2017 DRAM RFO Frequently Asked Questions (FAQs)

Demand Response (DR) Product Type Specific Questions:

Request for Offers (RFO)/General Purchase Agreement Capacity Demonstration and Must Offer Obligation Supply Plan / RA / Local / System / Flex Proxy Demand Resource (PDR) / Reliability Demand Response Resource (RDRR) CAISO Registration Scheduling Coordinator Back-Up Generators Customer Eligibility CISR-DRP/Green Button

I. Request for Offers (RFO)/General

Please read the Frequently Asked Questions (FAQ) from the 2016 DRAM RFO for more information, as many questions and answers from the 2016 DRAM RFO would apply to the 2017 DRAM RFO. The FAQ document was developed collaboratively by the three IOUs, and is the same for all three. <u>http://www.sdge.com/2016-demand-response-auction-mechanism-dram#faq</u>

1. You have stated a 2MW minimum; is there a maximum limit or cap for these offers?

The maximum project size is 2 MW for SDG&E and 10 MW for SCE and PGE). The maximum total cost of all contracts including capacity payments, SC costs, and administrative costs cannot exceed \$1.5 M for SDG&E and \$6M each for PG&E and SCE. The total registrations can't exceed the available registration limits under rule 24/32 or any increase beyond these registration limits approved by the CPUC. Each respondent is allowed to make 20 offers and so if you wish to offer more capacity, you can do that through multiple bids. However please note there is no guarantee offers will be taken up to these maximum limits.

2. Is this DRAM only for a single year and not renewable?

Correct, this RFO is just for calendar year 2017 projects.

3. Will the same methodology be used to evaluate offers as in 2016?

The methodology has changed slightly from the 2016 DRAM as the IOUs have strived to conform to a single methodology in consultation with the IE.

4. Will PG&E allow for bidders to denote inclusive and exclusive offers?

PG&E will allow Bidders to denote Offers that are "exclusive" of each other. All Offers that are "inclusive" of each other should be listed as part of the same Offer number.

5. Would the IOUs either consider postponing the RFO until a decision has been made on the available 2017 registrations or assume a larger amount and if registrations exceed the registration levels ultimately authorized by the CPUC, the IOUs could adjust the winning bids on a pro-rata basis?

The IOUs have worked with the CPUC to adjust the timeline as to better align with the Rule 24/32 proceedings. Please see the updated schedule posted on the respective IOU DRAM websites.

6. What happens if an offer has a negative "net market value"? Is the offer automatically rejected?

For the purposes of the 2017 DRAM RFO, the offers with a negative "net market value" (NMV) are not automatically rejected. The offers with a negative NMV would rank lower than offers with a positive NMV.

7. For SCE's RFO, can multiple product types be bundled in a single offer that counts only once against the maximum number of offers (20)?

This question has already been answered in the bidder's conference Q&A.

8. For SDG&E's RFO, does a single offer with multiple variations count once or multiple times against the maximum allowed number of offers (20)?

Multiple

9. For PG&E's RFO, does a single offer with multiple rows in the offer form count once or multiple times against the maximum allowed number of offers (20)?

A single offer with multiple rows would only count once against the maximum number of Offers.

- 10. SDG&E's DRAM instructions state, on page 13: "For each month, the total Offer cost (quantity multiplied by price plus scheduling coordinator costs) will be subtracted from the benchmark and multiplied by the capacity. The monthly net costs will be summed together for all months, divided by the average monthly capacity and increased by the resulting qualitative score percentage to derive a Net Market Cost ('NMC')."
 - I. Can SDG&E please clarify whether the first sentence should instead read "[...] subtracted from the benchmark multiplied by the capacity"? It is our understanding that SDG&E's benchmark is a price (measured in \$/kW-month),

and that this benchmark will be multiplied by capacity offered in order to calculate the gross value of the Offer.

- II. Can SDG&E please clarify that it is calculating a Net Market *Value*, and not a Net Market *Cost*?
- III. Can SDG&E please clarify that "average monthly capacity" is calculated by summing the capacity offered in each month and then dividing by 12 (and *not* by dividing by the number of months in which a non-zero capacity quantity was offered)?
- I. Yes, that is correct

II. There are other steps involved with a full Net Market Value calculation that occurs in other RFOs that are not being performed in the DRAM because of the nature of this RFO as well as to emphasize that the key element of this calculation is the cost of the Offer and that it is not being compared to other products.

III. It is divided by 12, not the non-zero months, in order to put the answer in a unit similar to \$/kW-year. Mathematically this is irrelevant to the bid and the offer rankings as it is merely a normalization constant.

11. PG&E's DRAM instructions state, on page 9: "Offers will be ranked by net market value per unit -- in units of \$/kW-year -- from highest to lowest. A net market value per unit is calculated using total net market value in dollars for the numerator, and weighted average monthly volume in kilowatts for the denominator." Can PG&E please clarify whether it will, in fact, compute a *weighted* average monthly volume in the denominator of NMV? It seems to us that weighting the capacity quantities in the denominator is unnecessary: the benchmark values used in the numerator already capture the differential value of capacity across months and across RA product types. Moreover, weighting by anything other than 1/12 -- that is, computing the *simple* average -- fails to convert the denominator units to \$/kW-year. (We note that SDG&E states it will compute a simple average in the denominator of its NMV calculation.)

For PG&E's 2017 DRAM RFO the monthly weights will be the same for each month, consistent with the other IOU's methodology and use of a simple average.

12. SCE's DRAM instructions state, on page 12: "SCE will perform a quantitative assessment of each conforming Offer individually and subsequently rank the Offers based on each Offer's benefit and cost relationship. Benefits are comprised of Resource Adequacy credit (Contract Quantity), while costs include the offered capacity price per kilowatt, and Scheduling Coordinator fees. Evaluation will consider that each month the DR provided will have a different value and will use relative value weights for each month, reflecting the different value of RA throughout the year." Can SCE please clarify whether it intends to calculate a Net Market Value for each offer in the same manner as SDG&E and PG&E?

IOUs intend to calculate a Net Market Value (Cost) for each offer in the same manner, using the same overall evaluation methodology.

13. Does SCE expect to modify total budget available for DRAM after the ruling by Commissioner Florio from yesterday to expand DR as a result of the Aliso Canyon gas storage leak?

We don't expect to modify the total budget available for DRAM at this time.

14. For the DRAM 2016 RFO, the IOUs provided guidance that in order to participate in DRAM 2017, bidders would have to be selected for DRAM 2017. However, in reviewing the various RFO Protocols and listening in to the bidder's webinar, it does not appear that is a requirement for DRAM 2017. Can you please clarify?

Participation in the 2016 DRAM RFO is not a prerequisite for participating in the 2017 DRAM. To be a Seller in the 2017 DRAM, you must have a winning bid in the 2017 DRAM RFO. The IOUs will notify bidders if they have a winning bid (i.e., a Selected Offer) on June 24, 2016.

15. Will bids based on behavioral based residential DR program designs be accepted?

Yes.

16. Regarding the program budget and max capacity (PG&E and SCE: \$6M/10MW for each IOU; SDG&E: \$1.5M/2MW), do these numbers represent the maximum budget/capacity for the entire program or per maximum vendor bid? Does that mean that the maximum budget is about \$600 per kW (i.e. \$6M / 10,000 kWh)?

The budget is the program maximum. The capacity is the minimum program target for each IOU, assuming the IOUs receive reasonably priced bids, and the maximum single offer size. If an offeror would like to offer more total capacity, please submit multiple bids. If the maximum program was met by the minimum capacity target, then on average for the total program including capacity payments, SC costs, and IOU administration the average would be \$750/kW for SDGE and \$600/kW for SCE/PG&E. However, in the 2016 DRAM the IOUs signed more than the minimum MW targets, and spent less than their maximum budgets, because prices were less than the maximums listed in this example. As a reminder, this is a competitive solicitation and we encourage Bidders to submit competitive bids.

17. Clarification on Bidders' Conference FAQs, "General" section response: ""When being notified of selection, SDG&E and PG&E will let the Offeror(s) know the order that offers must be selected or rejected in, which will be based on the Offer ranking methodology for each IOU."

Does that mean that the offers are ranked based on the weighted average as stipulated in the RFO? Are there any other criteria that will play into how these are ranked besides the weighted average?

Offers will be ranked by each IOU according to the Net Market Value (NMV) per unit metric (SDG&E calls this the Net Market Cost [NMC]). NMV per unit is calculated using total net market value (\$) for the numerator, and average monthly volume (kW) for the denominator. You may refer to each of the IOU's DRAM RFO Protocols for more information on how the IOUs calculate the NMV per unit. Additional qualitative application may be found in the table of SDG&E and PG&E's issuance documents. SCE will not apply additional factors.

18. Clarification on Bidder's Conference FAQs, "General" section response: "Each offer will go through the same methodology to be ranked. The valuation weighs different products such that they can be put onto equal footing and compared directly. All offers will be ranked together (system, local, flex) based on the net market cost methodology and shortlisted based on the most net benefit, or least net cost, to the IOU's ratepayers."

Does that mean the valuation and shortlisting will be looking at different metrics, or the same metric? How are the two calculated differently? Is this the same as the weighted average cost discussed as the quantitative metric in the RFOs?

Each offer and product type will be ranked and evaluated using the exact same methodology/metric (weighted average cost) as discussed in the evaluation section of each IOUs protocol documents. However, the exact weightings used in the methodology may differ depending on certain things such as what month the Product is offered in.

19. During the Bidder's Conference Call, a caller asked the three IOUs if different weighting or value will be assigned to different RA product types. The call leaders from PG&E, SCE, and SDG&E stated that:
I) PG&E and SCE will not assign differing value on the various RA product types (System, Local, Flex Category 1, etc.)
II SDG&E will place higher value on Flex Category 1, then 2, then 3.

Can you please confirm this is the case?

- I. This is correct for PG&E and SCE.
- II. Confirmed.

II. Supply Plan/RA/Local/System/Flex

1. Will category 1 "base ramping" flexible RA be considered a PDR or RDRR or multiple PDR and RDRR in SDG&E's Sub-LAP?

All Flexible Capacity supply side DR resources that qualify and receive EFC can only be offered as a PDR resource, not as an RDRR resource.

Multiple DR resources located within Sub-LAP may be aggregated to form a single, RA-eligible DR resource. However, Storage and DR may not be jointly aggregated to create a combined Storage- DR resource at this time per CPUC D.14-06-050, Appendix B.

2. For an offer to qualify as local RA, is it required to offer a minimum size in all 12 months?

This is a requirement in SDG&E's RFO; it is not a requirement for SCE or PG&E.

3. Do the utilities need to procure local and flexible RA in 2017 DRAM?

There is no requirement or minimum target specifically for local/flexible RA in the 2017 DRAM.

4. Flexible RA categories 2 and 3 are 3 hour products, delivered in a 5 hour period. When submitting an RA bid, is a time also submitted, or does the CAISO assign

the award time based on system ramping needs?

IOUs encourage each Offeror to read through the CAISO Tariff and Business Practice Manuals (BPMs) that lay out the bidding rules. In general, for Flex RA resources, the Scheduling Coordinator (SC) must submit economic bids into the CAISO market during all five hours of the Flex RA and four hours of the System RA Must Offer Obligation (MOO) periods. Both periods change seasonally, as detailed in the CAISO BPMs. The CAISO will assign awards based on a market-wide optimization of energy bids and energy demand.

When bidding into the DRAM RFO, the Sellers do not have to identify to Buyer what hours the resource will be available; the Sellers simply warrant that they will abide by the CAISO requirements above.

5. For each utility offer processing: can the same PDR/customer set be submitted and accepted for multiple offers ASSUMING no month with non-zero capacities overlap? The applicability of this would be if a resource aims to deliver generic RA for part of the year and flexible for a different part. As the months would not overlap, the resource could satisfy multiple offers.

Offeror can submit multiple offers. The IOUs may select multiple offers if permitted by the Offeror (please see the RFO instructions on how to designate exclusivity/inclusivity and relationships between multiple offers).

SDGE: Assuming no months overlap, yes the same set of customers can be offered in and selected as winning Offers and would be different offers, not variations of the same offer.

Please note that SDG&E's 2017 DRAM RFO Offer Form, posted on the 2017 DRAM RFO website and PowerAdvocates, has been updated. This update is to allow Offerors to submit different category flexible products for each month per Offer/Variation.

For more information on Flexible RA please see the relevant CPUC decisions (such as 14-06-050 and D15-06-063) and the relevant CAISO tariff and business practice manual sections. Please email us if you have any further questions.

PG&E and SCE: Yes, the same customers can be submitted for multiple Offers, if the months of non-zero capacities don't overlap. Bidders should indicate when Offers cannot both be accepted for execution.

6. I have read the applicable D.14-06-050. If a resource, such as a battery, has the technical capability to charge and discharge at both a constant rate and ramping rate, may it select an EFC categorization (constant discharge, constant charge, ramping charge, constant bi-directional, ramping bi-directional)? Or must it deliver the product type according to its operational capabilities, (rather than its operational optimization)? How is it's EFC Calculated in either case?

No, it may not select an EFC categorization. Yes, it must deliver according to its operational capabilities. The EFC of a PDR is described in CAISO tariff 40.10.4.1(c).

III. Capacity Demonstration and Must Offer Obligation

1. The schedule says the product has to have a minimum bid of 100kW/month and a minimum of one month that includes August, 2017. Does this mean a minimum bid of 100kW for the month of August, 2017 will be considered?

SCE and PG&E: Yes, that is the bare minimum bid for a PDR. An RDRR must be at least 500 kW

SDGE does not require an August bid, however the PDR and RDRR minimum bid sizes apply, as described in the CAISO tariff.

IV. Purchase Agreement

1. Can PG&E confirm that they will only require e-signatures for the PA?

For PG&E's Selected Offers, Bidders may sign the Purchase Agreement using either wet signatures or electric Docusign, Adobe eSign, or other similar electronic signature mechanism.

2. Article 2.01: "The Product must be eligible for inclusion in compliance filings with the CPUC." What is defined as a "product"? Is it a category (i.e., behavioral DR) or a specific product (i.e., Bidgely HomeBeat)? If specific product, how do we determine "corresponding monthly Net Qualifying Capacity" if the capacity varies depending on the user behavior?

"Product" is defined in Exhibit A of the Purchase Agreement, and specified in Section 1.1(b); simply it is your offer. The Offeror submits their contractual maximum capacity per month as part of their Offer.

3. Article 2.01: "The product must be eligible for inclusion in compliance filings with the CPUC." What does this mean? By when is this required?

It means that the Offeror's Product must meet the CAISO and CPUC requirements for that capacity Product, and confirmed for use by the IOUs in their compliance filings with the CPUC. The year ahead filling is due in October. The monthly filings are due approximately 60 days before each showing month. Please see the RA filing guide for more information: http://www.cpuc.ca.gov/WorkArea/DownloadAsset.aspx?id=6454

4. Is there a penalty for not delivering the proposed minimum bid? (I.e. we bid 100kW and only deliver 50kW)?

Note that the CAISO will not accept bids less than 100 kW/500 kW for PDR/RDRR. Penalties resulting from certain failures to perform are provided in Section 3.5 of the PA. This does not include any penalties assessed by the CAISO or other organizations.

V. Proxy Demand Resource (PDR)/ Reliability Demand Response Resource (RDRR)

1. Would RDRR need to satisfy the same Must Offer Obligations that applied to PDR in 2016 for Day-Ahead and Real Time? Or would the DA offer be optional as long as RDRR is available to be enabled during transmission emergencies or capacity deficiencies?

Per CAISO Tariff, an RDRR resource is not required to bid into the DA market.

Note that in Exhibit C-1, there is a mistake in the language describing the Demonstrated Capacity MOO option stating that the Product "Must be bid into the Day-Ahead Market", which is in conflict with Section 1.6(a)(ii) stating that the product be "...Bid into the applicable CAISO Markets...". The applicable CAISO market for RDRR is the Real-Time market and the language in Exhibit C-1 will be corrected before the PA is signed.

2. Is there a MW cap for the total amount of RDRR the utilities can procure? How would PG&E determine that?

The utilities are subject to an aggregate cap on the amount of emergency DR program MW that can be procured, pursuant to Decision 10-06-034. However, there is no MW cap on the amount the utilities can procure in the 2017 DRAM.

3. Is there a preference between PDR and RDRR resources? I understand that PG&E mentioned during the Bidders' Conference that they assign the same value to PDR and RDRR in benchmarking. However, how would PG&E choose between 2 bids if they are of equal size and price but one is for RDRR and the other is PDR?

There is no preference between PDR and RDRR resources.

4. Could seller offer Non-Residential PDR in A0_System and RDRR in A0_System bundled in one offer? How will PG&E evaluate that? Or 1 PDR offer inclusive with another RDRR offer? For example: What would be the "Net Market Cost" for the 3 offers listed below?

PG&E: A Seller can offer PDR and RDRR resources in one Offer, PG&E will combine the net market values for the 2 (or more) resources into one number, in order to rank bids. SCE: A Seller may indicate the certain offers are "inclusive", meaning they must be selected together. SCE will combine the net market values of these inclusive offers and rank the bids. SDGE: Each variation of an offer must either be a PDR or an RDRR. They cannot be combined in a single offer. If there are unique customers for each, those may be submitted as separate Offers.

5. Are the PDR vs. RDRR listed in the offer binding? In other words, could a Seller decide at a later date after executing a contract to use PDR resources to satisfy the DRAM obligations instead of RDRR resources (if listed RDRR in the original offer submitted) or vice versa?

SDG&E: The PDR and RDRR listed in the Offer ARE binding.

PG&E: The PDR and RDRR listed in the Offer form <u>ARE NOT</u> binding. However, in switching between the two, Sellers should consider any impacts to defined Products submitted in an

executed DRAM contract, and any CAISO requirements regarding notification or processing time.

SCE: We do not request PDR/RDRR differentiation on the offer form.

VI. CAISO Registrations

VII. Scheduling Coordinator

1. For new bidders without customers in the territory, are there consultants or scheduling coordinators that you can recommend we work with prior to formulating our bid?

The IOUs do not endorse or recommend any SCs. However, the IOUs conducted an SC survey in 2015 to see what SCs were interested in participating. Survey results are available at:

http://www.pge.com/includes/docs/pdfs/mybusiness/energysavingsrebates/demandresponse/d ram/DRAM_SC_RFI_Aggregated_Information_Packets.pdf

2. Can we submit our bid pricing net of the scheduling coordinator costs? If so, can we make arrangements for scheduling coordinator services after contract award, or do we have to pick a scheduling coordinator at time of bid?

SC costs must be declared up front in the Offer and the Offeror will not get paid more than what is in the Offer.

VIII. Back-Up Generators

IX. Customer Eligibility

1. Are maps/zips available for the LCAs for the local product?

SDGE: Only has a single sublap. See the posted maps on the RFO website for a more detailed geographical view.

SCE: Maps are available on SCE's DRAM RFO website.

PG&E: A list of PG&E LCAs and associated substations is provided in Exhibit F of the Purchase Agreement. In the "Other Information" section of PG&E's 2017 DRAM RFO website, there is a hyperlinked map of PG&E's electric system that includes PG&E substations and a link to the CAISO Local Capacity requirements website.

2. Will the awarded vendor have access to residential customer info (name, address, e-mail address, phone #, etc.) from the IOUs for the purpose of customer recruitment?

No, it is up to the Sellers to find and recruit customers for their Selected Offers on their own.

X. CISR-DRP/Green Button

1. Will PG&E and SDG&E allow for any form of legally acceptable e-signature for the CISR forms for 2017 or must a third party solution be used again for 2016?

PG&E: We don't know yet whether or not we will expand the e-signature options for the CISR forms in 2017.

SDG&E: SDG&E is in the process of implementing a central and automated web-based platform for customers and third parties to submit and manage Letters of Authorization using digital signatures. This solution will help to enable third parties to more efficiently and quickly receive customer authorization, ensure compliance with existing privacy mandates, preserve trust by ensuring responsible sharing of customer information with third parties, and improve the customer's experience in a variety of contexts. SDG&E is planning to issue a Request for Proposals ("RPF") in the near future to select a vendor for this work, with a tentative implementation date of mid-2017. In the interim, SDG&E will allow the same e-signature process temporarily adopted as part of DRAM I to continue until the permanent solution is implemented.

2. Will SCE CISRs allow for two DRPs on the form for 2017?

No. SCE allows one DRP per form. Customer can submit multiple CISR forms if needed.

3. Will there be any change in SCE's green button experience for 2017? Will DRPs be able to integrate green button connect into its user experience using Open Authentication?

There are no changes in SCE's green button experience for 2017. DRP's are able to integrate Green Button Connect My Data into its user experience today using Open Authentication.