

Stakeholder Comments Template

**Integration of Transmission Planning and Generation
Interconnection Procedures (TPP-GIP Integration)
Revised Straw Proposal, September 12, 2011**

Submitted by	Company	Date Submitted
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This template is for submission of stakeholder comments on the topics listed below, covered in the TPP-GIP Integration Straw Proposal posted on September 12, 2011, and issues discussed during the stakeholder meeting on September 19, 2011.

Please submit your comments below where indicated. Your comments on any aspect of this initiative are welcome. If you provide a preferred approach for a particular topic, your comments will be most useful if you provide the reasons and business case.

Please submit comments (in MS Word) to TPP-GIP@caiso.com no later than the close of business on September 29, 2011.

Introduction:

Recurrent Energy appreciates this opportunity to comment on the CAISO’s amendments to the proposed TPP-GIP Integration as presented in the Revised Straw Proposal (the Proposal) posted on September 12, 2011. Recurrent Energy, a distributed solar IPP, develops, owns, and operates solar projects ranging from less than 1 MW to 400 MW each, in the U.S., Canada, France, Germany, Spain and Israel. Starting with a team of about a dozen people in 2007 and having grown to over 100 people today, Recurrent now has nearly 500 MW of solar projects operating, in construction, or under contract, and some 2 GW overall in our development pipeline.

In summary, Recurrent Energy remains a willing participant in the stakeholder process as the staff at CAISO explore how best to integrate these two procedures. As we continue to participate, however, we recommend the timeline be extended to alleviate the concern that this process is advancing too quickly without an adequate amount of detail to facilitate a robust collaboration between stakeholders and the CAISO.

A longer timeline is warranted because of the dynamic nature such a large and interconnected topic as transmission planning naturally brings. As dialogue occurs new critical issues are discovered. For example, it has not been discussed whether the Proposal anticipates a development future comprised primarily of the larger sized projects California saw in 2009 and 2010, or whether this process is also anticipating the increasing preference for smaller projects interconnecting on transmission lines below 230kV. Additionally, influential new information was verbally presented at the September 19 Stakeholder Workshop indicating that only Cluster 5 and clusters beyond would likely be affected by the Proposal. This factor removes the absolute immediacy of the process and should allow for additional time to facilitate greater discussion between CAISO staff and stakeholders and more iteration of Proposal revisions before moving to the next step of the CAISO stakeholder process. This enhanced iteration is necessary as any witness to the two stakeholder meetings regarding this Proposal recognize that few, if any, stakeholders are supportive of the Proposal in its current form.

As a member of the Large-scale Solar Association (LSA), Recurrent Energy supports the comments submitted under their name. In our comments here we choose to reinforce certain points we believe are particularly important.

1. Section 4 of the paper laid out several objectives for this initiative, including four previously-identified GIP issues to be included in scope. Please indicate whether your organization believes these objectives are appropriate and complete. If your organization believes the list to be incomplete, please specify what additional objectives the ISO should include.

Recurrent Energy supports the comments of LSA and reinforces certain points regarding objectives the Proposal is currently lacking including: a) Coordination with Load-Serving Entity (LSE) procurement processes; and b) Early and definitive Network Upgrade (NU) cost certainty.

The Proposal seeks to modify the energy market in CA without modifying the procurement process. Under the current rules, ratepayers must cover the prudent costs incurred by developer and agreed to by the IOU. Objective 3 and 4 on page 7 of the Proposal essentially describe the desired evolution of this relationship as reducing costs by modifying the competitive forces developers react to¹. Modifying a competitive market to incent different outcomes is in and of itself not a problem. It is how the market is manipulated that raises a critical issue.

¹ Objective 3: “Provide incentives through appropriate cost allocation for developers of new resources to select the most cost effective grid locations for interconnection.”

Objective 4: “Limit the potential exposure of transmission ratepayers to the costs of building transmission additions and upgrades that are inefficient or under-utilized.”

Objective 3:

The creation of incentives for cost effective interconnection siting is the thrust of Objective 3. However, incentives for cost effective siting will not exist if the selection of public policy upgrades favor clusters of larger projects requiring larger network upgrades but disadvantages smaller, better sited projects. In the current Proposal it is not clear whether the TPP process will select public policy upgrades accommodating smaller and more diffuse development at the 66kV and 110kV level as opposed to favoring major reconductoring (230kV and 500kV), significantly expanded substations and new transmission pathways in the richest resource areas. Current trends indicate a majority of contracted projects are under 20MW. If public policy upgrades select primarily high-voltage transmission, a disincentive is created for developers to facilitate public policy objectives at the 66kV or 110kV level.

Objective 4:

Ratepayer cost exposure is important to consider. Past efforts to build major new transmission to rich resource areas teach us this. However, limiting cost exposure awareness in this Proposal only to transmission upgrades is not representative of the ratepayer's interest. The cost of the energy interconnecting to cost-efficient transmission matters very much too. The CEC Draft Renewable Strategic Plan, presented in a stakeholder meeting in early September, reported that IOUs are nearly compliant in achieving current RPS mandates and even new mandates will only create slight incremental demand for renewable capacity. From a perspective of needing incremental capacity, the large mega-projects of years past are unlikely to be the only path to CAISO supporting compliance with the state's RPS.

In an effort to achieve overall cost efficiency, this Proposal presents a myopic perspective of the many cost choices a developer faces in the process of producing a competitive bid. Developers are well aware that network upgrade costs figure prominently in the IOU's "least cost, best fit" bid review process. If the merits of a developer's project warrant it to be shortlisted for contract negotiations, it carries the badge of selection through that competitive process where its network upgrade costs to the ratepayer have been considered in addition to all other costs.

Through trial and error, developers have learned how to create the most value at the least cost. In growing numbers, solar developers are proposing highly competitive projects in the 20 MW category and locating them close to load. If the TPP selects upgrades that force some of the least total cost projects to fund interconnection on their own, these projects will face a disadvantage in a competitive procurement environment. Even if small 20MW projects outside of ratepayer-funded upgrade zones demonstrate extremely attractive network upgrade costs paired with highly competitive power prices, an IOU will likely overlook them simply because they have a "sunk cost" in the ratepayer-funded public policy upgrades. This imbalance effectively shrinks the pool

of renewable projects the utility has to choose from. Limiting choice will limit the other benefits IOUs may seek such as achievement of nearer CODs, balancing the environmental cost of their renewable portfolio, and others.

Objective 7 (b):

LSA comments on the theoretical occurrence of increased cost responsibility for remaining IC's when projects drop out of the queue. Recurrent Energy supports these comments, but would also highlight that cost responsibility can and should be reduced if upgrades are no longer needed. Currently, the IC or PTO can initiate an operational study, but the process is not properly formalized with respect to revised upgrade scope, cost, or timing.

2. The revised straw proposal presents a timeline describing how the new TPP-GIP process would work. Please comment on the overall process design in terms of how well it meets the objectives of this initiative and how workable it is from a practical perspective. If you see ways it can be improved please offer concrete suggestions.

Recurrent Energy supports the comments of LSA and reinforces certain points. The addition of a visual timeline depicting the iterative process is helpful in understanding how the GIP will interact with the TPP, but conspicuously missing is the interaction with the state's procurement cycle. If the plan is intended to support economic achievement with public policy goals, it makes sense to consider who and when renewables will be procured and not just where.

Recurrent Energy strongly believes that by attempting to design a transmission planning process without considering the procurement process and its interplay with the interconnection study results, this process is unlikely to achieve the results it intended. Specifically, developers will face additional risk if posting the initial interconnection study deposits before they have accurate information regarding cost, scope, and timing of ratepayer funded upgrades (reliability, economic, or public policy). That is roulette, not development. Even if the TPP results came prior to Phase I studies, this knowledge would almost surely lead to oversubscription and a need to allocate scarce capacity. The potential for someone to win a PPA but not be allocated capacity would create an intolerable scenario.

We would suggest, as an alternative, that this Proposal be reconsidered and coordinated with a much needed reform of the CPUC-overseen procurement process to recognize the reliance each process has on one other and be designed accordingly. The current schedule to complete this stakeholder process (December 2011) is not capable of accommodating the level of coordination and re-engineering that is necessary for CPUC – CAISO – stakeholder collaboration and should be extended. Let the first cluster

that interacts with this integration be Cluster 6, and spend the additional months working with the CPUC and stakeholders on a complete process.

3. Please comment on the following specific aspects of the design of the proposed new TPP-GIP process, and offer concrete suggestions for improvement where needed.

Recurrent Energy agrees with the comments of LSA and reinforces certain points.

- a. The study assumptions proposed for each of the two GIP study phases.
- b. The information available to interconnection customers at each decision point in the process.

To expand on LSA's comment, under the current proposal developers would not receive costs of incremental (with respect to TPP) Network Upgrades until Phase 2. Although we understand the intent is to use TPP upgrades as the bulk of upgrade scope, it is not certain that major incremental upgrades can be avoided. The developers, to aid in the siting and financing process, need either more information or a hard cost cap earlier in the study process.

- c. The "soft" nature of the GIP cost caps, whereby interconnection customers and ratepayers will have shared responsibility for upgrade costs that exceed the cost cap. Comment on both (i) the appropriateness of sharing this cost responsibility, and (ii) the ISO's specific proposal for how the costs would be shared.
4. In the revised straw proposal, the ISO identifies four options by which allocation of ratepayer funded upgrades could be allocated.

Recurrent Energy supports the comments of LSA and reinforces certain points.

- a. Please rank the options, Option 3A, 3B, 3C, or 3F, from 1 (most appropriate) to 4 (least appropriate) your organization believes to be the most appropriate means for determining the allocation of ratepayer funded upgrades. Please explain the reasons for your preference? If there other options the ISO should consider, please describe them and explain why they could be superior to the other options.

Recurrent Energy does not find Option 3A, 3B, or 3C to be acceptable from a development perspective as they introduce far too much risk into the development timeline late in the process. We rank 3B and 3C as a 4, with 3A

being slightly better – ranked as a 3. Each of these options is not preferred as they represent millions of dollars worth of postings hinging on highly uncertain results. We choose to focus our comments on the new Option 3F.

Building on our previous recommendation that the current timeline of integration between the TPP and GIP should be restructured to accommodate a reform of the CPUC’s procurement process, Recurrent Energy sees Option 3F as the only fair and feasible choice. PTOs are the only entity with perfect information about their system, their needs, the cost of network upgrades and the bid prices offered. When paired with the shortlisted results of a procurement cycle, a PTO is perfectly situated to allocate ratepayer funded upgrades in an efficient and balanced manner to the most viable projects to bring the lowest total cost projects online. However, allocation of “sunk cost” public policy upgrades must not shut out consideration of competitive projects outside TPP-selected upgrades.

- b. Based on stakeholder feedback during the September 19 stakeholder meeting, many parties stated the ISO would likely need to utilize more than one of the identified options. Please provide comment regarding what combination of these options will best facilitate the efficient allocation of ratepayer funded transmission capacity. Please provide as much detail as possible.
- c. If Option 3A is selected, what are appropriate milestones to determine which projects are the “first comers?” In particular, some stakeholders have suggested that only projects with signed PPA should be allowed to qualify. Please comment on the appropriateness of this criterion and any others that might be needed.
- d. If Option 3B is selected, what is the appropriate metric and methodology upon which pro rata shares should be determined?
- e. If Option 3C is selected, then how should such an auction be conducted? Specifically, the ISO seeks comments regarding whether an auction should be an open bid or closed bid and held in a single round or an iterative bidding process? Please provide as much detail as possible.
 - 1. Should the ISO conduct separate auctions for large projects and small projects? If so, how should the ISO determine how much transmission capacity should available in each auction?
- f. If Option 3F is selected, how shall transmission capacity be allocated to the LSEs? In particular, is the existing methodology for allocating import

capacity to LSEs for RA (tariff section 40.4.6.2) applicable in the present context? If not, how should it be adapted?

- g. All of the options provided could create opportunities to buy/sell allocations of capacity created by ratepayer funded projects. Is there a need for the ISO to set up rules to prohibit or manage such sales?
5. In cases where an IC pays for a network upgrade and later ICs benefit from these network upgrades, the ISO has proposed two options, Options 3E and 3G to resolve the “first mover-late comer” problem.

Recurrent Energy agrees with the comments of LSA.

- a. Does the ISO need to select one of these options or should both be implemented? If both, please explain or give an example of how the two could work together.
 - b. If only one option is to be chosen, which option does your organization favor and why?
 - c. In option 3G, should the “late comer” be responsible for paying back ratepayers for the portion of the network upgrades already covered by ratepayers or simply take over paying for the portion of the network upgrades covered by ratepayers moving forward?
6. In order to transition from the current framework to the new framework, the ISO proposes that the entire existing queue including Clusters 3 and 4 proceed under the original structure, and that Cluster 5 would proceed using the new rules.

Recurrent Energy supports the comments of LSA and reinforces certain points.

- a. Does your organization support this transition approach? If not, please indicate how it should be modified and provide the justification for your proposal.

Recurrent Energy is supportive of avoiding retroactive amendments to interconnection rules without strong support from the interconnection customers who will be affected. We understand that sometimes, mid course correction is necessary as unforeseen circumstances emerge, for example the separation of cluster 3 and 4 phase II studies is wise to avoid delay of cluster 3 project GIAs and unfair cost allocation when merged with cluster 4. Cluster 3 projects have posted Phase 1 deposits and are ready to proceed to Phase 2 studies, but are currently

being unduly delayed by the Cluster 4 Phase 1 study process. The Phase 2 study process combining Cluster 3 & 4 projects will likely not finish until December of 2012, which would jeopardize the interconnection viability results for a potential 2012 Renewables RFO by the IOUs. Additionally, Cluster 4 may experience further delays as CAISO and stakeholders go through the process of executing a revised Cluster 4 Study Methodology. If the study process moves forward as currently designed, the LSEs will not be able to evaluate Cluster 3 projects accurately (because of inflated Phase 1 assumptions) or in a timely manner (Phase 2 results for combined Cluster 3/4 likely to be delayed until early 2013), unduly limiting their pool of viable projects for RPS compliance.

We agree with CAISO staff that a single cluster in the future should go through the new process with clear knowledge and understanding of the rules they will follow. However, we believe that the scope of the “new” framework remains constrained so long as it does not include coordination with procurement cycles. We strongly urge CAISO staff to consider operating Cluster 5 according to the current rules, just as 3 and 4 will be and spend the appropriate resources coordinating with the CPUC to design a holistic framework for procurement and interconnection each informed in a timely manner by the other.

- b. Given the potential size of clusters 3 and 4, if these clusters proceed under the existing rules is there a need to create new rules that would strengthen the incentives for less viable projects to drop out of the queue rather than proceed into the GIP phase 2 study process? If so, please offer concrete suggestions and explain why your suggestions would be effective and reasonable.
7. Some stakeholders expressed interest in determining only the reliability upgrades and costs in the GIP studies and to consider the need for delivery upgrades in the TPP. The ISO seeks comment regarding the feasibility/desirability of separating the assessment of reliability and delivery upgrades in this manner. In particular, how would this approach improve the process of identifying delivery upgrades that ICs would be required to pay for?

Recurrent Energy agrees with the comments of LSA.

8. Stakeholders have expressed concerns about the appropriate time to restudy the needs for and costs of network upgrades when projects drop out of the queue. Therefore the ISO seeks concrete suggestions for when and how restudies should be conducted.

Recurrent Energy agrees with the comments of LSA.

9. Please offer any other comments on the revised straw proposal, including any suggestions for improvement of the proposal or other issues your organization believes the ISO must address in this initiative.