

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



FILED

10-19-09
04:33 PM

_____))
Order Instituting Rulemaking to Continue) Rulemaking 08-08-009
Implementation and Administration of California) (Filed August 21, 2008)
Renewables Portfolio Standard Program.))
_____)

**AXIO POWER, INC. COMMENTS ON ADMINISTRATIVE LAW JUDGE'S
RULING REGARDING PRICING APPROACHES AND STRUCTURES FOR A
FEED-IN TARIFF**

Will Plaxico
Axio Power, Inc.
31897 Del Obispo St. Suite #270
San Juan Capistrano, CA 92675
Telephone: (888) 728-1117 x55
E-mail: wplaxico@axiopower.com

October 19, 2009

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

Order Instituting Rulemaking to Continue Implementation and Administration of California Renewables Portfolio Standard Program.)))))) Rulemaking 08-08-009) (Filed August 21, 2008)
---	-----------------------	---

**AXIO POWER, INC. COMMENTS ON ADMINISTRATIVE LAW JUDGE’S
RULING REGARDING PRICING APPROACHES AND STRUCTURES FOR A
FEED-IN TARIFF**

Axio Power, Inc. respectfully submits these comments in response to ALJ’s August 27, 2009 ruling regarding pricing approaches and structures for a feed-in tariff. Axio seeks to ensure that the perspectives of project developers with on-the-ground experience participating in these types of incentive programs are included in the proceeding record.

**I.
INTRODUCTION**

Axio is a southern-California-based solar project developer with several 1-20 MWs distributed generation projects under development throughout the state. Axio’s development team has participated in numerous incentive programs for renewable energy projects, both competitive solicitations and fixed-price, standard offer programs. Axio is well versed in both the positive and negative attributes of each type of program. While Axio is supportive of the majority of the views of other solar industry groups which are parties to this proceeding, API has some divergent views regarding staff’s FIT proposal which are described below.

II. DISCUSSION

A. FIT Pricing Approach

No comments.

B. Energy Division Pricing Proposal (Attachment A)

1. Do you agree with the program's goals and guiding principles? If you do not agree, please explain.

Axio largely agrees with the program's goals and guiding principles, with one minor exception – the apparent exclusion of projects producing generation close to load centers, but at the sub-transmission level rather than on the distribution system.

Axio suggests that:

- a. Goal #2 be revised as follows: “Provide sufficient payment to stimulate market segments ~~at the distribution level~~ for wholesale distributed generation and build new projects while minimizing ratepayer costs and preserving competition”.
- b. Goal #8 be revised to “Facilitate the interconnection of projects that efficiently utilize ~~the existing distribution system~~ and sub-transmission infrastructure”.

See Axio's proposed Revision #4 for an rationale for these proposed changes to staff goals and guiding principles.

2. Please comment on the strengths and weaknesses of staff's proposed market-based pricing mechanism, including auction design details, using the guiding principles.

Axio applauds the CPUC staff on their approach to implementing a feed-in tariff with a market-based pricing mechanism. Axio has successfully

participated in a similar market-based program for distributed generation projects, the Public Service Company of Colorado (Xcel Energy) Solar Rewards program for projects up to 2 MWs. That program has resulted in the successful construction of several MWs of projects since the program's first solicitation in 2006. While that program has led to some degree of contract failure, Axio suggests that more robust Project Viability criteria as proposed by staff, with additional modifications proposed in response to #3 below (specifically *Project Maturity* milestones required as pre-requisites for auction participation), will serve to greatly reduce the program risk of contract failure.

Consistent with the views of several other solar industry participants, Axio supports a fixed-price mechanism for projects < 3 MWs to reflect the lesser economies of scale associated with these projects.

3. If you have specific modifications to the staff proposal, please provide a rationale for the modifications pursuant to the guiding principles.

Axio proposes the following program modifications to the staff proposal. While these modifications will be relevant and important considerations for staff to implement an effective program, Axio suggests that any revisions and stakeholder review of these modifications be included in a post-decision workshop so as not to delay program implementation.

Revision #1: Project Viability Criteria – More Emphasis on Project Maturity

Axio harbors some reservation that without more significant Project Maturity requirements to participate in an auction, some Developers may bid a high volume of projects with little confidence in the ultimate project viability, leading to a high degree of contract failure. In line with Schedule C program objectives # 3 – to “*focus on*

projects... that can effectively mitigate... the constraints that slow down development of larger projects”, #7, “to adopt program design elements... that adequately address project viability” and #14, to “promote performance”, Axio encourages staff to adopt more significant development milestones as required pre-requisites to apply for a contract. The proposed modifications described below will contribute towards program objectives to incentivize projects that have been sufficiently vetted for economic, permitting, and interconnection-related risks such that a developer will have progressed far enough in the development lifecycle to accurately estimate all-in costs to develop and build a project, and do so within an 18 month period. Specifically, Axio proposes a Developer meet BOTH a pre-requisite **Interconnect Milestone**, as well as a pre-requisite **Permitting Milestone** in order to propose a project in any auction, as described further below.

A. Pre-Requirement Interconnect Milestone

In order to bid a project into a RAM auction, Axio proposes a developer should be required to have initiated the Small Generator Interconnection Process (SGIP)¹ a) and have completed a System Impact Study (SIS) with the relevant interconnecting utility, or b) provide evidence from the interconnecting utility that the proposed project has met all “screens” and

¹ See Wholesale Distribution Access Tariff (WDAT) Small Generator Interconnection Procedures (SGIP) for:
PG&E
<http://www.pge.com/includes/docs/pdfs/b2b/newgenerator/wholesalegenerators/wdt.pdf>
SCE
http://www.sce.com/NR/sc3/tm2/RPA/Reg_Info_Ctr/OpenAccess/wholesale_distribution_access_tariff.pdf
SDG&E
<http://www.sdge.com/regulatory/documents/openAccess/currentEffectiveWholesaleOpenAccessDistributionTariff.pdf>

will be subject to the utilities Fast Track Process, whereby the utility does not require a formal System Impact Study.

This requirement will serve two purposes:

1. With a completed System Impact Study in hand, a Developer has a preliminary indication of the magnitude of any system upgrades that will be required to accommodate the proposed project as well as preliminary budgetary estimate of the cost to construct any required upgrades and connect the project. This will enable the Developer to include this cost in their overall bid price, and can be used to require Developers to affirm this cost is in fact included in their overall bid price.
2. A milestone demonstrating progress in the interconnection study process serves a second benefit. If a developer has begun the Small Generator Interconnection Process (SGIP), that developer will have been assigned a serial queue position and have first rights to a given amount of distribution system capacity. As such, this milestone requirement will also prevent two parties from bidding the same finite/mutually exclusive capacity on the distribution system.

B. Pre-Requisite Permitting Milestone

To receive all required development permitting approvals for a small renewable generating facility in California, it could very well take far in excess of 18 months to complete the CEQA environmental review process and secure any required Conditional Use Permit (CUP), general plan

amendment, or zone change. As such, Axio proposes that a Developer must have made “*Demonstrable Progress*” towards achieving required permitting approvals in order to propose a project in any RAM auction. While the distribution interconnection procedures are fairly standardized across utility jurisdictions and an interconnect milestone that applies across the state can be objectively defined, Axio recognizes a simple, standardized permitting milestone that can apply in any jurisdiction may be challenging to define. As such, Axio suggests the definition of Demonstrable Progress be further explored in a post-decision workshop. Axio initially proposes the following possibility for further legal review:

1. Developer has a letter from the County, Municipal Planning Authority or other Lead Agency under CEQA (the “Lead Agency”) that confirms the proposed project can be built by right, according to the current zoning designation, OR
2. Developer’s application for a conditional use permit, zone change, and/or general plan amendment has been “*Deemed Complete*” by the Lead Agency whereby the Lead Agency has issued a letter deeming the Developer’s application complete and confirming the initial study required by CEQA is on file with the Lead Agency, OR
3. Developer has a Notice of Preparation (NOP) from the Lead Agency stating that an Environmental Impact Report (EIR) or Mitigated Negative Declaration (MND) will be required for the

project and the NOP has been filed with the Governor's Office of Planning and Research² (OPR).

This proposed interconnect and permitting milestones serve two benefits:

1. Both help to ensure that developers selected are in fact capable of bringing projects to fruition under what constitutes a very brief timeline for development in California of 18 months. If a developer can secure a RAM contract without any evidence of progress towards securing an interconnect agreement and required environmental approvals and permits, the risk of those projects not being completed within the proposed 18 month timeframe will remain high, which is not in line with the staff's stated program objectives.
2. Both increase the project maturity hurdle to participate, which will also indirectly help to address what Axio considers "un-warranted" Seller Concentration (e.g. one developer bidding numerous projects at unviable prices for "concept" only projects). See proposed Revision #3 for what Axio considers un-warranted Seller Concentration.

These project maturity milestones could limit seller participation in the early rounds of the auction process, as many players may not have reached the milestones required to participate. However, this will also help to prevent a large volume of speculative bidding in the RAM auction, as developers will have to have progressed in

² See overview of CEQA Document Submission at <http://www.opr.ca.gov/index.php?a=sch/environmental.html>

the development process (and understand the ultimate project economics) in order to participate.

In order to achieve these pre-requisite milestones, a Developer will be required to have significant “skin in the game” (both investment of financial resources as well as significant time investment) to mature a project to the proposed extent without a off-take contract in hand. As such, **the proposed maturity milestones will only be effective if developers have certainty that this program will exist for a minimum 3-5 year period**, and developers have confidence in the program’s longevity and confidence there will be sufficient opportunity to secure a contract in subsequent auctions if they make the development investment required to achieve the milestones required to participate.

Revision #2: Eliminate Project Development Experience

Axio suggests that staff eliminate the Project Development Experience component of the Project Viability criteria. The Project Development Experience criteria could prohibit a party with a high degree of credibility and a highly mature project from participating in the RAM process, which would be counter to program goal #7. For example, according to the current Project Development Experience criteria in Schedule A, a large engineering and construction company that had not previously been active in solar PV development but could serve as a strong market participant, very capable of bringing a project from concept to fruition, could theoretically be barred from participating in a RAM auction simply because that entity had not made an entry into the solar PV market to date. Axio suggests that the Project Maturity criteria proposed herein are a more appropriate and relevant determinant of a project’s overall viability.

Revision #3: Eliminate Seller Concentration Criteria

Axio proposes that staff eliminate “Seller Concentration”, which states that *“No one seller can contract for more than 50% of contract capacity or revenue cap in each auction.”* Axio suggests that this requirement will be challenging to enforce, and may not be well-suited to serving staff’s stated Goals. If one particular developer offers a superior project and lower levelized cost of energy, as long as that project can be successfully built according to the developer’s economic assumptions, it would seem appropriate that achieving the delivery of the lowest cost of distributed renewables is a more relevant program objective than limiting Seller concentration. Axio notes that diversity of participation is not a stated program Goal, whereas stated “Economic Efficiency” is included as a program Goal. Axio harbors some concern that, without substantial Project Maturity requirements to participate, a developer could “pay to play”, and submit a large volume of bids for relatively immature, high risk projects. This would be counter to program objectives. However, if one entity has a number of highly viable, mature projects, and can offer the lowest cost, most mature projects, that party should not be prevented from any specific concentration level. In sum, Axio suggests that the Project Maturity criteria will serve as a more effective tool to limit what Axio considers “un-warranted” Seller Concentration. Seller Concentration for mature, viable projects should not be discouraged.

Revision #4: Geographic Distinction vs. Wholesale Distribution Access Tariff (WDAT) Distinction

Axio proposes that RAM-eligible projects should not be limited to WDAT processes, but rather inclusion should be based upon defined geographic areas with significant local load. If a project can connect at a sub-transmission level (e.g. 69kV)

and offer competitive economics while producing power in a geographic area with significant local load and potential to benefit from distributed generation, Axio suggests this would serve the program objectives well. Axio proposes staff should alternatively consider requiring each utility to establish geographic preferences for distributed generation, which would include sub-transmission level.

As an example, the jurisdictions for what can be considered “distribution” vs. “transmission” can be somewhat varied across the state. SCE has a fairly extensive 115kV network in the remote desert areas that is technically considered “distribution” and is not under CAISO control. Projects interconnected to this infrastructure would be eligible to participate in a RAM auction, whereas a project connected to PG&E’s 69kV sub-transmission infrastructure within a load center would not be eligible for the RAM program. The latter example would arguably better serve the program objectives of stimulating the market for distributed generation and putting generation onto existing infrastructure. Axio’s principle suggestion is to allow developers as much flexibility as possible to come up with creative, lowest cost solutions, while contributing towards the program objectives for stimulating distributed generation on existing infrastructure.

4. If RAM is not your preferred pricing mechanism, please provide an alternative proposal that addresses the guiding principles and how your proposal results in the procurement of viable and low-cost projects within a capped program.

RAM is Axio’s preferred pricing mechanism for projects >3 MWs. For projects <3 MWs, Axio supports a fixed-price approach.

5. Staff has proposed a soft 1000 MW interim target over the next four years, which needs to be converted into a revenue requirement. Please propose a methodology to calculate the revenue requirement based on the 1000 MW interim target.

No comments.

6. *Additional comments regarding the Energy Division FIT pricing proposal.*

No additional comments.

C. Pricing Structure Issues (Attachment B)

No comments.

D. Pricing-Related Goals of an FIT (Attachment C)

No comments.

E. Assessment of Recommendations on FIT Pricing (Attachments D and E)

No comments.

F. Proposal to Take Official Notice of California Energy Commission FIT Final Consultant Report

No comments.

G. Additional Material Information

No comments.

III. CONCLUSION

In conclusion, Axio applauds staff for their efforts and sound approach to establishing a FIT that provides appropriate balance of the program objectives. While Axio has proposed minor program revisions herein, we encourage staff to conclude this proceeding expeditiously and further refine program rules in a post-decision workshop during the implementation phase of the RAM program.

Respectfully submitted,



Will Plaxico
Axio Power, Inc.

October 19, 2009

VERIFICATION

I, Will Plaxico, am a representative of Axio Power, Inc. and am authorized to make this verification on the organization's behalf. The statements in the forgoing document are true to the best of my knowledge, except for those matters that are stated on information and belief, and as to those matters I believe them to be true.

I declare under penalty of perjury that the forgoing is true and correct.

Executed this 19th day of October, 2009, at San Juan Capistrano, California.

A handwritten signature in black ink, appearing to read "Will Plaxico", written in a cursive style.

Will Plaxico
Axio Power, Inc.
31897 Del Obispo St.
San Juan Capistrano, CA 92675

CERTIFICATE OF SERVICE

I, Will Plaxico, hereby certify that I have on this date caused the attached AXIO POWER, INC. COMMENTS ON ADMINISTRATIVE LAW JUDGE'S RULING REGARDING PRICING APPROACHES AND STRUCTURES FOR A FEED-IN TARIFF in R.08-08-009 to be served to all known parties by electronic mail, to each party named in the official attached service list obtained from the Commission's website, attached hereto, and pursuant to the Commission's Rules of Practice and Procedure.

Dated October 19, 2009, at San Juan Capistrano, California.



Will Plaxico
Axio Power, Inc.
31897 Del Obispo St.
San Juan Capistrano, CA 92675