hfhunt@optonline.net

MICHELLE J. BREYER
michelle.breyer@gs.com

CHRISTOPHER O'BRIEN
obrienc@sharpsec.com

RALPH DENNIS
rdennis@knowledgeinenergy.com

CATHY S. WOOLLUMS
cswoolums@midamerican.com

JAMES ROSS
jimross@r-c-s-inc.com

TRENT A. CARLSON
tcarlson@reliant.com

GARY HINNERS
ghinners@reliant.com

ELIZABETH BAKER
bbaker@summitblue.com

DANIELLE PRALL
dprall@solarpowerinc.net

KIRK STOKES
kstokes@solarpowerinc.net

KEVIN J. SIMONSEN
kjsimonsen@ems-ca.com

ELLEN SHAFNER
eshafner@solel.com

KENNY KLEINERMAN
kennyk@solel.com

ELENA MELLO
emello@sppc.com

TREVOR DILLARD
tdillard@sierrapacific.com

ROBERT L. PETTINATO
robert.pettinato@ladwp.com

CLAY E. FABER
cfaber@semprautilities.com

MARSHALL M. TAYLOR, ESQ.
Marshall.Taylor@dlapiper.com

JOEL DAVIDSON
joel.davidson@sbcglobal.net

ARLEEN NOVOTNEY
akawnov@yahoo.com

DAVID NEMTZOW
david@nemtzw.com

TED BARDACKE
tbardacke@globalgreen.org

RON GARCIA
ron@reenergy.com

STEVE ENDO
sendo@ci.pasadena.ca.us

STEVEN G. LINS
slins@ci.glendale.ca.us

TOM HAMILTON
THAMILTON5@CHARTER.NET

DAVID TOWNLEY
David.Townley@townleytech.com

BRUNO JEIDER
bjeider@ci.burbank.ca.us

ROGER PELOTE
roger.pelote@williams.com

MICHAEL J. PONCE
mponceatty@aol.com

MARTIN KAY
mkay@aqmd.gov

ANNETTE GILLIAM
annette.gilliam@sce.com

JIM LEHRER
james.lehrer@sce.com

PAUL KUBASEK
paul.kubasek@sce.com

ROBERT F. LEMOINE
Robert.F.LeMoine@sce.com

JOY C. YAMAGATA
jyamagata@semprautilities.com

RONALD K. ISHII
rishii@aesc-inc.com

YONAH OFFNER
yonah@powerbreathing.com

LINDA WRAZEN
lwrazen@sempraglobal.com

DONALD C. LIDDELL, PC
liddell@energyattorney.com

MICHAEL SHAMES
mshames@ucan.org

JIM SVEDEMAN
jim@dshsolar.com

ROBERT RYNEARSON
rob@teamryno.com

EPIC INTERN
usdepic@gmail.com

SCOTT J. ANDERS
scottanders@sandiego.edu

CAROL MANSON
CManson@semprautilities.com

CHARLES MANZUK
cmanzuk@semprautilities.com

JENNIFER PORTER
jennifer.porter@energycenter.org

JOHN SUPP
john.supp@energycenter.org

JON BONK-VASKO
jon.bonk-vasko@energycenter.org

NATHALIE OSBORN
nathalie.osborn@energycenter.org

SEPHRA A. NINOW
sephra.ninow@energycenter.org

BOB RAMIREZ
bob.ramirez@itron.com

ORLANDO B. FOOTE
ofoote@hkcflaw.com

ELSTON K. GRUBAUGH
ekgrubaugh@iid.com

DONALD B. ROOKER
donaldrooker@bves.com

TRACEY DRABANT
traceydrabant@bves.com

GEORGE WILTSEE
gwiltsee@dricompanies.com

MWIRIGI IMUNGI
THE ENERGY COALITION
15615 ALTON PARKWAY, SUITE 245
IRVINE, CA 92618

TED FLANIGAN
TFlanigan@EcoMotion.us

DICK LOWRY
LowryD@sharpsec.com

JOHN PERLIN
johnperlin@physics.ucsb.edu

JOSE LANDEROS
jlanderos@proteusinc.org

LAURA FULTZ
lfultz@sbcglobal.net

MARK STOUT
mstout@unlimited-energy.com

CLAIRE BRESSANI- TANKO
cbressanitanko@rsgrp.com

MARI GRUNER
marigruner@yahoo.com

ARTHUR ZINGHER
zingher@ieee.org

MARK MAH
mark.mah@glunetworks.com

JOSH RICHMAN
jrichman@bloomenergy.com

DIANE I. FELLMAN
diane_fellman@fpl.com

Polly N. Shaw
pns@cpuc.ca.gov

FAISAL EL-AZZOUZI
felazzouzi@gridalternatives.org

FRASER D. SMITH
fsmith@sflower.org

MICHAEL A. HYAMS
mhyams@sflower.org

ZACH FRANKLIN
zfranklin@gridalternatives.org

KAREN TERRANOVA
filings@a-klaw.com

SETH HILTON
sdhilton@stoel.com

ASHLEE M. BONDS
abonds@thelen.com

K. SCOTT SON
scott.son@newresourcebank.com

KEVIN FOX
kfox@wsgr.com

LAUREN S. PURNELL
lauren.purnell@pge-corp.com

LUKE TOUGAS
LATc@pge.com

MATT SCULLIN
matt.scullin@newresourcebank.com

DAVID FELIX
david.felix@mmarenew.com

CALIFORNIA ENERGY MARKETS
CEM@newsdata.com

JOSH DAVIDSON
joshdavidson@dwt.com

DAVID HOCHSCHILD
david@pvnow.com

SARA BIRMINGHAM
sara@solaralliance.org

JANICE G. HAMRIN
jhamrin@resource-solutions.org

JOSEPHINE WU
jwwd@pge.com

HEATHER J. RICHMAN
STANFORD UNIVERSITY
FIRST FLOOR
UNIVERSITY OF PUBLIC AFFAIRS
BLDG. 170
STANFORD, CA 94305

PAUL DETERING
paul@tiogaenergy.com

BEN TARBELL
ben@solarcity.com

JACK PIGOTT
jpigott@optisolar.com

TOR ALLEN
cpucsolar@rahus.org

TOM HOFF
tomhoff@clean-power.com

ANDREW J. HORN
andy.vanhorn@vhcenergy.com

SCOTT WAYLAND, P.E.
sewayland@comcast.net

SARAH BESERRA
sbeserra@sbcglobal.net

JOSEPH HENRI
josephhenri@hotmail.com

PATRICIA THOMPSON
pthompson@summitblue.com

TED POPE
ted@energy-solution.com

NEHEMIAH STONE
nehemiah.stone@kema.com

NELLIE TONG
nellie.tong@us.kema.com

KARIN CORFEE
karin.corfee@kema.com

PHILLIP MCLEOD
phillip_mcleod@lecg.com

JODY S. LONDON
jody_london_consulting@earthlink.net

CALIFORNIA INSTITUTE FOR
ENERGY&ENVIRON
ciee@ucop.edu

MRW & ASSOCIATES, INC.
mrw@mrwassoc.com

KEN KRICH
ken.krich@ucop.edu

REED V. SCHMIDT
rschmidt@bartlewells.com

ADAM BRIONES
adamb@greenlining.org

BOBAK ROSHAN
bobakr@greenlining.org

CLIFF CHEN
cchen@ucsusa.org

JESSE W. RASKIN
jesser@greenlining.org

STEPHANIE CHEN
stephaniec@greenlining.org

KARI SMITH
ksmith@powerlight.com

KATE ROWLAND
kate@sunlightandpower.com

SARAH DIAZ
Sarah@sunlightandpower.com

EDWARD VINE
elvine@lbl.gov

GALEN BARBOSE
GLBarbose@LBL.gov

MARCIA W. BECK
mwbeck@lbl.gov

MARK BOLINGER
MABolinger@lbl.gov

NANCY J. PADGETT
NJPadgett@lbl.gov

RYAN WISER
rhwiser@lbl.gov

KAREN NOTSUND
knotsund@berkeley.edu

DAN THOMPSON
Dan.Thompson@SPGSolar.com

ERIC CARLSON
eric.carlson@spgsolar.com

IRIS CHAN
iris.chan@spgsolar.com

JOELENE MONESTIER
joelene.monestier@spgsolar.com

DANA ARMANINO
darmanino@co.marin.ca.us

JULIETTE ANTHONY
juliettea7@aol.com

DAI OWEN
dowen@ma.org

RYAN BENNETT
rb@greenrockcapital.com

JAY LUBOFF
jcluboff@lmi.net

CHAD DICKASON
cdickason@solarcraft.com

ELIZABETH FERRIS
Elizabeth.Ferris@spgsolar.com

BARBARA PICKERING
barbara@earthskysolar.com

C. SUSIE BERLIN
sberlin@mccarthylaw.com

NANCY FOLLY
njfolly@tid.org

NICK CARTER
nick@npcsolar.com

ROB HENRY
rob@dcpower-systems.com

JAN HAEMNNIG
janh@pacpower.biz

RICHARD MCCANN, PH.D
rmccann@umich.edu

DAVID MORSE
demorse@omsoft.com

SAEED FARROKHPAY
saeed.farrokhpay@ferc.gov

KENNETH SWAIN
NAVIGANT CONSULTING, INC.
3100 ZINFANDEL DR., SUITE 600
RANCHO CORDOVA, CA 95670

KIRBY DUSEL
kdusel@navigantconsulting.com

ERIN RANSLOW
cpucrulings@navigantconsulting.com

GORDON PICKERING
gpickering@navigantconsulting.com

LAURIE PARK
lpark@navigantconsulting.com

SCOTT TOMASHEFSKY
scott.tomashefsky@ncpa.com

GEORGE WHITLOW
george@utilityconservationservices.com

KARLY MCCRORY
karly@solardevelop.com

RENEE WEBSTER-HAWKINS
ACTING CHIEF DEPUTY DIRECTOR
DEPT. OF COMMUNITY SERVICES
AND DEVELOP.
Dept. of Community Services and
Development
PO BOX 1947
SACRAMENTO, CA 95812-1947

BERNADETTE DEL CHIARO
bernadette@environmentalcalifornia.org

DAN L. CARROLL
dcarroll@downeybrand.com

DONALD MILLER
d.miller@suntechnics.com

HEATHER DOWLING
h.dowling@suntechnics.com

JASON WIMBLEY
jwimbley@csd.ca.gov

RACHEL MCMAHON
rachel@ceert.org

SCOTT BLAISING
blaising@braunlegal.com

SMITA GUPTA
Sgupta@energy.state.ca.us

MARK RAWSON
mrawson@smud.org

STEPHEN FRANTZ
sfrantz@smud.org

MATT TENNIS
abcstatelobbyist@sbcglobal.net

KAREN LINDH
karen@kclindh.com

THOMAS P. TENORIO
Tenorio@sunset.net

JIM MASKREY
jmaskrey@sopogy.com

DONALD BROOKHYSER
deb@a-klaw.com

CATHIE ALLEN
californiadockets@pacificorp.com

KYLE L. DAVIS
kyle.l.davis@pacificorp.com

GEORGE SIMONS
George.Simons@itron.com

PATRICK LILLY
patrick.lilly@itron.com

JACK BURKE
jack.burke@energycenter.org

Amy Reardon
arr@cpuc.ca.gov

Andrew Schwartz
as2@cpuc.ca.gov

Anne E. Simon
aes@cpuc.ca.gov

Christine S. Tam
tam@cpuc.ca.gov

Donald R. Smith
dsh@cpuc.ca.gov

Dorothy Duda
dot@cpuc.ca.gov

Jaclyn Marks
jm3@cpuc.ca.gov

Jane Whang
jjw@cpuc.ca.gov

Jay Morse
jxm@cpuc.ca.gov

Jeanne Clinton
cln@cpuc.ca.gov

Judith Ikle
jci@cpuc.ca.gov

Julie A. Fitch
jf2@cpuc.ca.gov

Lisa Paulo
lp1@cpuc.ca.gov

Maryam Ebke
meh@cpuc.ca.gov

Melicia Charles
mvc@cpuc.ca.gov

Merideth Sterkel
mts@cpuc.ca.gov

Nicolas L. Chaset
nlc@cpuc.ca.gov

Pamela Wellner
pw1@cpuc.ca.gov

Paul Douglas
psd@cpuc.ca.gov

Shayle Kann
sk2@cpuc.ca.gov

Terrie D. Prosper
tdp@cpuc.ca.gov

PHILIP D. PETTINGILL
ppettingill@caiso.com

MICHAEL SCHEIBLE
mscheibl@arb.ca.gov

GARY M. YEE
gyee@arb.ca.gov

CALIFORNIA ENVIRONMENTAL
PROTECTION
PO BOX 2815
SACRAMENTO, CA 95812-2815

Bryan Crabb
brd@cpuc.ca.gov

Don Schultz
dks@cpuc.ca.gov

EDWARD RANDOLPH
edward.randolph@asm.ca.gov

PAYAM NARVAND
pnarvand@energy.state.ca.us

RAND BERKE
rberke@csd.ca.gov

SANFORD MILLER
smiller@energy.state.ca.us

Zaida Amaya-Pineda
zca@cpuc.ca.gov

PUC/X94276.v1

Service List R.06-04-009
Last Updated 11/9/07

CINDY ADAMS
cadams@covantaenergy.com

STEVEN S. SCHLEIMER
steven.schleimer@barclayscapital.com

STEVEN HUHMAN
steven.huhman@morganstanley.com

RICK C. NOGER
rick_noger@praxair.com

KEITH R. MCCREA
keith.mccrea@sablaw.com

ADAM J. KATZ
ajkatz@mwe.com

CATHERINE M. KRUPKA
ckrupka@mwe.com

LISA M. DECKER
lisa.decker@constellation.com

CATHY S. WOOLLUMS
cswoollums@midamerican.com

KEVIN BOUDREAUX
kevin.boudreaux@calpine.com

THOMAS DILL
trdill@westernhubs.com

E.J. WRIGHT
ej_wright@oxy.com

PAUL M. SEBY
pseby@mckennalong.com

TIMOTHY R. ODIL
todil@mckennalong.com

STEPHEN G. KOERNER, ESQ.
steve.koerner@elpaso.com

JENINE SCHENK
jenine.schenk@apses.com

JOHN B. WELDON, JR.
jbw@slwplc.com

KELLY BARR
kelly.barr@srpnet.com

ROBERT R. TAYLOR
rrtaylor@srpnet.com

STEVEN S. MICHEL
smichel@westernresources.org

ROGER C. MONTGOMERY
roger.montgomery@swgas.com

LORRAINE PASKETT
Lorraine.Paskett@ladwp.com

RONALD F. DEATON
ron.deaton@ladwp.com

SID NEWSOM
snewsom@semprautilities.com

DAVID L. HUARD
dhuard@manatt.com

CURTIS L. KEBLER
curtis.kebler@gs.com

DENNIS M.P. EHLING
dehling@kling.com

GREGORY KOISER
gregory.koiser@constellation.com

NORMAN A. PEDERSEN
npedersen@hanmor.com

MICHAEL MAZUR
mmazur@3phasesRenewables.com

VITALY LEE
vitaly.lee@aes.com

TIFFANY RAU
tiffany.rau@bp.com

GREGORY KLATT
klatt@energyattorney.com

RICHARD HELGESON
rhelgeson@sccpa.org

DANIEL W. DOUGLASS
douglass@energyattorney.com

PAUL DELANEY
pssed@adelphia.net

AKBAR JAZAYEIRI
akbar.jazayeri@sce.com

ANNETTE GILLIAM
annette.gilliam@sce.com

CATHY A. KARLSTAD
cathy.karlstad@sce.com

LAURA I. GENAO
Laura.Genao@sce.com

RONALD MOORE
rkmoore@gswater.com

DON WOOD
dwood8@cox.net

AIMEE M. SMITH
amsmith@sempra.com

ALLEN K. TRIAL
atrial@sempra.com

ALVIN PAK
apak@sempraglobal.com

DAN HECHT
dhecht@sempratrading.com

DANIEL A. KING
daking@sempra.com

SYMONE VONGDEUANE
svongdeuane@semprasolutions.com

THEODORE ROBERTS
troberts@sempra.com

DONALD C. LIDDELL, P.C.
liddell@energyattorney.com

MARCIE MILNER
marcie.milner@shell.com

REID A. WINTHROP
rwinthrop@pilotpowergroup.com

THOMAS DARTON
tdarton@pilotpowergroup.com

STEVE RAHON
lschavrien@semprautilities.com

GLORIA BRITTON
GloriaB@anzaelectric.org

LYNELLE LUND
llund@commerceenergy.com

TAMLYN M. HUNT
thunt@cecmail.org

DIANE I. FELLMAN
diane_fellman@fpl.com

JEANNE M. SOLE
jeanne.sole@sfgov.org

JOHN P. HUGHES
john.hughes@sce.com

LAD LORENZ
llorenz@semprautilities.com

MARCEL HAWIGER
marcel@turn.org

NINA SUETAKE
nsuetake@turn.org

Diana L. Lee
dil@cpuc.ca.gov

F. Jackson Stoddard
fjs@cpuc.ca.gov

AUDREY CHANG
achang@nrdc.org

DONALD BROOKHYSER
rsa@a-klaw.com

EVELYN KAHL
ek@a-klaw.com

KRISTIN GRENFELL
kgrenfell@nrdc.org

MICHAEL P. ALCANTAR
mpa@a-klaw.com

SEEMA SRINIVASAN
sls@a-klaw.com

WILLIAM H. CHEN
bill.chen@constellation.com

BRIAN K. CHERRY
bkc7@pge.com

EDWARD G POOLE
epoole@adplaw.com

ANN G. GRIMALDI
agrimaldi@mckennalong.com

BRIAN T. CRAGG
bcragg@goodinmacbride.com

JAMES D. SQUERI
jsqueri@gmssr.com

JEANNE B. ARMSTRONG
jarmstrong@goodinmacbride.com

KAREN BOWEN
kbowen@winston.com

LISA A. COTTLE
lcottle@winston.com

SEAN P. BEATTY
sbeatty@cwclaw.com

VIDHYA PRABHAKARAN
vprabhakaran@goodinmacbride.com

JOSEPH M. KARP
jkarp@winston.com

JEFFREY P. GRAY
jeffgray@dwt.com

CHRISTOPHER J. WARNER
cjw5@pge.com

SARA STECK MYERS
ssmyers@att.net

LARS KVALE
lars@resource-solutions.org

ANDREW L. HARRIS
alho@pge.com

ANDREA WELLER
aweller@sel.com

JENNIFER CHAMBERLIN
jchamberlin@strategicenergy.com

BETH VAUGHAN
beth@beth411.com

KERRY HATTEVIK
kerry.hattevik@mirant.com

AVIS KOWALEWSKI
kowalewskia@calpine.com

WILLIAM H. BOOTH
wbooth@booth-law.com

J. ANDREW HOERNER
hoerner@redefiningprogress.org

JANILL RICHARDS
janill.richards@doj.ca.gov

CLIFF CHEN
cchen@ucsusa.org

GREGG MORRIS
gmorris@emf.net

R. THOMAS BEACH
tomb@crossborderenergy.com

KENNETH C. JOHNSON
kjinnovation@earthlink.net

BARRY F. MCCARTHY
bmcc@mccarthy.com

C. SUSIE BERLIN
sberlin@mccarthy.com

MIKE LAMOND
Mike@alpinenaturalgas.com

JOY A. WARREN
joyw@mid.org

UDI HELMAN
UHelman@caiso.com

JOHN JENSEN
jjensen@kirkwood.com

MARY LYNCH
mary.lynych@constellation.com

LEONARD DEVANNA
lrdevanna-rf@cleanenergysystems.com

ANDREW BROWN
abb@eslawfirm.com

BRUCE MCLAUGHLIN
mclaughlin@braunlegal.com

GREGGORY L. WHEATLAND
glw@eslawfirm.com

JANE E. LUCKHARDT
jluckhardt@downeybrand.com

JEFFERY D. HARRIS
jdh@eslawfirm.com

VIRGIL WELCH
vwelch@environmentaldefense.org

WILLIAM W. WESTERFIELD, 111
www@eslawfirm.com

DOWNEY BRAND
DOWNEY BRAND
Sacramento Municipal
555 CAPITOL MALL, 10TH FLOOR
SACRAMENTO, CA 95814-4686

RAYMOND J. CZAHR, C.P.A.
westgas@aol.com

STEVEN M. COHN
scohn@smud.org

ANN L. TROWBRIDGE
atrowbridge@daycartermurphy.com

DAN SILVERIA
dansvec@hdo.net

JESSICA NELSON
notice@psrec.coop

DONALD BROOKHYSER
deb@a-klaw.com

CYNTHIA SCHULTZ
cynthia.schultz@pacificcorp.com

KYLE L. DAVIS
kyle.l.davis@pacificcorp.com

RYAN FLYNN
ryan.flynn@pacificcorp.com

IAN CARTER
carter@ieta.org

JASON DUBCHAK
jason.dubchak@niskags.com

BRIAN M. JONES
bjones@mjbardley.com

MATTHEW MOST
EDISON MISSION MARKETING &
TRADING, INC.
160 FEDERAL STREET
BOSTON, MA 02110-1776

KENNETH A. COLBURN
kcolburn@symbioticstrategies.com

RICHARD COWART
rapcowart@aol.com

KATHRYN WIG
Kathryn.Wig@nrgenergy.com

SAKIS ASTERIADIS
sasteriadis@apx.com

GEORGE HOPLEY
george.hopley@barcap.com

ELIZABETH ZELLJADT
ez@pointcarbon.com

DALLAS BURTRAW
burtraw@rff.org

VERONIQUE BUGNION
vb@pointcarbon.com

KYLE D. BOUDREAUX
kyle_boudreaux@fpl.com

ANDREW BRADFORD
andrew.bradford@constellation.com

GARY BARCH
gbarch@knowledgeinenergy.com

RALPH E. DENNIS
ralph.dennis@constellation.com

SAMARA MINDEL
smindel@knowledgeinenergy.com

BARRY RABE
brabe@umich.edu

BRIAN POTTS
bpotts@foley.com

JAMES W. KEATING
james.keating@bp.com

CYNTHIA A. FONNER
Cynthia.A.Fonner@constellation.com

JAMES ROSS
jimross@r-c-s-inc.com

TRENT A. CARLSON
tcarlson@reliant.com

GARY HINNERS
ghinners@reliant.com

JEANNE ZAIONTZ
zaiontj@bp.com

JULIE L. MARTIN
julie.martin@bp.com

FIJI GEORGE
fiji.george@elpaso.com

ED CHIANG
echiang@elementmarkets.com

FRANK STERN
fstern@summitblue.com

NADAV ENBAR
nenbar@energy-insights.com

NICHOLAS LENSSEN
nlenssen@energy-insights.com

ELIZABETH BAKER
bbaker@summitblue.com

WAYNE TOMLINSON
william.tomlinson@elpaso.com

KEVIN J. SIMONSEN
kjsimonsen@ems-ca.com

SANDRA ELY
Sandra.ely@state.nm.us

BRIAN MCQUOWN
bmcquown@reliant.com

DOUGLAS BROOKS
dbrooks@nevpc.com

ANITA HART
anita.hart@swgas.com

RANDY SABLE
randy.sable@swgas.com

BILL SCHRAND
bill.schrand@swgas.com

JJ PRUCNAL
jj.prucnal@swgas.com

SANDRA CAROLINA
sandra.carolina@swgas.com

CYNTHIA MITCHELL
ckmitchell1@sbcglobal.net

CHRISTOPHER A. HILEN
chilen@sppc.com

ELENA MELLO
emello@sppc.com

TREVOR DILLARD
tdillard@sierrapacific.com

DARRELL SOYARS
dsoyars@sppc.com

JOSEPH GRECO
jgreco@caithnessenergy.com

FRANK LUCHETTI
fluchetti@ndep.nv.gov

LEILANI JOHNSON KOWAL
leilani.johnson@ladwp.com

RANDY S. HOWARD
randy.howard@ladwp.com

ROBERT K. ROZANSKI
Robert.Rozanski@ladwp.com

ROBERT L. PETTINATO
robert.pettinato@ladwp.com

HUGH YAO
HYao@SempraUtilities.com

RASHA PRINCE
rprince@semprautilities.com

RANDALL W. KEEN
rkeen@manatt.com

S. NANCY WHANG
nwhang@manatt.com

PETER JAZAYERI
pjazayeri@stroock.com

DEREK MARKOLF
derek@climateregistry.org

DAVID NEMTZOW
david@nemtzw.com

HARVEY EDER
harveyederpspc.org@hotmail.com

STEVE ENDO
sendo@ci.pasadena.ca.us

STEVEN G. LINS
slins@ci.glendale.ca.us

TOM HAMILTON
THAMILTON5@CHARTER.NET

BRUNO JEIDER
bjeider@ci.burbank.ca.us

RICHARD J. MORILLO
rmorillo@ci.burbank.ca.us

ROGER PELOTE
roger.pelote@williams.com

AIMEE BARNES
aimee.barnes@ecosecurities.com

CASE ADMINISTRATION
case.admin@sce.com

TIM HEMIG
tim.hemig@nrgenergy.com

BARRY LOVELL
bjl@bry.com

ALDYN HOEKSTRA
aldyn.hoekstra@paceglobal.com

YVONNE GROSS
ygross@sempraglobal.com

JOHN LAUN
jlaun@apogee.net

KIM KIENER
kмкиener@fox.net

SCOTT J. ANDERS
scottanders@sandiego.edu

JOSEPH R. KLOBERDANZ
jkloberdanz@semprautilities.com

ANDREW MCALLISTER
andrew.mcallister@energycenter.org

JACK BURKE
jack.burke@energycenter.org

JENNIFER PORTER
jennifer.porter@energycenter.org

SEPHRA A. NINOW
sephra.ninow@energycenter.org

DESPINA NIEHAUS
dniehaus@semprautilities.com

JOHN W. LESLIE
jleslie@luce.com

ORLANDO B. FOOTE, III
ofoote@hkcf-law.com

ELSTON K. GRUBAUGH
ekgrubaugh@iid.com

THOMAS MCCABE
EDISON MISSION ENERGY
18101 VON KARMAN AVE., SUITE
1700
IRVINE, CA 92612

JAN PEPPER
pepper@cleanpowermarkets.com

GLORIA D. SMITH
gsmith@adamsbroadwell.com

MARC D. JOSEPH
mdjoseph@adamsbroadwell.com

HAYLEY GOODSON
hayley@turn.org

MICHEL FLORIO
mflorio@turn.org

DAN ADLER
Dan.adler@calcef.org

MICHAEL A. HYAMS
mhyams@swater.org

THERESA BURKE
tburke@swater.org

NORMAN J. FURUTA
norman.furuta@navy.mil

AMBER MAHONE
amber@ethree.com

ANNABELLE MALINS
annabelle.malins@fco.gov.uk

DEVRA WANG
dwang@nrdc.org

KAREN TERRANOVA
filings@a-klaw.com

NORA SHERIFF
nes@a-klaw.com

OLOF BYSTROM
obystrom@cera.com

SETH HILTON
sdhilton@stoel.com

SHERYL CARTER
scarter@nrdc.org

ASHLEE M. BONDS
abonds@thelen.com

CARMEN E. BASKETTE
cbaskette@enernoc.com

COLIN PETHERAM
colin.petheram@att.com

JAMES W. TARNAGHAN
jwmctarnaghan@duanemorris.com

KEVIN FOX
kfox@wsgr.com

KHURSHID KHOJA
kkhoja@thelenreid.com

PETER V. ALLEN
pvallen@thelen.com

SHERIDAN J. PAUKER
spauker@wsgr.com

ROBERT J. REINHARD
reinhard@mofo.com

CALIFORNIA ENERGY MARKETS
cem@newsdata.com

HOWARD V. GOLUB
hgolub@nixonpeabody.com

JANINE L. SCANCARELLI
jscancarelli@flk.com

JOSEPH F. WIEDMAN
jwiedman@goodinmacbride.com

MARTIN A. MATTES
mmattes@nossaman.com

JEN MCGRAW
jen@cnt.org

LISA WEINZIMER
lisa_weinzimer@platts.com

STEVEN MOSS
steven@moss.net

SHAUN ELLIS
sellis@fypower.org

ARNO HARRIS
arno@recurrentenergy.com

ED LUCHA
ELL5@pge.com

GRACE LIVINGSTON-NUNLEY
gx12@pge.com

JASMIN ANSAR
jxa2@pge.com

JONATHAN FORRESTER
JDF1@PGE.COM

RAYMOND HUNG
RHHJ@pge.com

SEBASTIEN CSAPO
sscb@pge.com

SOUMYA SASTRY
svs6@pge.com

STEPHANIE LA SHAWN
S1L7@pge.com

VALERIE J. WINN
vjw3@pge.com

KARLA DAILEY
karla.dailey@cityofpaloalto.org

FARROKH ALBUYEH
farrokh.albuyeh@oati.net

DEAN R. TIBBS
dtibbs@aes4u.com

JEFFREY L. HAHN
jhahn@covantaenergy.com

ANDREW J. VAN HORN
andy.vanhorn@vhcenergy.com

JOSEPH M. PAUL
Joe.paul@dynegy.com

SUE KATELEY
info@calseia.org

GREG BLUE
gblue@enxco.com

SARAH BESERRA
sbeserra@sbcglobal.net

MONICA A. SCHWEBS, ESQ.
monica.schwebs@bingham.com

PETER W. HANSCHEN
phansch@mofo.com

JOSEPH HENRI
josephhenri@hotmail.com

PATRICIA THOMPSON
pthompson@summitblue.com

WILLIAM F. DIETRICH
dietrichlaw2@earthlink.net

BETTY SETO
Betty.Seto@kema.com

GERALD L. LAHR
JerryL@abag.ca.gov

JODY S. LONDON
jody_london_consulting@earthlink.net

STEVEN SCHILLER
steve@schiller.com

MRW & ASSOCIATES, INC.
mrw@mrwassoc.com

REED V. SCHMIDT
rschmidt@bartlewells.com

ADAM BRIONES
adamb@greenlining.org

STEVE KROMER
stevek@kromer.com

CLYDE MURLEY
clyde.murley@comcast.net

BRENDA LEMAY
brenda.lemay@horizonwind.com

CARLA PETERMAN
carla.peterman@gmail.com

EDWARD VINE
elvine@lbl.gov

RYAN WISER
rhwiser@lbl.gov

CHRIS MARNAY
C_Marnay@1b1.gov

PHILLIP J. MULLER
philm@scdenergy.com

RITA NORTON
rita@ritanortonconsulting.com

CARL PECHMAN
cpechman@powereconomics.com

MAHLON ALDRIDGE
emahlon@ecoact.org

RICHARD SMITH
richards@mid.org

ROGER VAN HOY
rogerv@mid.org

THOMAS S. KIMBALL
tomk@mid.org

WES MONIER
fwmonier@tid.org

BARBARA R. BARKOVICH
brbarkovich@earthlink.net

JOHN R. REDDING
johnredding@earthlink.net

CLARK BERNIER
clark.bernier@rlw.com

RICHARD MCCANN, PH.D
rmccann@umich.edu

CAROLYN M. KEHREIN
cmkehrein@ems-ca.com

CALIFORNIA ISO
e-recipient@caiso.com

GRANT ROSENBLUM, ESQ.
grosenblum@caiso.com

KAREN EDSON
151 BLUE RAVINE ROAD
FOLSOM, CA 95630

ROBIN SMUTNY-JONES
rsmutny-jones@caiso.com

SAEED FARROKHPAY
saeed.farrokhpay@ferc.gov

DAVID BRANCHCOMB
david@branchcomb.com

KENNY SWAIN
kenneth.swain@navigantconsulting.com

KIRBY DUSEL
kdusel@navigantconsulting.com

GORDON PICKERING
gpickering@navigantconsulting.com

LAURIE PARK
lpark@navigantconsulting.com

DAVID REYNOLDS
davidreynolds@ncpa.com

SCOTT TOMASHEFSKY
scott.tomashefsky@ncpa.com

ELLEN WOLFE
ewolfe@resero.com

AUDRA HARTMANN
Audra.Hartmann@Dynergy.com

BOB LUCAS
Bob.lucas@calobby.com

CURT BARRY
curt.barry@iwpnews.com

DAN SKOPEC
danskopec@gmail.com

DANIELLE MATTHEWS SEPERAS
dseperas@calpine.com

DAVID L. MODISETTE
dave@ppallc.com

DOUGLAS K. KERNER
dkk@eslawfirm.com

JUSTIN C. WYNNE
wynne@braunlegal.com

KASSANDRA GOUGH
kgough@calpine.com

KELLIE SMITH
kellie.smith@sen.ca.gov

KEVIN WOODRUFF
kdw@woodruff-expert-services.com

MICHAEL WAUGH
mwaugh@arb.ca.gov

PANAMA BARTHOLOMY
pbarthol@energy.state.ca.us

PATRICK STONER
pstoner@lgc.org

RACHEL MCMAHON
rachel@ceert.org

RYAN BERNARDO
bernardo@braunlegal.com

STEVEN A. LIPMAN
steven@lipmanconsulting.com

STEVEN KELLY
steven@iepa.com

WEBSTER TASAT
wtasat@arb.ca.gov

EDWARD J. TIEDEMANN
etiedemann@kmtg.com

LAURIE TEN HOPE
ltenhope@energy.state.ca.us

JOSHUA BUSHINSKY
bushinskyj@pewclimate.org

LYNN HAUG
lmh@eslawfirm.com

OBADIAH BARTHOLOMY
obartho@smud.org

BUD BEEBE
bbeebe@smud.org

BALWANT S. PUREWAL
bpurewal@water.ca.gov

DOUGLAS MACMULLLEN
dmacml@water.ca.gov

KAREN NORENE MILLS
kmills@cbbf.com

KAREN LINDH
karen@klindh.com

ELIZABETH W. HADLEY
ehadley@reupower.com

DENISE HILL
Denise_Hill@transalta.com

ANNIE STANGE
sas@a-klaw.com

ELIZABETH WESTBY
egw@a-klaw.com

ALEXIA C. KELLY
akelly@climatetrust.org

ALAN COMNES
alan.comnes@nrgenergy.com

KYLE SILON
kyle.silon@ecosecurities.com

CATHIE ALLEN
californiadockets@pacificcorp.com

PHIL CARVER
Philip.H.Carver@state.or.us

SAM SADLER
samuel.r.sadler@state.or.us

LISA SCHWARTZ
lisa.c.schwartz@state.or.us

CLARE BREIDENICH
cbreidenich@yahoo.com

DONALD SCHOENBECK
dws@r-c-s-inc.com

JESUS ARREDONDO
jesus.arredondo@nrgenergy.com

CHARLIE BLAIR
charlie.blair@delta-ee.com

KAREN MCDONALD
karen.mcdonald@powerex.com

CLARENCE BINNINGER
clarence.binninger@doj.ca.gov

DAVID ZONANA
david.zonana@doj.ca.gov

Andrew Campbell
agc@cpuc.ca.gov

Anne Gillette
aeg@cpuc.ca.gov

Beth Moore
blm@cpuc.ca.gov

Cathleen A. Fogel
cf1@cpuc.ca.gov

Charlotte TerKeurst
cft@cpuc.ca.gov

Christine S. Tam
tam@cpuc.ca.gov

Donald R. Smith
dsh@cpuc.ca.gov

Ed Moldavsky
edm@cpuc.ca.gov

Eugene Cadenasso
cpe@cpuc.ca.gov

Harvey Y. Morris
hym@cpuc.ca.gov

Henry Stern
hs1@cpuc.ca.gov

Jaclyn Marks
jm3@cpuc.ca.gov

Jacqueline Greig
jnm@cpuc.ca.gov

Jamie Fordyce
jbf@cpuc.ca.gov

Jason R. Salmi Klotz
jk1@cpuc.ca.gov

George S. Tagnipes
jst@cpuc.ca.gov

Joel T. Perlstein
jtp@cpuc.ca.gov

Jonathan Lakritz
jol@cpuc.ca.gov

Judith Ikle
jci@cpuc.ca.gov

Julie A. Fitch
jf2@cpuc.ca.gov

Kristin Ralff Douglas
krd@cpuc.ca.gov

Lainie Motamedi
lrm@cpuc.ca.gov

Lana Tran
lta@cpuc.ca.gov

Matthew Deal
mjd@cpuc.ca.gov

Nancy Ryan
ner@cpuc.ca.gov

Pamela Wellner
pw1@cpuc.ca.gov

Paul S. Phillips
psp@cpuc.ca.gov

Pearlie Sabino
pzs@cpuc.ca.gov

Rahmon Momoh
rmm@cpuc.ca.gov

Richard A. Myers
ram@cpuc.ca.gov

Sara M. Kamins
smk@cpuc.ca.gov

Scott Murtishaw
sgm@cpuc.ca.gov

Sean A. Simon
svn@cpuc.ca.gov

Steve Roscow
scr@cpuc.ca.gov

Theresa Cho
tcx@cpuc.ca.gov

BILL LOCKYER
ken.alex@doj.ca.gov

KEN ALEX
ken.alex@doj.ca.gov

BALDASSARO DI CAPO
bdicapo@caiso.com

JUDITH B. SANDERS
jsanders@caiso.com

JULIE GILL
jgill@caiso.com

MARY MCDONALD
DIRECTOR OF STATE AFFAIRS
CALIFORNIA INDEPENDENT SYSTEM
OPERATOR
CAISO
151 BLUE RAVINE ROAD
FOLSOM, CA 95630

PHILIP D. PETTINGILL
ppettingill@caiso.com

MICHAEL SCHEIBLE
mscheibl@arb.ca.gov

EVAN POWERS
epowers@arb.ca.gov

JEFFREY DOLL
jdoll@arb.ca.gov

PAM BURMICH
pburmich@arb.ca.gov

B. B. BLEVINS
bblevins@energy.state.ca.us

DARYL METZ
dmetz@energy.state.ca.us

DEBORAH SLON
deborah.slon@doj.ca.gov

Don Schultz
dks@cpuc.ca.gov

KAREN GRIFFIN
kgriffin@energy.state.ca.us

LISA DECARLO
ldecarlo@energy.state.ca.us

MARC PRYOR
mpryor@energy.state.ca.us

MICHELLE GARCIA
mgarcia@arb.ca.gov

PIERRE H. DUVAIR
pduvair@energy.state.ca.us

Wade McCartney
wsm@cpuc.ca.gov

CAROL J. HURLOCK
hurlock@water.ca.gov

HOLLY B. CRONIN
hcronin@water.ca.gov

PUC/X94281.v1

Service List R.06-05-027
Last Updated 11/9/07

ENERGY AMERICA, LLC
ONE STAMFORD PLAZA, 8TH FLOOR
263 TRESSER BLVD.
STAMFORD, CT 6901

DANIEL V. GULINO
dgulino@ridgewoodpower.com

RICK C. NOGER
rick_noger@praxair.com

KEITH MC CREA
keith.mccrea@sablaw.com

CAROL A. SMOOTS
csmoots@perkinscoie.com

RHONE RESCH
rresch@seia.org

GARSON KNAPP
garson_knapp@fpl.com

STEVEN SIEGEL
ssiegel@biologicaldiversity.org

KEVIN BOUDREAUX
kevin.boudreaux@calpine.com

ELIZABETH WRIGHT
ej_wright@oxy.com

STACY AGUAYO
stacy.aguayo@apses.com

ROBERT NICHOLS
rsnichol@srpnet.com

DAVID SAUL
dsaul@pacificsolar.net

RASHA PRINCE
rprince@semprautilities.com

DAVID L. HUARD
dhuard@manatt.com

RANDALL W. KEEN
rkeen@manatt.com

NORMAN A. PEDERSEN
npedersen@hanmor.com

3 PHASES ENERGY SERVICES
energy@3phases.com

MICHAEL MAZUR
mmazur@3phasesRenewables.com

SUSAN MUNVES
susan.munves@smgov.net

DANIEL W. DOUGLASS
douglass@energyattorney.com

GREGORY S. G. KLATT
klatt@energyattorney.com

PAUL DELANEY
pssed@adelphia.net

CATHY A. KARLSTAD
cathy.karlstad@sce.com

MICHAEL D. MONTOYA
mike.montoya@sce.com

WILLIAM V. WALSH
william.v.walsh@sce.com

SOCAL WATER/BEAR VALLEY
ELECTRIC
kswitzer@gswater.com

RONALD MOORE
rkmoore@gswater.com

ANN MOORE
amoore@ci.chula-vista.ca.us

MICHAEL MEACHAM
ENVIRONMENTAL RESOURCE
MANAGER
CITY OF CHULA VISTA
276 FOURTH AVENUE
CHULA VISTA, CA 91910

STRATEGIC ENERGY, LTD.
customerrelations@sel.com

AIMEE M. SMITH
amsmith@sempra.com

FREDERICK M. ORTLIEB
fortlieb@sandiego.gov

SEMPRA ENERGY SOLUTIONS
email@semprasolutions.com

GREG BASS
gbass@semprasolutions.com

SYMONE VONGDEUANE
svongdeuane@semprasolutions.com

THEODORE E. ROBERTS
troberts@sempra.com

DONALD C. LIDDELL
liddell@energyattorney.com

MARCIE MILNER
marcie.milner@shell.com

REID WINTHROP
rwinthrop@pilotpowergroup.com

THOMAS R. DARTON
tdarton@pilotpowergroup.com

GLORIA BRITTON
GloriaB@anzaelectric.org

LYNELLE LUND
llund@commerceenergy.com

ROB GUNNIN
rgunnin@commerceenergy.com

WILL PLAXICO
wplaxico@heliosenergy.us

AOL UTILITY CORP.
lalehs101@hotmail.com

KERRY EDEN
kerry.eden@ci.corona.ca.us

PHILLIP REESE
phil@reesechambers.com

TAMLYN M. HUNT
thunt@cecmail.org

JOSEPH LANGENBERG
Joe.Langenberg@gmail.com

DAVID ORTH
dorth@krcd.org

JANE H. TURNBULL
jturnbu@ix.netcom.com

JANIS C. PEPPER
pepper@cleanpowermarkets.com

BRUCE FOSTER
bruce.foster@sce.com

MARCEL HAWIGER
marcel@turn.org

Gretchen T. Dumas
gtd@cpuc.ca.gov

STEPHEN A.S. MORRISON
stephen.morrison@sfgov.org

EVELYN KAHL
ek@a-klaw.com

ROD AOKI
rsa@a-klaw.com

ARTHUR HAUBENSTOCK
alhj@pge.com

CHARLES MIDDLEKAUFF
crmd@pge.com

CRAIG M. BUCHSBAUM
cmb3@pge.com

EDWARD V. KURZ
evk1@pge.com

EVELYN C. LEE
ecl8@pge.com

JEANNE MCKINNEY
THELEN REID BROWN RAYSMAN &
STEINER
101 SECOND STREET, SUITE 1800
SAN FRANCISCO, CA 94105

WILLIAM H. CHEN
bill.chen@constellation.com

BRIAN CRAGG
bcragg@goodinmacbride.com

JAMES D. SQUERI
jsqueri@goodinmacbride.com

JOSEPH M. KARP
jkarp@winston.com

JEFFREY P. GRAY
jeffgray@dwt.com

SARA STECK MYERS
ssmyers@worldnet.att.net

ARNO HARRIS
arno@recurrentenergy.com

GABE PETLIN
gpetlin@3degreesinc.com

JANICE G. HAMRIN
jhamrin@resource-solutions.org

JENNIFER CHAMBERLIN
jchamberlin@strategicenergy.com

JOHN DUTCHER
ralf1241a@cs.com

WILLIAM H. BOOTH
wbooth@booth-law.com

AVIS KOWALEWSKI
kowalewskia@calpine.com

LINDA Y. SHERIF
sherifl@calpine.com

JODY LONDON
jody_london_consulting@earthlink.net

ERIC LARSEN
elarsen@rcmdigesters.com

GREGG MORRIS
gmorris@emf.net

NEAL DE SNOO
ndesnoo@ci.berkeley.ca.us

CLYDE MURLEY
clyde.murley@comcast.net

JP ROSS
jpross@sungevity.com

NANCY RADER
nrader@calwea.org

R. THOMAS BEACH
tomb@crossborderenergy.com

L. JAN REID
janreid@coastecon.com

MEGAN MACNEIL MYERS
meganmmyers@yahoo.com

JOHN R. REDDING
johnredding@earthlink.net

JAMES WEIL
jweil@aglet.org

CAROLYN KEHREIN
cmkehrein@ems-ca.com

JUDITH SANDERS
jsanders@caiso.com

ANDY WUELLNER
MOUNTAIN UTILITIES
PO BOX 1
KIRKWOOD, CA 95646

KIRBY DUSEL
kdusel@navigantconsulting.com

JOHN DALESSI
jdalessi@navigantconsulting.com

ANDREW B. BROWN
abb@eslawfirm.com

DAN GEIS
dgeis@dolphingroup.org

DAN L. CARROLL
dcarroll@downeybrand.com

DAVID A. BISCHEL
davidb@cwo.com

JAN MCFARLAND
janmcfar@sonic.net

JOHN B. HOFMANN
jhofmann@rsrcnet.org

WILLIAM W. WESTERFIELD III
www@eslawfirm.com

LYNN M. HAUG
lmh@eslawfirm.com

KAREN NORENE MILLS
kmills@cfbf.com

JESSICA NELSON
notice@psrec.coop

RYAN FLYNN
ryan.flynn@pacificcorp.com

KAREN MCDONALD
karen.mcdonald@powerex.com

WILLIAM P. SHORT
bshort@ridgewoodpower.com

STEVEN S. SCHLEIMER
steven.schleimer@barclayscapital.com

CHRISTOPHER O'BRIEN
obrienc@sharpsec.com

VENKAT SURAVARAPU
vsuravarapu@cera.com

KEVIN PORTER
porter@exeterassociates.com

TODD JAFFE
tjaffe@energybusinessconsultants.com

RALPH E. DENNIS
ralph.dennis@constellation.com

CATHY S. WOOLLUMS
cswoollums@midamerican.com

JASON ABIECUNAS
abiecunasjp@bv.com

ANN HENDRICKSON
ahendrickson@commerceenergy.com

TRENT A. CARLSON
tcarlson@reliant.com

ED CHIANG
echiang@elementmarkets.com

JONATHAN JACOBS
jon.jacobs@paconsulting.com

ELIZABETH BAKER
bbaker@summitblue.com

KEVIN J. SIMONSEN
kjsimonsen@ems-ca.com

JENINE SCHENK
jenine.schenk@apses.com

ELENA MELLO
emello@sppc.com

TREVOR DILLARD
tdillard@sierrapacific.com

JOE GRECO
jgreco@caithnessenergy.com

HUGH YAO
HYao@SempraUtilities.com

HARVEY EDER
harveyederpspc.org@hotmail.com

STEVE CHADIMA
steve@energyinnovations.com

TOM HAMILTON
THAMILTON5@CHARTER.NET

JACK MCNAMARA
jackmack@suesec.com

CASE ADMINISTRATION
case.admin@sce.com

FRANK W. HARRIS
frank.w.harris@sce.com

GARY L. ALLEN
gary.allen@sce.com

JAMES B. WOODRUFF
woodrujb@sce.com

LIZBETH MCDANNEL
lizbeth.mcdannel@sce.com

KEITH SWITZER
kswitzer@gswater.com

ABBAS M. ABED
aabed@navigantconsulting.com

LINDA WRAZEN
lwrazen@sempraglobal.com

THOMAS P. CORR
tcorr@sempra.com

MICHAEL SHAMES
mshames@ucan.org

SCOTT J. ANDERS
scottanders@sandiego.edu

CENTRAL FILES
centralfiles@semprautilities.com

CHARLES MANZUK
cmanzuk@semprautilities.com

SUSAN FREEDMAN
susan.freedman@sdenergy.org

DESPINA NIEHAUS
dniehaus@semprautilities.com

JOHN W. LESLIE
jleslie@luce.com

MWIRIGI IMUNGI
THE ENERGY COALITION
15615 ALTON PARKWAY, SUITE 245
IRVINE, CA 92618

CARL STEEN
csteen@bakerlaw.com

JUDE LEBLANC
jleblanc@bakerlaw.com

MICHAEL J. GILMORE
michaelgilmore@inlandenergy.com

HAROLD M. ROMANOWITZ
hal@rwitz.net

MARC D. JOSEPH
mdjoseph@adamsbroadwell.com

BILLY BLATTNER
wblattner@semprautilities.com

DIANE I. FELLMAN
diane_fellman@fpl.com

NINA SUETAKE
nsuetake@turn.org

DAN ADLER
Dan.adler@calcef.org

MICHAEL A. HYAMS
mhyams@sfgwater.org

BILL GOLOVE
whgolove@chevron.com

DEVRA WANG
dwang@nrdc.org

DOUGLAS E. COVER
dcover@esassoc.com

KAREN TERRANOVA
filings@a-klaw.com

SEEMA SRINIVASAN
sls@a-klaw.com

SETH D. HILTON
sdhilton@stoel.com

SNULLER PRICE
snuller@ethree.com

ASHLEE M. BONDS
abonds@thelen.com

ED LUCHA
ell5@pge.com

JASON YAN
jay2@pge.com

JOHN PAPPAS
jsp5@pge.com

LENNY HOCHSCHILD
lennyh@evomarkets.com

MADDIE REICHER
mreicher@evomarkets.com

PAUL LACOURCIERE
placourciere@thelen.com

KEVIN T. FOX
kfox@wsgr.com

NIELS KJELLUND
nxk2@pge.com

CALIFORNIA ENERGY MARKETS
cem@newsdata.com

CALIFORNIA ENERGY MARKETS
cem@newsdata.com

JANINE L. SCANCARELLI
jscancarelli@flk.com

KARLEEN O'CONNOR
koconnor@winston.com

JUDY PAU
judypau@dwt.com

ROBERT B. GEX
bobgex@dwt.com

STANDISH O'GRADY
sho@ogrady.us

LAW DEPARTMENT FILE ROOM
cpuccases@pge.com

GRACE LIVINGSTON-NUNLEY
gxl2@pge.com

KATE BEARDSLEY
KEBD@pge.com

MAGGIE CHAN
MMCL@pge.com

STEPHANIE LA SHAWN
S1L7@pge.com

VALERIE J. WINN
vjlw3@pge.com

ROBIN J. WALTHER
rwalther@pacbell.net

NICOLAS PROCOS
procos@alamedapt.com

KEITH WHITE
keithwhite@earthlink.net

JACK PIGOTT
jpigott@optisolar.com

ANDREW J. VAN HORN
andy.vanhorn@vhcenergy.com

KEVIN DUGGAN
duggank@calpine.com

ROBERT T. BOYD
robert.boyd@ps.ge.com

PETER W. HANSCHEN
phansch@mofo.com

PATRICIA THOMPSON
pthompson@summitblue.com

RYAN PLETKA
pletkarj@bv.com

WILLIAM F. DIETRICH
dietrichlaw2@earthlink.net

NELLIE TONG
nellie.tong@us.kema.com

RAMONA GONZALEZ
ramonag@ebmud.com

PAUL FENN
paulfenn@local.org

MRW & ASSOCIATES, INC.
mrw@mrwassoc.com

BARRY H. EPSTEIN
bepstein@fablaw.com

CYNTHIA WOOTEN
cwooten@lumenxconsulting.com

REED V. SCHMIDT
rschmidt@bartlewells.com

ADAM BRIONES
adamb@greenlining.org

CLIFF CHEN
cchen@ucsusa.org

JANICE LIN
janice@strategenconsulting.com

TIM MASON
timmason@comcast.net

BRENDA LEMAY
brenda.lemay@horizonwind.com

EDWARD VINE
elvine@lbl.gov

RYAN WISER
rhwiser@lbl.gov

BRIAN C. FRECKMANN
brian@banyansec.com

DAI OWEN
dowen@ma.org

DEREK DENNISTON
DCDG@pge.com

LYNN M. ALEXANDER
lynn@lmaconsulting.com

TIM ROSENFELD
tim@marinemt.org

CARL PECHMAN
cpechman@powereconomics.com

SUSAN M. O'BRIEN
sobrien@mccarthyllaw.com

DAVID OLIVARES
davido@mid.org

JOY A. WARREN
joyw@mid.org

BARBARA R. BARKOVICH
brbarkovich@earthlink.net

RICHARD MCCANN
rmccann@umich.edu

DAVID MORSE
demorse@omsoft.com

CALIFORNIA ISO
e-recipient@caiso.com

GRANT A. ROSENBLUM
grosenblum@caiso.com

SAEED FARROKHPAY
saeed.farrokhpay@ferc.gov

DENNIS W. DE CUIR
dennis@ddecur.com

KEVIN DAVIES
kevin@solardevelop.com

DAVID OLIVER
david.oliver@navigantconsulting.com

KENNY SWAIN
kenneth.swain@navigantconsulting.com

ERIN RANSLOW
cpucrulings@navigantconsulting.com

LAURIE PARK
lpark@navigantconsulting.com

KARLY MCCRORY
karly@solardevelop.com

DOUG DAVIE
dougdpucmail@yahoo.com

JEDEDIAH J. GIBSON
jgg@eslawfirm.com

BRUCE MCLAUGHLIN
mclaughlin@braunlegal.com

DOUGLAS K. KERNER
dkk@eslawfirm.com

JANE E. LUCKHARDT
jluckhardt@downeybrand.com

PATRICK STONER
pstoner@lgc.org

RACHEL MCMAHON
rachel@ceert.org

SCOTT BLAISING
blaising@braunlegal.com

STEVE BRINK
steveb@cwo.com

STEVEN KELLY
steven@iepa.com

ROB ROTH
rroth@smud.org

MICHAEL DEANGELIS
mdeange@smud.org

VIKKI WOOD
vwood@smud.org

CAROL J. HURLOCK
hurlock@water.ca.gov

LEE TERRY
lterry@water.ca.gov

RICH LAUCKHART
rlauchhart@globalenergy.com

RONALD LIEBERT
rliebert@cfbf.com

KAREN LINDH
karen@klindh.com

CATHIE ALLEN
californiadockets@pacificorp.com

KYLE DAVIS
kyle.l.davis@pacificorp.com

DONALD SCHOENBECK
dws@r-c-s-inc.com

TIMOTHY CASTILLE
castille@landsenergy.com

MONIQUE STEVENSON
MoniqueStevenson@SeaBreezePower.com

Amanda C. Baker
ab1@cpuc.ca.gov

Andrew Schwartz
as2@cpuc.ca.gov

Anne E. Simon
aes@cpuc.ca.gov

Anne Gillette
aeg@cpuc.ca.gov

Beth Moore
blm@cpuc.ca.gov

Brian D. Schumacher
bds@cpuc.ca.gov

Burton Mattson
bwm@cpuc.ca.gov

Cheryl Lee
cni@cpuc.ca.gov

Christopher Danforth
ctd@cpuc.ca.gov

Donald R. Smith
dsh@cpuc.ca.gov

Dorothy Duda
dot@cpuc.ca.gov

Ellen S. LeVine
esl@cpuc.ca.gov

F. Jackson Stoddard
fjs@cpuc.ca.gov

Jaclyn Marks
jm3@cpuc.ca.gov

Jane Whang
jjw@cpuc.ca.gov

Jay Morse
jxm@cpuc.ca.gov

Julie A. Fitch
jf2@cpuc.ca.gov

Julie Halligan
jmh@cpuc.ca.gov

Mark R. Loy
mrl@cpuc.ca.gov

Matthew Deal
mjd@cpuc.ca.gov

Merideth Sterkel
mts@cpuc.ca.gov

Nancy Ryan
ner@cpuc.ca.gov

Nilgun Atamturk
nil@cpuc.ca.gov

Noel Obiora
nao@cpuc.ca.gov

Paul Douglas
psd@cpuc.ca.gov

Sara M. Kamins
smk@cpuc.ca.gov

Sean A. Simon
svn@cpuc.ca.gov

Traci Bone
tbo@cpuc.ca.gov

SUZANNE KOROSEC
skorosec@energy.state.ca.us

JAMES MCMAHON
JMcMahon@navigantconsulting.com

CLARE LAUFENBER GALLARDO
claufenb@energy.state.ca.us

CLARE LAUFENBERG
claufenb@energy.state.ca.us

CONSTANCE LENI
cleni@energy.state.ca.us

HEATHER RAITT
hrait@energy.state.ca.us

KATE ZOCCHETTI
kzocchet@energy.state.ca.us

MARC PRYOR
mpryor@energy.state.ca.us

ROSS MILLER
rmiller@energy.state.ca.us

Thomas Flynn
trf@cpuc.ca.gov

BILL KNOX
bknox@energy.state.ca.us

HOLLY B. CRONIN
hcronin@water.ca.gov

PUC/X94280.v1