



December 20, 2017

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FILED

2017 DEC 20 P 2:44

The Honorable Chair and Members
of the Hawai'i Public Utilities Commission
Kekuanao'a Building, First Floor
465 South King Street
Honolulu, Hawai'i 96813

PUBLIC UTILITIES
COMMISSION

Subject: Docket No. 2017-0352 – To Institute a Proceeding Relating to a Competitive Bidding Process to Acquire Dispatchable and Renewable Generation Companies' Response to Stakeholder Comments

Dear Commissioners:

This letter and attached exhibit are being submitted by the Hawaiian Electric Companies¹ as a supplement to the Companies' proposed competitive bidding process filed with the Commission on October 23, 2017 in accordance with Order No. 34856 *Opening The Docket* issued on October 6, 2017 in the subject proceeding ("Order 34856"). This letter and attached exhibit are intended to respond to stakeholder comments submitted to the Commission and help further stakeholder engagement. The Companies appreciate the thoughtful engagement of many stakeholders across a broad cross-section of the community.

The Companies have already taken many steps to further facilitate community and stakeholder feedback on the proposed competitive bidding process. Since the Companies' October 23, 2017 filing, the Companies provided additional supplemental information to stakeholders including providing Microsoft Word versions of many of the documents filed. The Companies also hosted a webinar and technical workshop on their proposed Renewable Dispatchable Generation ("RDG") power purchase agreement ("PPA"), as well as a technical conference for the draft request for proposals ("RFPs"). Recordings of the webinar and technical conference are available on demand on the Companies' website at www.hawaiianelectric.com/competitivebidding.

In the interest of continuing to "engage with stakeholders regarding the competitive procurement process"² as stated in Order No. 34932 *Declining to Amend the Initial Procedural Steps Set Forth in Order No. 34856* in this docket ("Order 34932"), the Companies desire to share with the Commission their perspective on comments received to help facilitate the Commission's determination of appropriate next steps in the proceeding. (Order 34932 also stated that the Commission will issue further orders firmly establishing the timing of forthcoming procedural steps to govern the course of this proceeding after the November 13,

¹ The "Hawaiian Electric Companies" or "Companies" are Hawaiian Electric Company, Inc. ("Hawaiian Electric"), Hawai'i Electric Light Company, Inc. ("Hawai'i Electric Light"), and Maui Electric Company, Limited ("Maui Electric").

² Order 34932 at 2.

2017 deadline for the filing of stakeholder comments with the Commission.) The Companies approached the comments received as an opportunity to help improve the procurement process and to facilitate the successful achievement of the State's 100% renewable energy goal.

Through the comment filing process, as well as through emails to the Companies' designated dedicated email addresses, over 400 pages of comments from 17 stakeholders were received. To the extent possible, questions received through the email addresses were responded to via Q&A pages on the Companies' websites. The Hawaiian Electric Companies respectfully submit their consolidated responses to stakeholder comments in Exhibit 1 – The Hawaiian Electric Companies' Consolidated Responses to Stakeholder Comments.

The comments were each given careful consideration and the Companies are already working on incorporating suggestions from stakeholders where possible to help the Companies achieve the 100% renewable energy goal. The Companies have organized the received comments by topic with responses organized by major themes: (1) Evaluation; (2) Reverse Auction; (3) Scope/Schedule; (4) Self-Build/Code of Conduct; (5) Offshore Wind; and (6) draft model PPAs.

The Companies believe that providing their position with regard to many of the comments received will help speed the overall process as it will allow the Companies to continue their open dialogue with stakeholders, the Commission, and the community to improve and possibly further streamline the competitive bidding process. Where the Companies disagree with the suggestions or are unable to accept the suggestions proposed, the Companies have provided explanations as to why the proposed changes could not or should not be made.

The Companies appreciate the feedback received and believe that receiving such feedback earlier in the process has allowed the Companies to improve the Companies' draft request for proposals and PPAs and help to facilitate Commission review and approval.

Sincerely,



Shelee M. T. Kimura
Senior Vice President
Business Development & Strategic Planning

Attachment

cc: Division of Consumer Advocacy

Exhibit 1
The Hawaiian Electric Companies' Consolidated Responses to Stakeholder Comments

The Companies' competitive bidding process was set forth in detail in their draft Request for Proposals for Firm Capacity Renewable Generation on the island of Maui ("Draft Firm RFP") and draft request for proposals for Variable Renewable Dispatchable Generation on the island of O'ahu ("Draft Variable RFP") (collectively "Draft RFPs") filed on October 23, 2017 (collectively, "October 23, 2017 filing"). The Hawaiian Electric Companies'¹ are encouraged by the thoughtful engagement of the many stakeholders that submitted comments in response to the Companies' Draft RFPs. The Companies truly believe that collaboration of all stakeholders will be necessary to achieve the Companies' procurement objectives and to successfully achieve the State's 100% renewable energy goal. To that end, all of the feedback received to date has been given careful consideration and is being used to clarify or improve the Draft RFPs and proposed competitive bidding process.

As stated in Exhibit 3 of the Companies' October 23, 2017 filing ("Exhibit 3"), in developing the competitive bidding process for each of the Draft RFPs, the Companies established and followed these guiding principles: (1) the Companies' Power Supply Improvement Plans ("PSIP") provide the roadmap, (2) transparency, predictability and streamlining lowers costs to customers and fosters trust in the process; (3) community engagement is critical to near-term and long-term project success; (4) coordination and collaboration of all parties involved is necessary to achieve a successful and timely procurement; and (5) there is no perfect answer, tradeoffs must be considered. These guiding principles shaped the Companies' responses to the comments.

This Exhibit 1 consolidates the Companies' responses to the filed stakeholder comments regarding the proposed competitive bidding process set forth in the Draft RFPs and the Companies' plans to successfully execute such processes. In order to streamline the Companies' responses to the numerous comments received, the comments and respective responses have been organized by the following general topics:

1. Evaluation
2. Reverse Auction
3. Scope/Schedule
4. Self-Build/Code of Conduct
5. Offshore Wind
6. Draft Model PPAs

¹ The "Hawaiian Electric Companies" or "Companies" refers collectively to Hawaiian Electric Company, Inc. ("Hawaiian Electric"), Hawai'i Electric Light Company, Inc. ("Hawai'i Electric Light"), and Maui Electric Company, Limited ("Maui Electric").

Evaluation

The Companies believe that transparency and predictability in the RFP process is an important objective and guiding principle of a successful procurement process. The Companies are amenable to clarifying the proposed evaluation process and providing additional information in order to address many of the issues and questions raised by stakeholders.

A number of comments recommended that the Companies identify the weightings to be assigned for each of the non-price evaluation criteria. Each of the proposed non-price evaluation criteria addresses different facets of a proposal that are key indicators of a project's overall feasibility and viability. Therefore, the Companies propose to initially assign equal weight to each of the non-price evaluation criteria. Once the Independent Observer ("IO"), who is assigned by the Commission, actively engages in the RFP process, the Companies will consult with the IO to determine whether the weighting of the non-price evaluation criteria should be modified.

A few comments suggested that the IO play a broader and more active role in the RFP evaluation and selection process. On this point, the Framework for Competitive Bidding ("Framework")², which has been approved by the Commission and upon which the Code of Conduct and Manual is derived, specifically identifies two roles for the IO during the RFP process: advise and monitor to ensure a fair process. As with past RFPs, the Companies' expect that the IO will play an active role in the evaluation process of the RFPs consistent with the requirements of the Framework. All phases of the procurement process will be subject to the IO's oversight. In particular, all decisions with respect to the evaluation, selection, disqualification, etc., of proposals will be reviewed and discussed with the IO before final actions are taken.

Other comments requested additional information with respect to the scoring methodology. The Companies provide the following additional information with respect to the Initial Evaluation scoring methodology:

- In the Initial Evaluation, price related and non-price related scoring will be conducted independently.
 - The price related evaluation methodology is described in section 4.4.1 of the Draft RFP.
 - Proposed non-price evaluation criteria are identified in Appendix L of the RFP. Scoring of each proposal's non-price evaluation criteria will be based on a 1 (poor) to 5 (highly preferable) scale. (Each criterion's score

² See Docket No. 03-0372, Decision and Order No. 23121 (December 8, 2006).

may be multiplied by any assigned weighting, if different weightings are applied for the non-price criteria during the RFP review process.)

- The non-price related scores will be totaled for each proposal. Non-price evaluation points will be awarded in accordance with a relative ranking of total non-price criteria scores where the proposal with the highest non-price criteria score will be awarded the maximum number of points. All other proposals will then receive scores equal to the maximum number of points multiplied by the ratio of the proposal's total non-price criteria score divided by the top non-price criteria score. For example, if the maximum number of points is 400, and the highest proposal receives a score of 330 and another proposal receives a score of 300, the highest ranking proposal which was scored a 330 will be given 400 points and the proposal that scored a 300 will be given a score of 363.6 ($400 \times (300/330)$). The Companies anticipate applying the same relative ranking approach for the price evaluation as well.
- The Company, with input from the IO, will develop an internal Evaluation Protocol procedure that will guide the evaluation process and assist the IO in its function of monitoring each step of the evaluation process to ensure all proposals are evaluated consistently based on the established procedures and processes.

While the procurement process will be conducted in an open and transparent manner, the Framework contemplates certain aspects of the bidding process be closed where "bidders shall not have access to the utility's bid evaluation models [or] the detailed criteria used to evaluate bids." This is consistent with generally accepted procurement practices. In particular, the majority of utility RFPs for power supply of the nature undertaken by the Companies (i.e., RFPs for long-term resources from new generation projects with the objective to secure reliable resources at the lowest cost taking into consideration operations of the utility system) use closed evaluation systems. Closed bidding processes, like the one employed for these RFPs, will generally provide for oversight from an IO, assigned by the Commission, to review the methodology to be used and also to oversee the actual evaluation of proposals to ensure a fair application of the process for all participants. These processes are most applicable for RFPs where the utilities need to use sophisticated evaluation methodologies to evaluate the impacts of a proposal on total system costs and operations. Closed bidding processes generally result in less litigation than with open bidding or self-scoring type processes. Closed bidding processes are less susceptible to gaming by proposers, meaning that proposers would try to develop a proposal to maximize its points rather than prepare the best proposal to meet utility requirements. Open bidding processes are generally very simplistic systems and are not consistent with the type of evaluation process that takes into consideration the system impact assessment associated with each resource or portfolio of resources.

Therefore, while a closed bidding process is expressly contemplated by the Framework and is recognized as a generally accepted procurement practice under the circumstances, the

Companies also recognize that additional detail around the evaluation methodology may be useful and informative for stakeholders and is therefore amenable to providing the additional information set forth above.

One comment suggested that the evaluation be based more heavily on price than the 60% (price) / 40% (non-price) split proposed by the Companies. In addition to seeking low price proposals, the Companies must also ensure that the projects selected are viable and will reach commercial operations within the time frames specified in the RFPs. The non-price criteria evaluate the viability of the project. The Companies believe that a 60%/40% split still preserves price as the most important factor while also providing meaningful consideration to the important non-price elements of the proposals.

Other comments advocated for the inclusion of additional non-price criteria. The Companies believe that many of the existing attributes and criteria of the RFPs already capture aspects of the suggested additional non-price criteria and, therefore, the additional non-price criteria are unnecessary. For example, resiliency and reliability are already addressed by the PPA and performance standards and RFP requirements such as the maximum size of a facility. Similarly, the Community Outreach non-price criterion is meant to include consideration for economic development benefits. For other criteria suggested by stakeholders but not incorporated in Stage 1 of these RFPs, the Companies are open to possibly adjusting or adding to the non-price criteria in Stage 2 based on lessons learned during Stage 1.

Several comments received suggested that exceptions to the PPA should not be considered as an evaluation factor. The Companies do not agree with these comments. In the interest of meeting the aggressive timeframes required to achieve the stated goals of enabling the capture of the expiring tax credits, the Companies proposed that certain sections of the PPAs be pre-approved by the Commission to streamline the negotiation timeframe of the PPAs. In addition, by having non-negotiable provisions it is easier to compare proposals on an apples-to-apples basis and evaluate the price received. If PPA provisions can change after project selection, the economic benefit of the project may also change with developers shifting risk from themselves to the Companies' customers. These pre-approved sections should therefore be non-negotiable by awarded parties. Based on the Companies' significant past experience with PPA negotiations, there is a direct correlation between the number of exceptions made to the Model PPA and the amount of time required to negotiate the final terms of a PPA, which hinders the pursuit of a streamlined and expeditious RFP process.

In response to a question about the evaluation of variable generation systems of different technologies (i.e. fixed tilt vs. solar tracker PV), the Companies wish to clarify that as described in Section 4.4.1 of the Draft Variable RFP, the energy potential of a project will be evaluated using an equivalent energy price which considers the energy potential of the project.

Several comments were received relating to the process of evaluating the storage component of proposals for the Variable RFPs. The Companies recognize the need for more clarification and are still formulating an approach for this. The Companies recognize the need to appropriately value differences in the output profile of projects that the proposals with storage and different generating technologies offer. The Companies intend to add language to the RFP describing how this will be addressed to provide insight to bidders as to how this will be valued in the evaluation.

The Companies would also like to address concerns raised about the Companies' ability or intent to modify the RFPs after the final RFPs have been issued. As stated in the RFPs, any changes to the RFPs are subject to the Framework and must be reviewed by the IO and Commission. That said, while the Framework does allow the Companies to modify an RFP, the Companies have no intention to modify any aspect of the RFPs after the final RFP has been issued unless absolutely necessary.

Additionally, the Companies clarify that local experience in interconnecting projects to the Companies' grids means experience in the State of Hawai'i, and not on each particular island's electric system. The Threshold requirement for "Experience of the Proposer" will be clarified to ensure that the project teams members' cumulative experience match or exceed the size, scope, and structure of the proposed project.

Reverse Auction

In its comments, the Consumer Advocate stated that "a reverse auction process should be considered, especially in situations where the Hawaiian Electric Companies have a readily available site (i.e., Waena)," and "to the extent there is sufficient land at Waena, such a reverse auction process could be run in parallel with the currently proposed bidding process."³ The Companies believe that there could be value in conducting a trial of a reverse auction within one of its RFPs where variables can be fixed. The Companies did not include a reverse auction in the Draft RFPs filed on October 23, 2017 because such a process requires specifying the site, technology, size and project specifications in order to be able to compare bids solely on a price basis. This approach was not in line with the Companies approach of hosting technology agnostic RFPs and letting the market dictate the best and most economical technologies. However, as stated in Exhibit 3, "[t]o increase competition and potentially reduce pricing further the Companies contemplated a reverse auction process for project selection."

In response to the Consumer Advocates comments, the Companies are currently drafting a process and researching details to construct and carry out a reverse auction within the Maui Variable RFP – should the Commission decide to instruct the Companies to enable one. The Maui Variable RFP targets selecting two proposals on Maui in Stage 1 of the procurement

³ DCA Comments at 5.

process – one of these projects could be selected through a reverse auction. The Maui Variable RFP includes the offering of a company-owned Waena site to proposers. The use of the Waena site, and defining the technology (PV plus storage) and project specifications, would reduce the number of variables and create an environment where a reverse auction competitive bidding could be enabled. The Companies intend to provide the land with a minimum fee for the Waena site and to build the Company-owned interconnection facilities for the PV plus storage facility at no charge to the selected proposer. However, the selected proposer would be responsible for building the facility, including the cost of such facility and any needed equipment at the facility based on the results of the IRS.

As noted above, the Companies believe that a reverse auction process at Waena could serve as a trial and the Companies have identified two main objectives for the trial: (1) evaluate whether a reverse auction can result in lower prices or a more streamlined competitive bidding process than our traditional closed bid solicitation; (2) ensure the online reverse auction process is set up and completed fairly, with a level of transparency that can be observed.

The reverse auction process is envisioned to be structured as follows:

- The Maui Variable RFP will be bifurcated and constructed to solicit two sets of proposals. The first set would be for projects sited at Waena and the second set for projects sited on other sites proposers have secured. For proposals that choose to site a project on the Waena site, the Company will specify it must be a PV generation project with storage, and will provide specifications the project must meet within the RFP. For proposals that have chosen other sites, such proposers can propose other technologies that meet the RFP's specifications. The RFP bidding will close for all proposals at the same time.
- When proposals are received they will be separated into Waena proposals and traditional RFP proposals. All Projects will be evaluated to determine if they meet the eligibility and threshold requirements of the RFP. The reverse auction projects may have slightly different eligibility and threshold requirements from the traditional RFP process projects in order to account for the differences in the reverse auction process. For example, since the land for the reverse auction will be provided by the Companies, site control would not be a requirement. The Waena site proposals that proceed past the eligibility and threshold requirements will follow the path set forth below. The non-Waena site proposals will follow an evaluation process that will be similar to the one described in the October 23, 2017 filing of the Draft Variable RFP and conducted in parallel to the reverse auction process.
- The Waena site proposals that make it through the threshold evaluation will proceed to the reverse auction process. Assuming at least three Waena site proposals are received, not including any potential Self-Build proposal, the online

reverse auction will be conducted. The Companies have determined through research that at least three projects are needed in order to ensure a competitive process during the reverse auction. During the reverse auction:

- To incentivize proposers to propose low-priced proposals from the onset, only the lowest priced 50% of proposals, or the three lowest priced proposals if fewer than six proposals are received, will be invited to participate in the online reverse auction. The Companies are exploring the use of the PowerAdvocate procurement platform, which is already being utilized for the traditional RFP process, to host the online reverse auction.
- Though details are still being defined, the Companies envision the lowest priced proposal to be used as the opening bid in the online reverse auction. A set time period (e.g., an hour on a defined day) will be scheduled, and within that time period, proposers will be able to bid in real-time. Within that time period, the lowest prevailing price will be continuously updated. At the conclusion of that time period, the lowest bid will be declared the awarded project.
- If fewer than three Waena site proposals pass through the threshold evaluation, a winner will be declared based on the lowest priced proposal. No reverse auction will commence.
- To further incentivize proposers to propose their lowest prices, a Self-Build proposal will be allowed to submit a project for the Waena site. The Self-Build proposal will be required to submit their proposal one day before all other proposals are due in the RFP to help allay concerns of unfairness. The Self-Build proposal will also not be allowed to participate in the online reverse auction. It will be used to “set the bar” for other proposals to beat. The Self-Build proposal will only be able to be awarded the Waena site project selection if: (a) it is the only proposal received for the Waena site; or (b) it is the lowest priced proposal received and there are fewer than three other proposals received; or (c) it is the lowest priced proposal received and no other proposer beats the price of the Self-Build during the online reverse auction (in which the Self-Build cannot participate).

Conducting a reverse auction does not come without trade-offs and risks. First, reverse auctions have been used for more commoditized procurements such as trading blocks of energy, but the Companies have not come across other utilities that have used a reverse auction for the procurement of renewable resource projects constructed after award. Thus, the uncertainty of an unfamiliar process may raise hesitation for proposers to price their projects very competitively, or participate at all. Second, to provide assurances for proposers in the reverse auction process, the Companies will specify that the winning bid in the reverse auction will be selected in the final award. Doing so will assure the lowest priced project is selected from those bid in the reverse auction. However it will not guarantee the project selected from the reverse auction is

the lowest price project in comparison to projects received in the traditional RFP process nor will it guarantee that a proposer has lowered their price to the furthest point possible, as a proposer may have no motivation to do so after seeing the price to beat. Third, the reverse auction adds further complexities to an already complex RFP process.

If the Commission does agree to move forward with a reverse auction trial at the Waena site, the Companies will look to incorporate lessons learned from the reverse auction process to inform future solicitations, which may include technology and site specific reverse auction RFPs. Should the reverse auction process produce successful outcomes, the Companies might consider conducting a Land RFP to select lowest cost evaluated sites to enable site specific RFPs that will also enable pre-RFP steps such as site specific IRSs and interconnection projects for future RFPs.

Scope and Schedule

In the October 23, 2017 filing, the Companies explained that the scope of each RFP was based on the resource needs of each Company through 2022, as identified in the PSIP. The Companies have proposed a staged solicitation process for the variable generation RFPs to provide visibility to proposers on future opportunities that are consistent with the PSIP.⁴ The two stage process that the Companies are proposing will also allow for the streamlining of the competitive bidding process for all parties involved in order to facilitate the ability of initial projects to meet the safe harbor provisions of the declining ITC. The Companies believe that limiting the number of projects during Stage 1 of the procurement process will enable projects to move more quickly through contracting and PUC approval to qualify for the ITC and to meet target commercial operation dates. As stated in Exhibit 3, the proposed number of projects to be selected in Stage 1 was determined based on what the Companies reasonably believed based on past procurements could successfully be contracted for and approved in order to enable developers to safe harbor the 2019 ITC.

The main themes of the comments related to the Companies' RFP scope and schedule focused on (1) the RFP timeline, (2) the limitation on projects selected during Stage 1, (3) the one project per circuit limitation and prohibition of extensive system upgrades, and (4) the Companies' decision to have a technology agnostic RFP. The Companies respond to each of these categories of comments as follows.

RFP Timeline

Comments were submitted requesting that the RFP timelines be condensed even further than what the Companies have envisioned. The Companies proposed an already compressed

⁴Given the immediate needs for firm generation on the island of Maui, the Companies are not proposing a staged process for the Draft Firm RFP.

schedule compared to timeframes previously experienced in prior RFP efforts. We believe that the schedule as proposed is aggressive but balanced to allow for successful execution of the RFPs. As stated in Exhibit 3, “[t]his aggressive and compressed schedule is accomplished in part by 1) conducting staged solicitations, 2) limiting the number of projects selected in Stage 1, 3) negotiating PPAs in parallel with the IRS, 4) limiting projects to one project per circuit, and 5) having multiple, concurrent RFPs follow the same schedule where practical and efficient.”⁵ While the Companies agree that completing the procurement process as quickly as possible is a mutual objective of all stakeholders, there is not much room to compress the schedule any further without significantly increasing the risk to the successful execution of the process.

The Companies however do offer two considerations for the condensing of the timelines. A comment received proposed compressing the period for the submission of proposals from 60 days to 30 days. While the Companies believe some proposers may find 30 days to be too short, the Companies are willing to compress the period for submission of bids from 60 days to 45 days if such a period is acceptable to the Commission and/or the IO. Another comment also suggested accelerating the evaluation timeframes to arrive at the final award group earlier in the process. Because of the uncertainty of how many proposals will be received or how varying the types of proposals will be, the Companies express concern in compressing the evaluation period any further than what is proposed, which is already a compressed timeframe compared to past solicitations. That said, if possible based on the number and complexity of proposals received, the Companies are amenable to considering a shortened evaluation period in order to announce its final award group sooner and thereby accelerating the timeframes for each succeeding step in the process.

Notwithstanding the relatively minor schedule revisions that may be implemented above, the Companies believe the remaining categories discussed below will have the greatest impact on streamlining the evaluation process.

Limitation of Projects Selected in Stage 1

A number of comments from stakeholders stated that project awards for the variable RFPs should not be limited in Stage 1 and that the Companies should seek to fulfill their full megawatt hour requirements immediately. While the Companies certainly can understand a developer’s desire to allow for the selection of as many projects as possible, for the reasons stated above, the Companies remain committed to the belief that limiting the number of projects during Stage 1 of the procurement process will help projects move through contracting and PUC approval in a timelier manner. Even when timelines are carefully constructed, processes streamlined, and negotiations limited, contracting with multiple parties and completing interconnection requirements studies simultaneously still requires significant time and resources.

⁵ Exhibit 3 at 5.

These resources are unfortunately limited and the more projects that are accepted the greater the risk that contracting and completion of interconnection studies will take longer than scheduled. Selecting large multiples of projects at one time may also increase the burden on the PUC and Consumer Advocate to review and, as warranted, approve such projects. In addition to helping ensure a timely procurement, limiting the number of projects in Stage 1 may also lead to increased competition and lower pricing, as potential bidders should be incentivized to propose their most competitive bids to compete for the limited awards available. The Companies have, however, provided for the right in the variable RFPs to select more projects if they believe such projects would be beneficial to the Companies' customers and can meet the required timeframes.

One Project Per Circuit Limitation and Prohibition of Extensive System Upgrades

Several comments also questioned the limitation set forth in the RFPs limiting projects to one project per circuit and the prohibiting of projects requiring extensive system upgrades. As explained in the October 23, 2017 filing, the Companies believe limiting projects to one per circuit and requiring such project to fall within such circuit's available hosting capacity therefore limiting extensive system upgrades will hasten the IRS review process and will allow for simpler and faster interconnection to the Companies' systems. The simple explanation for this is that such limitations eliminate the need for multiple iterations of IRSs for combinations of multiple projects with local impacts. This simplification of the IRS process increases the likelihood of maintaining the proposed timelines by minimizing the complexity of cumulative effects and interdependencies. In addition, the Companies believe that projects that do require extensive system upgrades will not be able to achieve the guaranteed commercial operations dates required for these RFPs as established by the PSIP Update Report: December 2016. The Companies carefully considered options for allowing more than one project per circuit; however, this would significantly complicate and prolong the timelines for project evaluation, modeling and IRSs, placing projects at risk of missing the ITC as well as increasing the potential for increased interconnection costs and uncertainty, and therefore increased costs to customers.

Technology-Agnostic RFPs

The Consumer Advocate submitted a comment suggesting that price competition may be more robust when the solicitation is technology- and site-specific such that the primary determinant of the winning bid is price. The Companies have considered this perspective, but as discussed in the October 23, 2017 filing, the Companies generally seek to remain aligned with the PSIP to allow the market to dictate the most cost-effective technology. That being said, as previously discussed, should the Commission desire, the Companies are willing to include a technology- and site-specific reverse auction process within the Maui Variable RFP that could provide valuable insight to shape future RFP development.

Another comment received related to the inclusion of storage in the Draft Variable RFPs and questioned whether storage should be procured through these RFPs or through separate RFP

processes. The Companies carefully contemplated whether storage should be included in the RFPs or procured separately on a grid-level scale. While grid-level storage directly connected to the grid may allow for greater flexibility through the ability to be charged from any resource on the grid, the ability of proposers to take advantage of the ITC may allow for proposers to procure and install batteries coupled with their projects at a more economical price. Additionally, the Companies are also interested in determining if there are other potential storage solutions that could be provided by developers in conjunction with their generation project that takes advantage of the ITC. The Companies, however, also recognize that generation plus storage may lead to higher proposed prices than a simple generation only project. Further, the Companies are concerned that requiring storage may limit the number of potential projects proposed in response to the RFPs. Therefore, to maximize flexibility, the Companies will accept and evaluate both standalone generation projects and generation plus storage projects in the RFPs, and will take into account the benefits (or costs) of such storage component displacing future grid scale load shifting batteries as contemplated in the PSIP.

In seeking storage solutions in these RFPs, the Companies decided to seek characteristics in storage similar to the characteristics the Companies assumed for grid scale load shifting batteries in the PSIP.⁶ Acceptance of such storage from proposers could then lessen the amount of storage the Companies would need to procure separately and potentially reduce costs to customers. The Companies want to clarify, however, that they still intend to pursue grid-scale storage outside of these generation RFPs as described in the PSIP.

Self-Build / Code of Conduct

The next category of comments relates to the Companies' decision to allow for Self-Build proposals to participate in the RFPs, the Companies' updated Code of Conduct, which was filed as Exhibit 5 to the October 23, 2017 filing (the "Code of Conduct"), and its draft Code of Conduct Procedures Manual, filed as Appendix D to Exhibit 1 of the October 23, 2017 filing (the "Procedures Manual"). The Code of Conduct and Procedures Manual are required by the Framework which specifies that "where the electric utility is responding to its own RFP, or is accepting bids submitted by its affiliates, the utility will take additional steps to avoid self-dealing in both fact and perception."⁷ The Companies want to assure all stakeholders that the Companies are committed to conducting a competitive bidding process in a fair and unbiased manner, that all bidders have access to the same information to ensure no bidder has an unfair advantage, and that Self-Build and/or affiliate options do not have any unfair competitive advantage over third-party bids. Along these lines, a few comments noted the need to appropriately consider all costs associated with funding a Self-Build option. The Companies

⁶ In Stage 2 the Companies will use lessons learned in Stage 1 and reevaluate the storage options and requirements being sought to take advantage of advancements in technology and declining storage costs.

⁷ See Framework, Part IV.H.9 at 26.

agree that these costs should be factored in to the evaluation of any Self-Build proposal and will add instructions for including and identifying these costs in the RFP.

The Consumer Advocate has commented that the Procedures Manual contains an introductory clause that appears to imply that the Companies are given latitude to deviate from the established process. The Companies' intent with respect to this provision was to inform readers that the Procedures Manual was still subject to review and potential revision by the Commission and/or the IO (if the IO is given such authority). The Companies never intended to unilaterally revise the Procedures Manual (or the Code of Conduct) on its own after approval by the Commission and will revise provision(s) in the Code of Conduct and/or the Procedures Manual to clarify that any revisions to either document will only be those required by the Commission and/or the IO.

More specific comments were made to note apparent ambiguity in language and/or omissions which the Company acknowledges in a number of instances. Accordingly, the Companies will clarify certain provisions in the Procedures Manual to specifically prohibit the sharing of information between the RFP and Self-Build teams through Shared and Unassigned Company Resources and to note that the Code of Conduct does in fact apply to the Companies' Interconnection Services Department. Members of the Interconnection Services Department will be classified as Shared Resources for the purpose of categorizing such personnel and clarifying their responsibilities.

As to the Companies' intent to propose a Self-Build option, several of the comments received opposed the allowance of the RFP to entertain Self-Build options for a variety of reasons, including competitive and public interest concerns. The Companies believe that not only does the Framework allow for the Utility to formulate a Self-Build option, but that doing so ensures all options are considered in determining the best path forward. The Companies believe that the Framework arguably also requires a Self-Build option "[w]here the electric utility is addressing a need for firm capacity in order to address system reliability issues or concerns."⁸ The concept of a Self-Build option under the Framework is consistent with the Companies' responsibility to its customers to procure reliable generation for the lowest possible cost. A Self-Build option can provide a "price to beat" in reverse auction-type options, or present a viable alternative with less risk than a competing independent bid. Such an alternative is necessary in this current market, where competition between and consideration of all viable options, including a bid from the Companies, will provide customers confidence that new generation is being procured in the most efficient and least costly method, notwithstanding any ability to claim the ITC.

⁸ See Framework, Part VI.A at 29.

There are other comments, however, that the Companies received which, while acknowledged, cannot be accommodated with changes in procedures such as the concern that a lack of physical separation of the teams might result in the inadvertent sharing of information to the benefit of the Self-Build Team. The Companies acknowledge that limited space and resources prevent a complete separation of opposing team members. The Code of Conduct and the Procedures Manual are intended to manage any communications between Company personnel and consultants participating in the RFP process to ensure a functional separation between the RFP Team and the Self-Build Team. Further, members of the respective teams have been instructed not to share information intentionally or unintentionally and to keep electronic data in restricted files (created specifically for the specific teams) to prevent file sharing and to lock hard copies of documents in file drawers if members of the opposite team have physical access to the same areas.

Offshore Wind

The Companies received numerous comments in favor of including offshore wind projects into the Variable RFPs. The stated concern was that as drafted, Section 1.2.8 of the Oahu Variable RFP required that proposed projects be located “on the Island” of Oahu. The intent of the requirement was to focus on projects sourced on-island to serve the load on that island. The Companies endeavor to structure the solicitation to encourage lowest priced projects that displace higher cost fossil fueled energy that will fit in the system and enable utilization of tax credits by safe harboring of the 2019 ITC and reaching commercial operations by December 31, 2022. The Companies remain open to considering future offshore wind resources playing a role in achieving the Companies’ renewable goals. However, offshore projects do not align to the scope of these initial RFPs.

Section 1.2.5 of the Draft Variable RFP states that proposals that require extensive system upgrades will not be considered in this RFP. Offshore projects will require significant interconnection development and costs to fit onto the system. Given the current state of development, it is also highly unlikely offshore wind resources will be able to meet the 2019 ITC safe harbor target.

The RFPs also target projects that can satisfy the resource needs identified in the PSIP Update Report: December 2016. To align to the PSIP’s Near-Term Action Plan as well as the resources included in the PSIP for 2022, projects must achieve Commercial Operations on or before December 31, 2022. Comments received from proponents of offshore wind indicate a 2025 operational horizon which will not fit this RFP’s intent to acquire resources that will be counted on to contribute by the end of 2022. Section 1.2.2 of the Draft Variable RFP states the Companies will consider projects that cannot reach a commercial operation date by December 31, 2022 in subsequent RFPs. Additionally, it is highly unlikely that the Bureau of Ocean Energy Management site lease process will conclude in time to provide a potential proposer with the requisite site control to satisfy Section 4.3 of the RFP.

The Companies, however, understand the desire for offshore wind developers and other non-conforming projects to have an opportunity to further their projects. Therefore, in order to further gauge interest in the development of offshore wind and other non-conforming projects, the Companies are contemplating issuing an RFI, which will inform the design of Stage 2 of these RFPs and future procurement efforts. As stated in Exhibit 3, the Companies may make modifications to the RFP in Stage 2 to reflect advances in technology, including, storage, and/or declining costs of equipment.

Draft Model PPAs

A majority of the comments submitted to the Commission focused on the Companies' Model power purchase agreements ("PPAs"). The Companies recognize that the new Model RDG PPA in particular represents a major change from past practice in contracting for renewable energy resources, but is a change that is necessary in order to facilitate the achievement of the State's renewable energy goals.

The Companies continue to believe that the benefits of the RDG PPA, including the importance of moving to such PPA in order to be able to integrate more renewables on the system far outweigh the time needed for parties to evaluate the new Model RDG PPA. In an effort to draft a PPA that works for all parties, the Companies have consulted with industry experts to draft the RDG PPA using standard industry metrics, addressed accounting issues with the structure, and addressed finance-ability. In addition, many of the commercial terms in the draft PPA remain similar to previous PPAs with updates made based upon experiences drawn from those previous PPAs and feedback from the parties involved therein.

The Companies have also taken several steps to assist parties in understanding the new RDG PPA. The Companies hosted a webinar to provide an overview of the RDG PPA and a workshop where industry experts were available to answer questions regarding the importance of and structure of the RDG PPA. In addition, in response to stakeholder comments, the Companies' Draft Model PPAs were provided in Microsoft Word format on the Companies' websites so that the community can easily review such documents and provide feedback on the proposed competitive bidding process to the Commission and the Companies. As noted above, numerous comments were received on the Model RDG PPA and the Model Firm PPA individually, and on the Model PPAs in general. In the time since the PPAs were filed, the Companies have been working to clarify and improve the PPAs. To that end, the Companies appreciate the feedback already received that has assisted in that effort, such as clarifying language. The Companies remain open to making additional clarifications and improvements to the documents. With regard to other comments received on specific provisions in the Model PPAs, as stated in the RFP, proposers may provide a red-line version of the Model PPA with their suggested changes and revisions, if any, as a component of their proposal. The Companies will review and consider the requested changes and reflect the suggested changes in the overall risk assessment associated with the evaluation of each proposal.

As stated earlier, in the interest of meeting the aggressive timeframes proposed for these RFPs, the Companies maintain that certain sections of the Model PPAs should be pre-approved by the Commission and will therefore be non-negotiable. Several comments objected to the Companies request to make significant portions of the Model PPAs non-negotiable. As noted in the RFP, all provisions in the Model PPA that are deemed “non-negotiable” are subject to prior approval by the Commission. That said, the Model PPA addresses the respective rights and obligations of both the Companies and the proposer. As a whole, the Model PPA allocates certain risks between the utility and the proposer, as an independent power producer. Thus, once the Model PPA is approved by the Commission, any proposed revisions to the Model PPA (other than non-negotiable provisions) that would shift risk from the proposer to the Companies or its customers is strongly discouraged and will not be viewed favorably in the evaluation process. While these RFPs will utilize new Model PPAs, the Companies do not agree that these PPAs include a number of non-industry standard provisions that would unnecessarily add cost or risk to developers. That said, the Companies’ Model RDG PPA provides a contractual vehicle to integrate more renewables, provide flexibility on the Companies’ grids, and addresses financing risks previously raised by IPPs, while addressing the unique characteristics of Hawai‘i’s island grids. One comment received also pointed out errors to Section 3.8.3 of the Model Firm RFP’s identification of non-negotiable provisions. The correction has been made to the Model Firm RFP and was also posted on the Companies’ website’s Q&A section.

Comments were received regarding Model PPA provisions covering the assignment of the PPA to another entity. Assignment provisions were included in many of the Companies’ existing PPAs for projects that were successfully financed, constructed and are now operational. (See, e.g., the Power Purchase Agreement for Renewable As-Available Energy between Hawaiian Electric and EE Waianae Solar Project LLC, dated November 28, 2014, and filed in Docket No. 2014-0354.) In the context of the RFP process, the Framework expressly provides that “The electric utility may require bidders (subject to the Commission’s approval with other elements of a proposed RFP) to offer the utility the option to purchase the project under certain conditions or in the event of default by the seller (i.e., the bidder), subject to commercially reasonable payment terms.” Here, the Model PPAs contain a Right of First Negotiation to Purchase the Facility at the end of the Term of the PPA. While there is a Right of First Refusal that is part of the Right of First Negotiation, it is limited to situations such as that where Seller thereafter offers to sell the Facility to a third party for less than the final amount the Company had offered to purchase such Facility. All purchase options are subject to commercially reasonable payment terms as well as Commission approval. The Commission will ultimately consider and determine whether the transaction is in the public’s best interest. In bidding its proposed project, the proposer should factor in the existence of these purchase options. With respect to the possibility of the Right of First Negotiation being triggered prior to the end of the PPA term by lender security interests, the Model PPA already exempts from the Right of First Negotiation the sale and leaseback of the generation facility for financing purposes. Also, pursuant to the terms of the Model PPA, the Seller may also assign, pledge, mortgage, grant a

security interest in or collaterally assign the PPA, the Facility or any interest in the Facility (including any Ownership Interest or Ownership Control) with the prior consent of Company, where such consent shall not be unreasonably withheld, conditioned or delayed. This consent is important because it provides transparency into the ownership of the Facility.

While there were comments requesting the removal of interim milestones, the Companies maintain that interim milestones in addition to the Guaranteed Commercial Operations Date are crucial for project success. The Guaranteed Project Milestones represent critical milestones in the development of any proposed project. There are currently only two intermediate milestones, i.e. the “Procurement Payment Milestone” and the “180-Day Milestone”, which represent intermediate milestones that evidence whether a developer is pursuing development of the project in a diligent and timely manner. The Companies have very aggressive goals with respect to the addition of renewable energy and it is imperative that the Companies know sooner rather than later as to whether a project may not be placed into service. As such, intermediate milestones prior to the Guaranteed Commercial Operations Date are critical. Relatedly, the Companies clarify that the provision allowing for a revision to costs for Company-Owned Interconnection Facilities if deadlines are not met, as described in Attachment G of the RDG PPA, is a standard term in many of the Companies’ existing PPAs which were approved by the Commission.

In response to a comment regarding the liquidated damages amounts for certain milestones, despite the identified pressing need for the generation requested, the Companies will agree to use the amounts agreed upon in the Hu Honua PPA: \$1,000/day for milestone delay damages and \$3,500/day for Daily Delay Damages for the Firm PPA. For the RDG PPA, Daily Delay Damages are set at $\text{Contract Capacity} \times \$50/\text{kW} \div 180 \text{ Days}$. The Companies also will agree to modify the amounts of Development Period Security in Section 7.1 and remove the net zero minimum load capability reference in Attachment B, Section 3.i of the Firm PPAs. However, the Companies believe that the Operating Period Security amounts are reasonable as proposed and in line with recently executed PPAs.

With regard to other sections of the Model PPAs commented upon, such as the pre-effective date null and void provision, and the provision discussing notice and cure periods for events of default, the Companies maintain that these provisions are reasonable and consistent with recently executed PPAs between the Companies and IPPs. However, the Companies agree with the comment suggesting that any extension of the PPA term should recognize a downward pricing adjustment.

In addition, to the comments above related to the Model PPAs, there were several comments and questions specifically related to the Model RDG PPA. A question was raised about whether in reducing risk to developers through the establishment of the Lump Sum Payment mechanism, if the RDG PPA has therefore shifted that risk to the Companies and by extension, to customers. To that point, the Companies explain that the shift from the “as-

available” energy only PPAs to RDG PPAs results in a package that removes the ongoing resource risk from the IPP but requires that the Facility be dispatchable. This package benefits customers through the ability to better utilize the facility to support ancillary services for the grid and potentially more attractive pricing. Liquidated damages assure the availability of the dispatchable generation. Additionally, to mitigate the resource risk, the RDG PPA includes several independent checks of the Net Energy Potential of the facility where the Lump Sum Payments are adjusted for estimated reductions in the Net Energy Potential of the facility.

A comment was received noting that the Availability Factor and MPR liquidated damages provisions are similar to the standard capacity charge formula commonly used in Firm PPAs. The Companies agree that the Availability Factor is applying a similar concept as the capacity charge formula. For RDG PPA projects, however, the resource is not “firm” so it is not appropriate to use the same formula. In creating the RDG PPA, the Companies chose to use an availability formula that is commonly used in the PV industry rather than trying to rework a formula more suited for firm generation. This is consistent with the Companies’ general approach of using common industry standard metrics whenever possible to aid in the understanding and adoption of the new RDG PPA structure.

As described in the October 23, 2017 RDG PPA webinar, in response to stakeholder comments, the Companies clarify that the Lump Sum Payment set forth in the RDG PPA is made in exchange for the Companies’ full dispatch control of the Facility. The variable Energy Payment was intended to cover the incremental cost to produce energy. For PV projects, this Energy Payment may be zero.

Several comments were made regarding various definitions set forth in the RDG PPA. The Companies’ respond to these comments as follows. Net Energy (energy delivered to the Point of Interconnection) does not include undispached energy. The Companies are willing to evaluate proposed clarifications of the definitions for DownTime and ExcludedTime as long as (i) such clarifications are consistent with the concept that the IPP is generally responsible for the availability of its Facility and (ii) the definitions for DownTime and ExcludedTime are consistent across all of the RDG PV PPAs.

Stakeholder comments also requested that the RDG PPA provide for payment for Test Energy. While the Companies recognize that other forms of PPAs provide for such payment, the Companies do not believe such concept is applicable to the RDG PPA. Under the RDG PPA, the Companies are primarily paying for dispatchable generation, which will not be available until acceptance testing is completed. Unlike firm capacity PPAs, the IPP does not incur fuel costs in providing test energy. As stated above, the Companies anticipate that energy payments under RDG PPAs will be \$0/MWh for solar and nominal for wind. Under the circumstances, the Companies should not be required to pay for test energy.

Similarly the Companies do not agree with allowing alternative uses for undispached energy. The RDG PPA requires that the Facility be available for dispatch and to have available unused available capacity for provision of ancillary services. Allowing the IPP to divert energy to other uses would be inconsistent with this concept and interfere with the provision of dispatchable and frequency responsive reserves to the grid.

Finally, comments were received regarding the termination Provisions for Availability Factor and Measured Performance Ratio in the RDG PPA. Under the Companies' as available/energy only PPAs, several consecutive years of extremely low energy deliveries (for example, failure to deliver Annual Contract Energy of at least 60% of a specified annual MWh value for several consecutive years) resulted in a loss of curtailment priority for a proportionate share of the Contract Capacity. Under the RDG PPAs, several consecutive years of exceedingly poor availability and performance gives the Companies the right to terminate. The thresholds that trigger this termination right were chosen to identify facilities whose availability and performance is so poor as to indicate that what the IPP is providing under the RDG PPA is substantially different from what the IPP promised in its response to the RFP and that the IPP has been unable to fix the problem over a three year period. For example, in the case of Availability Factor for PV facilities, an availability of 84% is on the order of all inverters in the Facility being down for 59 days (0.16×365) in a year. In such circumstances, it is unreasonable to require the Companies to continue to devote resources to (i) the administration of such a contract and (ii) the continual assessment of liquidated damages for the balance of a 20-year term.

Conclusion

As noted above, the Companies appreciate the thoughtful and thorough comments received from stakeholders to the RFP process and draft documents. The Companies acknowledge that each comment filed was not responded to directly in this Exhibit 1. However, all of the feedback received was given careful consideration and has helped to inform the Companies of areas in the RFPs and PPAs that need clarification and/or improvement. As noted, where the Companies agree and are able to, we plan to incorporate the stakeholder feedback into the draft documents and RFP process.