

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 11-05-005  
(Filed May 5, 2011)

OPENING COMMENTS OF THE UTILITY REFORM NETWORK  
ON THE IMPLEMENTATION OF NEW PORTFOLIO CONTENT CATEGORIES  
FOR THE RENEWABLES PORTFOLIO STANDARD PROGRAM



Matthew Freedman  
The Utility Reform Network  
115 Sansome Street, 9<sup>th</sup> floor  
San Francisco, CA 94104  
415-929-8876 x304  
[matthew@turn.org](mailto:matthew@turn.org)  
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**OPENING COMMENTS OF THE UTILITY REFORM NETWORK  
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Pursuant to the July 12 ruling of ALJ Simon, The Utility Reform Network (TURN) hereby submits these opening comments on the new portfolio content categories required pursuant to changes to Public Utilities Code §399.16 enacted in SBx2 (Simitian). As an active participant in the legislative negotiations surrounding this portion of SBx2, TURN has a very strong interest in ensuring that the Commission faithfully implements the portfolio content categories in a manner consistent with the intent of the Legislature.

TURN worked with a variety of parties on the RPS Product Matrix attached to these comments (Attachment A) and the comments of many other parties. The Matrix provides a starting point for understanding how to interpret §399.16 and implement the requirements. Throughout these comments, TURN will refer to the Matrix and offer supplemental proposals for issues that are not resolved by that document. TURN does not offer comments on every question in these opening comments but reserves the right to respond to proposals made by other parties in reply comments.

*Question 1. Section 399.16(b)(1) describes "eligible renewable energy resource electricity products" that meet certain criteria. "Electricity products" is not defined in the statute. Should this term be interpreted as meaning "RPS procurement transactions"?*

The reference to “electricity products” is equivalent to “RPS procurement transactions.” The statutes clearly require that the Commission examine the form of a given procurement transaction rather than merely noting the underlying eligibility of the original generator. The Legislature intended to define distinct “products” based on the attributes and value provided to the purchasing load-serving entity.

This distinction is important with respect to defining “unbundled renewable energy credits” pursuant to §399.16(b)(3).

*Question 3. Please provide a comprehensive list of all "California balancing authority[ies]" as defined in new § 399.12(d).*

The RPS Matrix (page 3) describes the following California Balancing Authorities (CBAs) – the California Independent System Operator, the Los Angeles Department of Water and Power, Turlock Irrigation District, Imperial Irrigation District and the Balancing Authority of Northern California (formerly SMUD). These are balancing authorities understood by the Legislature to be “primarily located in this state” (§399.12(d)). The Commission should reject efforts to include any other Balancing Authorities that primarily serve customer load in other states (e.g. Pacificorp, NV Energy, WAPA) since they were never intended to be included in the adopted definition.

*Question 4. How should the phrase in new § 399.16(b)(1)(A) ". . . scheduled from the eligible renewable energy resource into a California balancing authority without substituting electricity from another source" be interpreted? Please provide relevant examples.*

*Question 5. Does the inclusion of transactions characterized in #4, above, subsume or resolve the work done by Energy Division staff and the parties in response to Ordering Paragraph 26 of Decision (D.) 10-03-021, regarding transactions using firm transmission?*

*Question 6. How would transactions characterized in #4, above, be tracked and verified? Please address the roles and responsibilities of both the CEC and the Commission.*

The RPS Matrix provides general guidance on these transactions (pages 5-6). However, TURN recommends that the Commission ensure that any transaction consistent with this category include energy actually generated and scheduled from the busbar to a CBA on an hourly or sub-hourly basis. The transaction must ensure

that the scheduling accounts for any congestion or other transmission constraints between the generator busbar and the CBA.

The reference to “electricity from another source” is intended to prevent the ‘mix and match’ products developed to satisfy the minimal delivery requirements previously established by the Energy Commission.<sup>1</sup> By contrast, SBx2 clearly prohibits any transaction in which the energy from the generation unit is remarketed or swapped as part of a delivery schedule. The generator must reserve (and pay for) transmission rights from the busbar to the CBA for every MWh counted towards this product category. Furthermore, the generator may not complete the schedule with electricity provided at a different time or from another generation source (including system power).

The work described in Paragraph 26 of D.10-03-021 represents a first step. However, the Commission will have to look beyond firm transmission arrangements and consider other forms of transmission rights that can be used to satisfy the requirements of this product category. TURN recommends devoting time at the upcoming workshops to this subject.

Verification of this transaction should occur in two steps. First, the retail seller should provide sworn attestations to the CPUC that the transactions satisfy the claimed product requirements at the time of a compliance filing. Second, the CEC should audit the claim as part of its verification process. Ideally, the CEC would work with WREGIS to allow that tracking system to include the relevant data so that verification can be streamlined.

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<sup>1</sup> ‘Mix and match’ refers to a transaction structure in which energy from the generator is sold into the local market and system power is imported into a CBA sometime within the year to complete the ‘delivery’ of the renewable power.

The price of misrepresenting a particular transaction should be steep. If the transaction ultimately fails to meet the requirements, the Commission should assess penalties on the retail seller making the initial claim of compliance. Unless there is a price to pay for failing to accurately authenticate the form of the transaction, retail sellers may be tempted to apply inadequate scrutiny to the scheduling arrangements.

*Question 7. Please provide relevant examples of the situation described in the second sentence of § 399.16(b)(1)(A): "the use of another source to provide real-time ancillary services required to maintain an hourly or sub-hourly import schedule into a California balancing authority. . ." How should the subsequent qualifying phrase, "but only the fraction of the schedule actually generated by the eligible renewable energy resources shall count toward this portfolio content category" be interpreted in light of your response? Please provide relevant examples.*

TURN understands that there may be situations where "another source" is used to provide the ancillary services needed to complete hourly or sub-hourly schedules of power from an eligible renewable energy resource into a CBA. This is likely to occur when the generator deviates from the schedule due to unexpected intermittency. In this instance, any procured ancillary services from another source will be netted against the actual import into the CBA before determining the quantity attributable to this product category. The RPS Product Matrix (page 5) provides a specific example of how such a transaction would be credited towards compliance.

It is important to note that "another source" may only be procured in the form of ancillary services to support an import eligible to count under this product category. Any other use of another generation source (including system power) that is not procured as ancillary services would fall outside the bounds of this product category.

*Question 9. The phrase "unbundled renewable energy credit" (REC) is not defined in the statute. Should it be interpreted as meaning: "a renewable energy credit [as defined in new § 399.12(h)] that is procured separately from the RPS-eligible energy with which the REC is associated"?*

*Question 10. "Unbundled renewable energy credits" are a type of transaction*

*meeting the criteria of § 399.16(b)(3). Does § 399.16(b)(1) include any transactions that transfer only RECs but not the RPS-eligible energy with which the RECs are associated (for example, a transaction in which an RPS-eligible generator having a first point of interconnection with a California balancing authority sells unbundled RECs to a California retail seller)? Why or why not? If your response is that unbundled REC transactions are or may be included in § 399.16(b)(1), please also address how a particular transaction can be characterized and verified as belonging in a particular portfolio content category.*

The Commission should interpret “unbundled renewable energy credit” based on the plain meaning of this phrase -- any transaction in which a REC is procured separately from the energy with which the REC is originally associated. This meaning is consistent with past Commission precedents. In addition, the statute clarifies that any transaction not meeting the requirements of §399.16(b)(1) or (b)(2) should also be attributed to this product category.

The statute explicitly states that “unbundled renewable energy credits” are included in the §399.16(b)(3) product category. This explicit reference means that any transaction in which the retail seller procures an unbundled REC counts towards this category regardless of whether the underlying generation resource is directly connected to a CBA, schedules energy directly into a CBA, or provides firmed and shaped energy to a CBA. The form of the last recorded transaction (bundled or unbundled) is an independent factor that determines the appropriate product category. Any other interpretation of this provision would eviscerate the statutory scheme by essentially allowing various flavors of unbundled RECs to be counted toward all three product categories. Such a result would eliminate any meaningful distinction between bundled and unbundled REC transactions and seriously complicate efforts to determine compliance.

The Legislature was concerned about the value of unbundled REC transactions to the customers of the purchasing retail seller. The fact that the unbundled REC is tied to a generator directly connected to a CBA, or was originally sold as part of a bundled

transaction, does not change its value to the customers of a retail seller. A stand-alone unbundled REC does not provide any portfolio hedging value and can leave a purchasing retail seller fully exposed to fluctuating fossil fuel prices.

Moreover, providing equal compliance value to all unbundled REC transactions is consistent with the goal of ensuring non-discriminatory treatment to renewable generation regardless of location. Many parties have previously argued that the Commission is obligated to treat in-state and out-of-state generation equally for purposes of RPS compliance. This concern is addressed by ensuring that all unbundled REC procurement has the same compliance value regardless of the source of the underlying generation.<sup>2</sup>

TURN offers one caveat to this interpretation. For behind the meter renewable generation taking service under a net metering tariff, TURN believes that any transaction involving the transfer of the RECs to the retail seller serving the net metered customer should count as a §399.16(b)(1) product. In this situation, the retail seller is essentially purchasing a bundled renewable product since the customer-generator is being compensated for both the energy provided to the retail seller and the RECs associated with the energy. In the event that the customer-generator sells RECs to an unrelated retail seller not benefitting from (or paying for) the associated energy, the procurement transaction should be treated as an unbundled REC.

*Question 12. "Firmed" is not defined in SB 2 (1x). Please provide a definition or description of this term. Please include relevant examples.*

*Question 13. "Shaped" is not defined in SB 2 (1x). Please provide a definition or description of this term. Please include relevant examples.*

*Question 14. "Incremental electricity" is not defined in SB 2 (1x). Please provide a definition or description of this term.*

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<sup>2</sup> TURN is not suggesting that the Commission would violate the dormant Commerce Clause regardless of the determination made with respect to the definition of an unbundled REC.

*Question 15. Should § 399.16(b)(2) be interpreted to refer only to energy generated outside the boundaries of a California balancing authority, or may it refer also to energy generated within the boundaries of a California balancing authority?*

*Question 16. Should the requirement in § 399.16(b)(1)(A) that the generation must be "scheduled from the eligible renewable energy resource into a California balancing authority without substituting electricity from another source" be interpreted to mean that no firmed and shaped electricity, as set forth in § 399.16(b)(2), may be considered as meeting the requirements of § 399.16(b)(1)(A)? Please provide relevant examples.*

The Legislature did not explicitly define the terms “firmed”, “shaped” or “incremental electricity” in §399.16(b)(2). The Commission is therefore charged with adopting definitions of these concepts and issuing rules to ensure that the definitions are enforced. As a threshold matter, the Commission should recognize that this product category is limited to generation not directly interconnected to a CBA. “Firming” and “Shaping” relate to the methods of scheduling the energy from such a resource into a CBA.

A firmed and shaped product should be distinguished by the timely provision of new physical electric imports into a CBA at fixed prices that provide hedging value to the procuring retail seller. Moreover, the energy used to “firm and shape” the generation should be provided from the same system as the renewable generation. By contrast, procurement transactions that rely on pre-existing import contracts<sup>3</sup>, provide energy at hourly index prices<sup>4</sup>, or schedule CBA from generation located in a wholly different WECC subregion<sup>5</sup>, should fail to meet the standard.

Consistent with these principles, TURN urges the Commission to adopt the

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<sup>3</sup> Examples include SCE relying on imports from the San Onofre Nuclear Generating Station or SDG&E tagging imports from its El Dorado Combined Cycle unit in Nevada.

<sup>4</sup> Offering a buyer energy at an hourly index price encourages “wash trades” in which the buyer can simply resell the energy back to the seller (or to the market) at the same price. The result is a REC “stripping” deal that is functionally identical to an unbundled REC.

<sup>5</sup> For example, imports of Alberta wind using firming and shaping energy procured at Palo Verde would fail this test.



following requirements for any product classified as “firmed and shaped” under this section:

(1) The product must be purchased by means of an agreement or set of agreements between a renewable generator and a load-serving entity for the combined purchase of renewable energy credits and electricity at the generator busbar. The purchase agreement must cover a duration of not less than 5 years.

(2) Any energy used for compliance with this product category must be scheduled into a California balancing authority within the same calendar year as generation originally occurring at the facility.

(3) Any firming and shaping electricity must be provided from the same Balancing Authority (or WECC subregion) where the renewable generator is located and cannot be provided under any supply agreement that predates the original execution of the renewable generation contract.

(4) The product shall result in a fixed price delivery of energy and RECs to a California Balancing Authority over the life of the contract.

These conditions should distinguish a “firmed and shaped” product from other arrangements that provide less value and are properly classified as fitting within §399.16(b)(3). Unless the Commission adopts meaningful conditions of this type, the CEC’s “footnote 3” fiasco is likely to be repeated as retail sellers satisfy minimal legal requirements while actually constructing products that are functionally identical to unbundled RECs.

*Question 17. Section 399.16(d) provides that: "Any contract or ownership agreement originally executed prior to June 1, 2010, shall count in full towards the procurement requirements established pursuant to this article, if [certain] conditions*

*are met. . ."*

The language of §399.16(d) is intended to provide grandfathering treatment to any procurement transaction executed prior to June 1, 2010 for purposes of the product category requirements of §399.16(c). The phrase "count in full" means that the requirements of (c) should not apply to these transactions. This provision does not, however, mean that such procurement should be exempted from the banking restrictions in §399.13(a)(4)(B) which include independent limits on banking unrelated to the language of §399.16(d).

*Question 18. Please discuss the relationship between the instruction in § 399.16(d), set forth above, and the rules for the use of tradable RECs (TRECs) set out in D.10-03-021 (as modified by D.11-01-025), and in D.11-01-026 (for example, temporary limits on TRECs usage; application of the temporary TREC limits to previously signed contracts).*

The previous TREC limits adopted in D.10-03-21 and D.11-01-025 are rendered moot by the provisions of SBx2 for compliance beginning on January 1, 2011. This means that the grandfathering date of January 13, 2011 contained in D.11-01-025 is not relevant. That date has been replaced by the statutory grandfathering date of June 1, 2010. All procurement transactions executed after that date are subject to the requirements of §399.16(c) if they are applied towards the 2011-2013 compliance period. All transactions executed before that date are grandfathered and do not count towards the newly enacted product limitations.

*Question 19. When should the portfolio content limitations set forth in § 399.16(d) go into effect (for example, January 1, 2011; or the effective date of SB 2 (1x); or the date of the Commission decision implementing § 399.16)?*

The portfolio content limits in §399.16(c) apply to "all procurement credited towards each compliance period". SBx2 establishes a compliance period that begins on January 1, 2011 and runs through December 31, 2013 (§399.15(b)(1)(A)). The portfolio content limitations therefore apply to any procurement credited towards RPS compliance for the 2011 - 2013 period. Neither the effective date of SBx2 nor the date

of any Commission implementation decision is relevant to the analysis.

*Question 20. SB 2 (1x) amends Pub. Res. Code § 25741 to, among other things, eliminate the current requirement that RPS-eligible energy must be "delivered" to end-use retail customers in California...At what point in time should the Commission consider the "delivery" requirement ended (e.g., on the effective date of SB 2 (1x); or as of January 1, 2011; or on the effective date of the CEC's revisions to the RPS Eligibility Guidebook reflecting the repeal)?*

The delivery requirement should be deemed to sunset as of January 1, 2011. The portfolio content requirements take effect on that date and supersede the previously applicable obligation to demonstrate delivery for all RPS-eligible transactions. The Legislature made this change based on the recognition that the previously applicable delivery requirements had become meaningless due to CEC guidelines that permitted virtually any unbundled REC transaction to count as “delivered” merely by tagging unrelated “business as usual” energy imports. With the elimination of the delivery requirement in §25741, TURN believes that it no longer applies to any contract executed prior to June 1, 2010.

Although the previously applicable delivery requirement is no longer relevant for resources to be RPS eligible, SBx2 enacts new restrictions on banking from one compliance period to the next (§399.13(a)(4)(B)). This section prohibits banking for any product that meets the criteria outlined in §399.16(b)(3). If a retail seller wishes to bank excess compliance associated with a particular period, it will need to deduct any procurement that meets the §399.16(b)(3) criteria prior to determining the net bankable quantity. A retail seller seeking to bank any procurement associated with transactions executed prior to June 1, 2010 must make an affirmative showing demonstrating that the product is consistent with the criteria for §399.16(b)(1) or (b)(2).

*Question 21. What documentation or descriptions should be required in an advice letter to enable Energy Division staff to confirm the portfolio content category of transactions submitted by utilities for Commission approval?*

*Question 22. Is any post-contracting verification of the portfolio content category*

*needed to track and determine compliance with RPS procurement obligations for utilities? for ESPs? for CCAs? If yes, is the CEC responsible for undertaking it? is this Commission?*

The Commission should work with the California Energy Commission to develop verification protocols for all portfolio content claims. Given the need to document hourly schedules and transmission rights for non-CBA generation, along with potential restrictions on firmed and shaped transactions, there must be a verification regime. TURN does not have a position on whether the CEC or CPUC should conduct this verification process.

*Question 24. The First Extraordinary Session of the Legislature is still in session. Because SB 2 (1x) becomes effective 90 days after the end of this special session, the provisions of SB 2 (1x) will not be in effect until mid-October 2011, at the earliest, and the end of 2011, at the latest. Please review your proposals and identify any issues of timing that should be addressed. Should the Commission simply carry forward the existing RPS rules through calendar year 2011? Why or why not?*

The timing of the effective date of SBx2 should not have any impact on the content of implementation rules developed by the Commission. All retail sellers are aware of the changes in law that will govern compliance during the 2011-2013 period. The Commission should proceed under the assumption that SBx2 is intended to apply to compliance beginning on January 1, 2011.

Respectfully submitted,

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MATTHEW FREEDMAN  
The Utility Reform Network  
115 Sansome Street, Suite 900  
San Francisco, CA 94104  
Phone: 415-929-8876 x304  
matthew@turn.org

Dated: August 8, 2011

**VERIFICATION**

I, Matthew Freedman, am an attorney of record for THE UTILITY REFORM NETWORK in this proceeding and am authorized to make this verification on the organization's behalf. The statements in the foregoing document are true of my own knowledge, except for those matters which are stated on information and belief, and as to those matters, I believe them to be true.

I am making this verification on TURN's behalf because, as the lead attorney in the proceeding, I have unique personal knowledge of certain facts stated in the foregoing document.

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

Executed on August 8, 2011, at San Francisco, California.

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Matthew Freedman  
Staff Attorney

**APPENDIX A**  
**RPS PRODUCT MATRIX**

# RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

**Note:** The following table was produced by a broad group of stakeholders in order to develop a common conceptual framework for discussing the RPS Product Content Requirements, identifying where stakeholder consensus exists, and allowing individual comments to focus on the identified open issues in the last column. The following stakeholders participated in discussions regarding this table and its refinement based on those discussions: Coalition of California Utility Employees; Division of Ratepayer Advocates; enXco; First Solar; Iberdrola; Independent Energy Producers Association; Large-Scale Solar Association; NextEra; Pacific Gas and Electric Company; San Diego Gas and Electric Company; Southern California Edison; Sunpower; The Utility Reform Network; and the Union of Concerned Scientists.

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
<p><b><u>What Procurement is Affected?</u></b></p>	<p>399.16(c) <i>“eligible renewable energy resource electricity products associated with contracts executed after June 1, 2010”</i></p>	<p>“bundled purchase” means the purchase of RPS-eligible energy plus the associated Renewable Energy Credit (REC)  “unbundled REC” means the REC associated with the RPS-eligible energy separate from the associated energy</p>	<p>(1) Contract amendments or modifications occurring after June 1, 2010 unless such amendment or modification is grandfathered under the provisions set forth in 399.16(d)(3);  (2) New contracts with existing facilities (i.e., recontracting) after June 1, 2010, unless such contract is grandfathered under the provisions set forth in 399.16(d)(3);  (3) Any contract executed under an approved IOU Photovoltaic PPA program after June 1, 2010;  (4) Engineering, Procurement and Construction or Build Own Transfer</p>	

**For Reference and Discussion Purposes Only: Information contained herein does not necessarily reflect the views of any party.**



Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
			<p>contracts for renewable utility owned generation (UOG) executed after June 1, 2010;</p> <p>(5) Any Feed in Tariff contract (ie., AB 1969, SB 32, Renewable Auction Mechanism, etc.) executed after June 1, 2010;</p> <p>(6) Any enrollment in the IOU net energy metering (NEM) program for surplus distributed generation (i.e., including but not limited to participants in California Solar Initiative and Self-Generation Incentive Program) after June 1, 2010.</p> <p>(7) Bilaterally-negotiated transactions after June 1, 2010;</p> <p>(8) Any new renewable energy resource contract executed after June 1, 2010, including purchases of unbundled RECs associated with generation under any of the above contract structures.</p>	

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# RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
<b><u>Bucket #1(a)</u></b>	<p><b>399.16(b)(1)(A):</b>  <i>[addressing point of interconnection of facility]</i></p> <p><i>“Have a first point of interconnection with a California balancing authority”</i></p>	<p>Facility must be an eligible renewable energy resource located within the WECC and Facility must be directly interconnected to a California Balancing Authority (CBA). CBAs include CAISO, LADWP, TID, IID, and Balancing Authority of Northern California (formerly SMUD).</p> <p>! Any transaction for a product from an eligible renewable generator physically connected to any CBA</p> <p>! Any transaction for a product from an eligible renewable generator located outside of a CBA, but which directly interconnects to a CBA through a gen-tie.</p> <p>! “gen-tie” means an electrical conductor directly connecting the generation unit to a CBA</p>	<p>! Bundled procurement from eligible renewable generator physically connected to any CBA, including utility-owned generation (UOG)</p> <p>! NEM surplus sales</p>	<p>! Should the CPUC establish a standard in advance for identifying future or additional CBAs now, or should that process wait until there is some change in the current CBA lineup?</p>
<b><u>Bucket #1(b)</u></b>	<p><b>399.16(b)(1)(A):</b>  <i>[addressing point of interconnection of facility]</i></p>	<p>Facility must be an eligible renewable energy resource located within the WECC and Facility must be directly interconnected to the distribution system</p>	<p>! Bundled procurement from distributed generation facility interconnected at distribution level of any CBA, including UOG</p>	<p>! Do RECs associated with generation within a CBA area that serves load “behind-the-meter” (ie.,</p>

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# RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
	<p>“[H]ave a first point of interconnection with distribution facilities used to serve end users within a California balancing authority area...”</p>	<p>located within a CBA’s area.</p> <p>! Any transaction for a product from an eligible renewable generator physically connected to distribution facilities serving end use customers in a CBA.</p> <p>! Any transaction for a product from an eligible renewable generator located outside of a CBA, but which directly interconnects to a CBA’s distribution facilities through a gen-tie.</p> <p>! “gen-tie” means an electrical conductor directly connecting the generation unit to a CBA</p>	<p>NEM surplus sales</p>	<p>CSI/NEM or industrial RPS generation serving on-site load) qualify as Bucket 1 if they are sold (unbundled) to a (1) the retail seller that is also buying the energy, or (2) another RPS-obligated retail seller?</p> <p>! In general, should the “bucket” attribute of a REC remain with the REC until it is retired for compliance, no matter how many times it is traded as an unbundled product in the secondary market? If so, how can the bucket attribute of a REC best be tracked?</p>

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# RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
<p><b><u>Bucket #1(c)</u></b></p>	<p><i>[399.16(b)(1)(A): re specific types of commercial transactions]</i></p> <p><i>“... or are scheduled from the eligible renewable energy resource into a California balancing authority without substituting electricity from another source. The use of another source to provide real-time ancillary services required to maintain an hourly or subhourly import schedule into a California balancing authority shall be permitted, but only the fraction of the schedule actually generated by the</i></p>	<p>! Energy must be scheduled to a CBA from an eligible renewable energy resource (“ERR”) located within the WECC and documented using E-tag information for generator source and delivery sink.</p> <p>! Schedule into the CBA may be day-ahead, hourly, or sub-hourly.</p> <p>! No specific transmission rights are required.</p> <p>! Only the lesser of ERR metered-data and the final adjusted E-tags is eligible as “Bucket 1(c)”.</p> <p>! Import schedules may be firmed within the hour through the use of ancillary services markets, including intra-hour balancing services.</p>	<p>! Generator located in the Pacific Northwest schedules 100 MWh into CAISO over time period X. In that time period, generator meter data shows generation of 90 MWh, and final adjusted E-Tags show delivery of 100 MWh. Retail seller will receive 90 MWh of Bucket 1(c) credit from this resource over this time period.</p> <p>! Over time period Y, Generator scheduled 100 MWh, but 110 MWh is actually generated; 100 MWh would be reflected on the E-tag and is counted for “Bucket # 1(c).”</p>	<p>! Over what period of time may the facility’s meter data be netted against the final adjusted E-tags from the contract? Hourly? Monthly?</p> <p>! What additional technology, data, or systems, if any, are needed to track, compute, and produce for verification these comparisons of meter data with final adjusted E-tags? How does the answer to this question impact the feasibility or reasonableness of any particular netting period, as discussed in the bullet above?</p>

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RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
	<p><i>eligible renewable energy resource shall count toward this portfolio content category.”</i></p>			

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# RPS Product Matrix

# REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
<b><u>Bucket #1(d)</u></b>	<p>399.16(b)(1)(B):</p> <p>[re dynamically scheduled transactions]</p> <p><i>“Have an agreement to dynamically transfer electricity to a California balancing authority.”</i></p>	<p>! Any transaction in which the energy from an ERR located within the WECC is dynamically transferred into a CBA;</p> <p>! Able to show agreement between generator and CBA (and, if necessary for a pseudo-tie, with the host BA) that allows for the CBA to dynamically transfer the electrical output from the eligible renewable resource to serve CBA load.</p>	<p>! Qualifying interconnection agreements include pseudo-tie agreements and dynamic scheduling agreements (or functional equivalent).</p> <p>! Bundled deliveries pursuant to a dynamic transfer agreement (or functional equivalent).</p>	
<p><b><u>Bucket #2</u></b></p> <p><b><u>“FIRMED AND SHAPED TRANSACTION S”</u></b></p>	<p>Section 399.16(b)(2):</p> <p><i>“Firmed and shaped eligible renewable energy resource electricity products providing incremental electricity and scheduled into a California balancing authority.”</i></p>	<p>! Electricity products must derive from eligible renewable energy resources located with the WECC.</p> <p>! REC must be “E-tagged” to energy scheduled for delivery to a CBA;</p> <p>! Energy to which the REC is “E-tagged” must be “incremental”</p> <p>! Energy to which the REC is “E-tagged” must have been delivered to the CBA within the same calendar year of the</p>	<p>! Retail seller buys bundled product of energy and RECs from an ERR not located in a CBA. Energy is immediately sold off locally. Retail seller tags the RECs from the RPS PPA to the E-tags for the imported incremental energy within the same calendar year that the RECs were generated.</p> <p>! Procurement of bundled product from ERR outside of a CBA. ERR intends generally to qualify as</p>	<p>! What is the definition of “incremental electricity?”</p> <p>! Are there any additional attributes or contract structures that must be included to qualify procurement as a “firmed and shaped” product (i.e., concurrent procurement, fixed price agreement, etc)?</p> <p>! Should there be a grace</p>

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# RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
		creation of the REC within WREGIS.	Bucket #1(c) by scheduling imports directly into a CBA. However, ERR cannot transmit its full contract quantity into a CBA within the time period specified for Bucket #1(c). In the same time period, ERR delivers a firm schedule for import into the CBA using some substitute energy. The “stranded” RECs are tagged to the substitute energy within the same calendar year and qualify as Bucket #2.	<p>period beyond the calendar year during which the tagging process may be “trued up?”</p> <p>! Must the term of the firming and shaping agreement described in the first illustrative contract structure match the term of the RPS PPA producing the RECs?</p> <p>! What other contract structures or variations on the consensus contract structures qualify as bucket #2?</p>
<p><b><u>“Bucket #3”</u></b></p> <p><b><u>All Other RPS Products</u></b></p>	<p>[Section 399.16(b)(3):]</p> <p><i>“Eligible renewable energy resource electricity products, or any fraction of the electricity generated,</i></p>	<p>! Any certificate registered within the Western Renewable Generator Information System (WREGIS) that does not qualify as Bucket 1 or Bucket 2.</p> <p>! No energy and/or capacity need be associated with this type of</p>	<p>! Retail seller procures unbundled RECs from an ERR located within WECC, but not in a CBA. Retail seller does not “tag” these RECs to any energy.</p> <p>! Energy to which a REC generated by a non-CBA facility is tagged is</p>	

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RPS Product Matrix | REFERENCE PROPOSAL OUTLINING AREAS OF BROAD CONSENSUS AND OPEN ISSUES

Issue or RPS Portfolio Content Category Requiring Interpretation	New Statutory Language (from SB 2 (1X))	Consensus RPS Product Description	Consensus Illustrative Contract / Interconnection Structures	Open Issues (No Consensus)
	<i>including unbundled renewable energy credits, that do not qualify under the criteria of paragraph (1) or (2)."</i>	transaction.	imported outside the same calendar year or is not "incremental."	

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