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RENEWABLE ENERGY MASSACHUSETTS LLC

July 11, 2017

Mr. Michael Judge
Massachusetts Department of Energy Resources
100 Cambridge Street
Boston, MA 02114

RE: Comments for the Development of the Solar Massachusetts Renewable Target ("SMART") Program

We are pleased to contribute our comments on the SMART Program Emergency Regulations published by the Massachusetts Department of Energy Resources (the "DOER") at 225 CMR 20.00 *et seq*. In short, we express our appreciation to the DOER for allowing us this opportunity. Our comments are based on many years of jointly developing, financing, and constructing over 60 megawatts of ground-mounted photovoltaic energy projects here in the Commonwealth across all of the utility service territories. Specific sections from the tariff regulation text are first quoted below in italics and then reviewed with our comments.

(4) *Ceiling Prices.* *Proposals submitted by Owners or their Authorized Agents under the request for proposals shall not be considered eligible for consideration if they request a Base Compensation Rate higher than the Ceiling Price for their applicable size category. For Solar Tariff Generation Units with a capacity between 1 MW and 2 MW, the Ceiling Price shall be $0.15 per kWh. For Solar Tariff Generation Units with a capacity equal to or larger than 2 MW, the Ceiling Price shall be $0.14 per kWh.*

Summary: For Solar Tariff Generation Units with a capacity equal to or larger than 2 MW, the Ceiling Price shall be $0.17 per kWh.

Like others in the market, we are concerned that the competitive RFP will result in compensation levels that are too low to ensure the economic viability of projects. Having run countless financial models considering a myriad of variables, we have determined that at the currently proposed $0.14 per kWh ceiling price future solar projects are not financeable. As such, we urge the DOER to mandate a ceiling price of at least $0.17 per kWh.

Given the continuing downward trend in build prices over the last decade, the declining block program with a lower ceiling price seems to make logical sense; however, there are currently two major upward cost factors that are threatening the positive trajectory of the industry both within the Commonwealth and nationally:

1. As more distributed generation is connected to the grid, utility interconnection costs continue to increase. The substations and utility lines that were previously empty from a generation perspective were well suited for distributed renewable generation. Unfortunately, these substations and lines are now either completely full or nearing their maximum capacity. As a

result, utility interconnection upgrade costs borne by solar projects in Massachusetts are increasing by multiples of up to 5x compared to the past several years.

2. The Suniva rate case could bring the industry to its knees and dramatically reverse 3-4 years of cost efficiencies gained in the industry. This reversal of project cost outlook would need to be accounted for in the Base Rate and the Adders. The SMART Program, as it is currently structured, could not support projects at a higher module price with the $0.14 per kWh ceiling price.

(2) Schedule of Compensation Rates. Following the first Capacity Block, all Base Compensation Rates and Compensation Rate Adders will decline by four percent per Capacity Block. A schedule of such rates and the progress towards filling Capacity Blocks shall be published on the Department's and Solar Program Administrator's websites. If a Distribution Company is eligible to have fewer Capacity Blocks and elects to do so, it may also establish a steeper rate of decline, which must be approved by the Department and shall yield a similar overall rate of decline as if the Distribution Company had elected to have eight Capacity Blocks.

Summary: The four percent (4%) reducer per Capacity Block should apply to all components of the Compensation Rate, including the Greenfield Subtractor.

In order for the program to remain balanced as the Capacity Blocks fill up, the four percent reducer should apply to all aspects of the all-in Compensation Rate including the Base Compensation Rate, Compensation Rate Adders, and Greenfield Subtractor. If this change is not implemented, the Greenfield Subtractor will be disproportionate to the other components of the all-in Compensation Rate as projects transition into later Capacity Blocks. As a result, the Greenfield Subtractor will have a greater impact on the all-in Compensation Rate and thus negatively affect the feasibility of future projects in subsequent Capacity Blocks.

(5) Adder Caps. No individual Compensation Rate Adders listed in 225 CMR 20.07(4) shall be provided to more than 320 MW of Solar Tariff Generation Units across all Distribution Company service territories and Capacity Blocks.

Summary: The 320 MW Adder Caps should be removed.

The addition of the Adder Caps will ultimately hurt the longevity of the proposed SMART Program and limit the potential for solar development to respond to growing consumer demand. While limiting carports, landfills, and brownfields is consistent with the Commonwealth's goal of increasing the diversity of solar projects – and minimizing an over-reliance on one project type – limiting community solar to 320 MW will negatively impact consumers by limiting broader access to solar for currently under-served segments, while arbitrarily limiting storage to 320 MW will lead to a "missed opportunity" for the Commonwealth to establish itself as a leader in yet another emerging segment. Community solar and energy storage provide real, tangible benefits to ratepayers, communities, and utilities, and these Adders properly reflect that—the other location based Adders are appropriately structured incentive based payments designed to help cover the cost of each respective installation type.

A potential 320 MW community solar cap will significantly limit the amount of community solar sites within the Commonwealth. Ultimately, fewer ratepayers will be able to participate in this progressive solar program. While residential customers would still be eligible for incentives on their own rooftop solar installations, less than half of all residential rooftops are suitable for solar due to shading, physical orientation, or a number of other issues. Community solar is the only way for homeowners with unfavorable roofs to participate in the SMART Program and be involved in the future of clean energy.

The benefits of energy storage are well known and initially it appeared that the SMART Program would encourage all solar owners to pair projects with storage. By artificially placing the Adder cap on storage, there will be much less energy storage installed in the Commonwealth. As discussed in the *Massachusetts State of Charge* report, storage sites have the ability to alleviate several grid issues including peak energy prices, peak capacity problems, high ancillary service costs, ramp up problems on traditional generators, high T&D costs, and reverse flow problems. The *State of Charge* report clearly details the potential savings associated with each of these issues and by limiting the SMART Program to 320 MW of storage, these ratepayer savings may never be realized.

(6) <u>*Review of Compensation Rates*</u>**.** *Upon issuing Statements of Qualification for 400 MW of Solar Tariff Generation Units, the Department will conduct a review of the Base Compensation Rates and Compensation Rate Adders to determine if any revisions to the SMART Program are necessary.*

Summary: There should be more clarity around this 400 MW review, what potential change agents may be considered (e.g., interconnection costs, build costs, elimination/phase out of Federal ITC), and what the potential change may be.

As presently set forth, this clause has the potential to render solar projects under development unfinanceable and immediately put a halt to most development within the Commonwealth. The uncertainty around the 400 MW threshold, and whether there may be retroactive impacts on early SMART Program projects, will give most investors pause when investing in early stage development projects. Put plainly, if the DOER is reserving the right to conduct a review and revise the program, there should be more clarity around this review and what the potential changes may be, as well as ironclad guarantees that future changes will only impact projects on a going-forward, not retroactive, basis.

Thank you again for the opportunity to share our comments and perspective on the proposed SMART Program.

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