COMMONWEALTH OF MASSACHUSETTS DEPARTMENT OF PUBLIC UTILITIES

Investigation by the Department of Public
Utilities On its Own Motion into Electric
Distribution Companies' (1) Distributed Energy)
Resource Planning and (2) Assignment and
Recovery of Costs for the Interconnection of
Distributed Generation

D.P.U. 20-75

RESPONSES OF SOLAR ENERGY BUSINESS ASSOCIATION OF NEW ENGLAND AND MASSSOLAR TO THE DEPARTMENT OF PUBLIC UTILITIES FIRST SET OF INFORMATION REQUESTS TO STAKEHOLDERS

Respectfully submitted,

SOLAR ENERGY BUSINESS ASSOCIATION OF NEW ENGLAND AND MASSSOLAR

Dated: April 13, 2021

Refer to the response to EDC-1. Do you currently have a distributed generation facility in the interconnection queue within one of the groups identified by the EDCs?

Response:

SEBANE and MassSolar have member companies involved in Eversource Group Studies (Mairon – Fairhaven, New Bedford, Plymouth, Cape) and National Grid Group Studies (Gardner, Barre). See Attachments for case studies of individual member company projects enrolled in Group Studies.

Refer to the response to EDC-1. Based on the high-level planning estimates for costs and timelines provided by the EDCs, would you move forward with interconnection under the currently applied cost causation methodology?

Response:

SEBANE and MassSolar agree with National Grid's historical averages. We propose the following interconnection fee calculation (including point of common coupling costs), where the total fee is cumulative based on total AC capacity size:

- + 5 cents/watt for the first 60 kW AC
- + 15 cents/watt for the capacity over 60 kW and up to 500 kW AC
- + 20 cents/watt for the capacity over 500 kW and up to 1 MW AC
- + 21 cents/watt for the capacity over 1 MW and up to 2 MW AC
- + 22 cents/watt for the capacity over 2 MW and up to 3 MW AC
- + 23 cents/watt for the capacity over 3 MW and up to 4 MW AC
- + 24 cents/watt for the capacity over 4 MW and up to 5 MW AC

Interconnection costs of 10-15 cents per watt can be shouldered by most developers for many systems over 60 kW AC but given the outrageous costs that many developers have been asked to pay, SEBANE requests that fees follow the schedule noted above, with marginal fees increasing with the system capacity size.

In addition to the project delays and cost of Group Studies, developers have also sacrificed more lucrative SMART blocks and missed higher tax credits due to the interconnection delays. While some solar costs have decreased in the last year, the costs of steel and copper have risen significantly. Potential project returns on investment have generally decreased faster than project construction costs, even before considering the rapid increase in interconnection cost. Project bids from as recently as October 2020 are now completely invalid in April 2021 due to these rising material costs. The time required to await an interconnection agreement has become a serious risk to solar project development in Massachusetts.

SEBANE and MassSolar encourage the Department to allow the EDCs to pursue parallel and proactive system upgrades to allow for more reasonable interconnection timelines. Our organizations believe such investments are in the public's interest. We propose the following timelines for the elapsed time, starting on the day of the interconnection application and ending once the permission to operate has been received:

- 0 60 kW: target 3 months, max 6 months;
- 60 500 kW: target 6 months, max 1 year;
- 500 kW 1 MW: target 1 year, max 2 years;
- Over 1 MW: target 2 years, max 3 years.

Refer to the response to EDC-1. If a provisional system planning program were implemented that decreased the cost to interconnect but did not alter the timeline for EPS upgrade construction, would you move forward with interconnection?

Response:

SEBANE and MassSolar member companies seek certainty regarding interconnection and upgrade costs and interconnection timelines to support continued investments. Based on a survey of members, developers of large (over 1 MW), standalone projects can reasonably bear a timeline of two years if they have executed ISAs. Once the timeline gets to three years, it becomes unbearable for most developers. If a provisional plan was implemented, with interconnection fees capped as above, with an ISA and a clear timeline to receive Permission to Operate of two years with the exception being 3 years, we believe many, but not all, of our members will be able to move forward with their interconnection. Given their particular project timelines to date, even a timeline in excess of the typical 12 months to interconnect may cause projects to withdraw. Based on member feedback, SEBANE feels that two years would still allow most projects to proceed, with three years as the outer extent that many developers would tolerate. Developers need an ISA in order to finish development and qualify for a SMART Statement of Qualifications (SOQ). With an ISA and SOQ, a project has value and can seek financing. While the original developer may not be patient enough to wait 2-3 years, another developer may be able to monetize the SOO and continue development of the project.

Refer to the response to EDC-4, how long following submittal of a provisional system planning program proposal by the EDCs would the Department need to make a determination on the proposal for you to move forward with interconnection?

Request:

SEBANE and MassSolar recommend a stakeholder process to further discuss and understand the information presented by the Electric Distribution Companies and planning assumptions. Much like the long-term planning process under consideration by the Department the provisional system planning program should include a stakeholder component. It is not clear why National Grid and Eversource have outlined a significant amount of time after the completion of a Group Study to prepare and file provisional system plans. SEBANE suggests this inefficiency can be resolved by simultaneously submitting the Group Study Results to the Group Study members and the Provisional Plans with the proposed \$/kW Fees to the Department. Upon the Department's approval, the EDCs will notify Group Study Members of any impacts that may affect their project or study scope or cost amendments. In alignment with the current Interconnection Tariff, Group members will then have 15 Business Days to provide notice to the EDC regarding their decision to proceed and an additional 35 Business Days for the EDC to issue an Interconnection Service Agreement. If the deadline is not met, our organizations believe a penalty should be applied. We ask the Department to consider that multiple projects have already been delayed in Group Studies over three years since initial interconnection application date, and that any provisional planning program seeks to expedite resolution regarding the costs and timing the pending projects might face to interconnect. Our organizations suggests a Department review take no longer than 45 business days.

Additionally, due to new provisions authorized in the recently passed Climate Bill, utilities must not be permitted to "fast track" utility-owned projects over other projects already in the queue. Moreover, they must share equally in group study costs, including both study and system upgrade expenses.

Are there any federal law implications that should be considered concerning sharing costs of EPS upgrades with interconnecting customers over an extended period of time and in particular after the EPS upgrade has been constructed?

Response:

SEBANE is unaware of any federal law implications that should prevent the Department from acting swiftly. However, we encourage productive dialogue between the department and ISO New England to make sure they are aware of any issues as they arise and work to mitigate and address any challenges that stem from those issues.

Attachment A

BlueHub Case Study

BlueHub submitted the initial interconnection application in December 2017 for their Kinzer Drive Solar Project. The project was one of the first to get caught up in area and group studies that have delayed development in the central and western Massachusetts for over three years now. Based on the Detailed System Impact Study for the project that was finally delivered in October 2020, and subsequent discussions with National Grid representatives, BlueHub's understanding is that they would be expected to pay an estimated \$2.9 million per megawatt in distribution and transmission system upgrades, plus any cost overruns, as well as an additional \$1.7 million per MW over 20 years in recently proposed transmission system carrying costs. For this 2MW solar plus storage project, current policy would require BlueHub to pay the initial \$5.8 million cost within the next year. The project will need to wait to interconnect until at least April 2027 when the A1 B2 transmission line is completed, thus adding significant financing burdens to these up front interconnection costs as well. Overall transmission, distribution and 20 years of transmission carrying costs would total over \$9.2 million for this 2 MWac project and BlueHub would be responsible for any increased costs in the event other projects in the group study dropped out. No project could move forward with that level of interconnection costs and risks carried solely by the project developer. It is unreasonable for any project to be charged that kind of costs and also be forced to wait nearly a decade from the initial interconnection application date until the interconnection is finally allowed.

Attachment B

Haskell Werlin of Solar Design Associates in cooperation with Cypress Creek Renewable Energy

Haskell Werlin of Solar Design Associates, in cooperation with Cypress Creek Renewable Energy, filed interconnection applications in 2018 for a project in Oakham and another project in Hardwick (combined 10 MW AC). After initial Impact Studies, the projects were enrolled in Group Studies in 2018. The first Group Study experienced high attrition and the results were inconclusive. The projects were then rolled into a second Group Study. The developer dropped out of Group Study once the predicted upgrade costs and extended timeline made the projects unfinanceable and created an unacceptable level of uncertainty to further invest in development of these sites. Combined sunk costs for the two projects total approximately \$600,000.

Going forward, given the recent history of DG development in Massachusetts, when developers consider their average cost to develop new projects in Massachusetts, they also have to budget development fees for projects that might face insurmountable hurdles. The true expected interconnection costs going forward are not just the average fees successful projects are willing and able to pay, but also the expected value (costs) of fees for projects that are unable to proceed. It has become similar to investing in a venture capital portfolio. Developers will require a superior economic return (incentive) for successful projects if they are to ever consider investing in DG development in Massachusetts in the future. Many are simply taking their investments to other states at this stage.

As the DPU and EDCs consider an acceptable interconnection fee that project developers are willing to pay, that fee will be highly dependent on the probability of a project to successfully receive its ISA—the likelihood that additional upgrade costs (distribution or transmission) will not be subsequently assessed, making the project uneconomic. As important as an economical interconnection rate is the reduction of the uncertainty associated with the eventual interconnection costs.