STATE OF NEW YORK
PUBLIC SERVICE COMMISSION

CASE 21-E-0629 - In the Matter of the Advancement of Distributed Solar.

CASE 19-E-0735 - Petition of New York State Energy Research and Development Authority Requesting Additional NY-Sun Program Funding and Extension of Program Through 2025.

CASE 15-E-0751 - In the Matter of the Value of Distributed Energy Resources.

CASE 14-M-0094 - Proceeding on Motion of the Commission to Consider a Clean Energy Fund.

ORDER EXPANDING NY-SUN PROGRAM

Issued and Effective: April 14, 2022

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At a session of the Public Service
Commission held in the City of
Albany on April 14, 2022

COMMISSIONERS PRESENT:

Rory M. Christian, Chair
Diane X. Burman, dissenting
James S. Alesi
Tracey A. Edwards
John B. Howard
David J. Valesky
John B. Maggiore

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ORDER EXPANDING NY-SUN PROGRAM

(Issued and Effective April 14, 2022)

BY THE COMMISSION:

INTRODUCTION

Through this Order, the Public Service Commission (Commission) expands the installation target of the NY-Sun program from 6 to 10 gigawatts (GW) of distributed solar generation projects and adds new program criteria to ensure that at least 40% of the 4 GW incremental increase benefits those New Yorkers that generally lack access to rooftop solar – low to moderate income (LMI) residents, those living in regulated affordable housing, disadvantaged communities, and environmental justice (EJ) communities. The NY-Sun program administered by the New York State Energy Research and Development Authority (NYSERDA) remains a cornerstone in New York's pursuit of a distributed, dynamic, and carbon-free grid of the future. For the past seven years, the NY-Sun program has supported distributed solar photovoltaic installations by providing the distributed solar industry with the incentive certainty and transparency needed to forecast project economics and attract investment.[1] To ensure that ratepayer funds necessary to expand the NY-Sun program are used in a cost-effective manner, this Order analyzes the current state of the distributed solar market in New York and determines how best to build on past successes.

Since April of 2021, Department of Public Service staff (Staff) has worked with NYSERDA to review the current distributed solar market in New York State. NYSERDA also contracted with Energy and Environmental Economics, Inc. (E3) to analyze future revenues, costs, and market support mechanisms needed for distributed solar development beyond the target of 6 GW of distributed solar by 2025 that was codified in the CLCPA (6 GW Target). Informed by those analyses, on December 17, 2021, Staff and NYSERDA jointly filed a proposal to expand NY-Sun, entitled "New York's 10 GW Distributed Solar Roadmap: Policy Options for Continued Growth in Distributed Solar" (the Roadmap). The Roadmap analyzes the state of the current distributed solar market in New York State and proposes a

[1] This Order sets the Commission on a path to exceed the target established under the Climate Leadership and Community Protection Act (CLCPA) to have 6 GW of distributed solar procured by load serving entities (LSEs) by 2025. See L. 2019, ch. 106, §4 (adding Public Service Law (PSL) §66-p(5)).

pathway to achieve 10 GW of distributed solar deployment by 2030, or an incremental 4 GW of distributed solar above the current NY-Sun target (the Incremental 4 GW Target). The Roadmap recommended continuation of the administratively-set incentive structure as currently used in the NY-Sun Megawatt Block (MW Block) Program; however, with more of the program benefits going to lower-income New Yorkers. The Roadmap also examines various options related to interconnection policy improvements.

The Roadmap estimates that achieving the Incremental 4 GW Target would require approximately $1.474 billion in additional NY-Sun program funding, including approximately $807 million for base project incentives, $207 million in Solar Energy Equity Framework (SEEF) funds for LMI customers and disadvantaged communities, $192 million for various incentive adders, $239 million to assist the solar industry with the transition to increased prevailing wage requirements, $16 million for the New York State Cost Recovery Fee (Cost Recovery Fee), $12.3 million in administrative costs, and $1 million for evaluation.[2] In turn, the Roadmap estimates that achieving the Incremental 4 GW Target would reduce greenhouse gas (GHG) emissions associated with 4,937 gigawatt hours (GWh) of annual fossil-fuel fired generation (or approximately 54 million metric tons of GHGs over the lifetime of the projects deployed), provide bill savings to an estimated 127,000 new solar customers, and create 6,000 new jobs statewide, many at prevailing wages.

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[2] The Cost Recovery Fee is a fee assessed on public authorities by New York State for an allocable share of state governmental costs attributable to the provision of services to public benefit corporations pursuant to Section 2975 of the Public Authorities Law.

As discussed below, the Commission approves, with modifications, the recommendations set forth in the Roadmap to expand the NY-Sun program towards achieving the Incremental 4 GW Target and the broader clean energy and equity goals established by the CLCPA.

BACKGROUND

A. Creation of and Updates to the NY-Sun Program

The Commission initiated the Retail Renewable Portfolio Standard (RPS) administered by NYSERDA in 2004, with a Main Tier for large resources and a Customer-Sited Tier for smaller resources, including distributed solar.[3] Following a series of modifications to the RPS program, in 2014, the Commission authorized NYSERDA to implement the NY-Sun MW Block Program for the period of 2016 through 2023, with a target of 3 GW of distributed solar in New York State and a total budget of $960.6 million to support that goal.[4]

In January 2016, the Commission, through its Clean Energy Fund (CEF) Framework Order, consolidated various post-2015 NYSERDA clean energy activities (e.g., the New York Green Bank and NY-Sun) and ratepayer funding under the Clean Energy Fund, with a 10-year program authorization and associated minimum targets, including (i) 10.6 million megawatt hours (MWh) and 13.4 million British Thermal units (MMBtu) of energy efficiency, (ii) 88 million MWh of renewable energy, (iii) 133 million tons of Carbon Dioxide Equivalent (CO2e) reductions, (iv) $39 billion in customer bill savings, and (v) $29 billion

[3] Case 03-E-0188, Retail Renewable Portfolio Standard, Order Regarding Retail Renewable Portfolio Standard (issued September 24, 2004).

[4] Case 03-E-0188, supra, Order Authorizing Funding and Implementation of the Solar Photovoltaic MW Block Programs (issued April 24, 2014) (MW Block Order).

in private investment.[5] The Commission established the Clean Energy Fund as the funding mechanism for the NY-Sun initiative and 3 GW distributed solar goal. The CEF Framework Order established utility collections from ratepayers to support the $960.6 million funding requirement. The CEF Framework Order required NYSERDA to report all NY-Sun specific financial and programmatic metrics through NY-Sun specific reports and to update the NY-Sun Operating Plan to incorporate any previous addendums and other necessary adjustments, as outlined in the CEF Order. In addition, the CEF Framework Order directed NYSERDA to identify specific uses for unspent, uncommitted funds from legacy portfolios, including RPS, at the end of 2015 and subsequent years. Further, the CEF Framework Order allowed for the NY-Sun budget allocation for the 2016 to 2023 period to be fully retained in the case of project attrition.[6]

In July 2019, the CLCPA was enacted into law, including the target imposed on the Commission to adopt a program "[n]o later than by July 1, 2024" to require the State's LSEs to procure "at least" 6 GW of photovoltaic solar generation by 2025.[7] On May 14, 2020, in response to a petition filed by NYSERDA, the Commission issued an Order extending the NY-Sun

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[5] Cases 14-M-0094 et al., Clean Energy Fund, Order Authorizing the Clean Energy Fund Framework (issued January 21, 2016) (CEF Framework Order).

[6] By Order issued on September 14, 2018, the Commission clarified that the overall NY-Sun program funding included the funding previously authorized for the former solar photovoltaic incentive programs operating under the RPS Customer-Sited Tier for 2014 and 2015, for a total funding level of approximately $1.18 billion to support the 3 GW goal. Cases 14-M-0094 et al., supra, Order Regarding NY-Sun Funds (issued September 14, 2018); see also Case 03-E-0188, supra, Renewable Portfolio Standard Customer-Sited Tier Operating Plan Addendum (2014-2023) (filed August 12, 2014).

[7] PSL §66-p(5).

program through 2025 and authorizing an incremental program budget of $573 million to achieve the 6 GW target under the CLCPA.[8] The Commission also adopted the SEEF as a mechanism by which to dedicate no less than $200 million of that funding for projects benefiting LMI households, affordable housing, and EJ and disadvantaged communities. As part of the NY-Sun Expansion Order, the Commission initially authorized two-fifths of the expanded NY-Sun budget, or $230 million, to be sourced from existing uncommitted NYSERDA funds. In a subsequent order regarding broader modifications to the CEF, the Commission authorized funding of the remainder of the NY-Sun budget from a combination of uncommitted NYSERDA funds and, if necessary, up to $118.3 million in repurposed New York Green Bank funds.[9]

B. The Roadmap

In light of rapid distributed solar market growth and the near exhaustion of the NY-Sun commercial and industrial (C/I) MW Block incentive,[10] the NY-Sun Community Adder, and the Value Stack Community Credit, Staff and NYSERDA held technical conferences on April 21, 2021, and May 7, 2021, to discuss future C/I distributed solar and community solar market support

[8] Case 19-E-0735, supra, Order Extending and Expanding Distributed Solar Incentives (issued May 14, 2020) (NY-Sun Expansion Order).

[9] Case 19-E-0735 et al., supra, Order Approving Clean Energy Fund Modifications (issued September 9, 2021) (CEF Modification Order).

[10] Community solar projects, which require that a minimum of 60% of the benefits go to residential or other lower use customers, are included in NYSERDA's Commercial and Industrial portion of its MW Block program.

mechanisms.[11] During the first technical conference, Staff and NYSERDA included presentations on the benefits of distributed solar and three potential policy approaches to support its continued development beyond the 6 GW by 2025 target. During the second technical conference, various parties presented their responses to the first conference, including discussion about utilizing the Environmental Value (E Value) component of the Value of Distributed Energy Resources (VDER) Value Stack as a potential mechanism to support continued development of distributed solar beyond the 6 GW Target.[12]

Based on feedback from the two technical conferences, as well as further internal analysis, Staff and NYSERDA developed the Roadmap to provide policy options to continue the rapid development of distributed solar to reach the Incremental 4 GW Target. The main topics discussed in the Roadmap are summarized next.

1. Proposed Incentive Structure

The Roadmap starts by noting that the NY-Sun program has successfully incentivized solar development in New York, with the State well on track to achieve 6 GW of distributed solar before 2025. According to the Roadmap, 93.5% of the 6 GW Target consists of either completed projects or projects in the NY-Sun pipeline, with 3,322 MW completed and 2,461 MW in development. The Roadmap also states that another 4,095 MW of projects are at an early stage of development (i.e., in the utility interconnection queue, although 25% of interconnection costs remained unpaid). The Roadmap notes that distributed

[11] See Case 15-E-0751, Value of Distributed Energy Resources, Technical Conference Proceedings Document: Commercial/Industrial & Community Distributed Generation Solar Markets (filed June 7, 2021) (Technical Conference Proceedings Document).

[12] See Technical Conference Proceedings Document.

solar growth in New York has also been spurred by various "soft cost" reduction efforts by the Commission and NYSERDA.

Based on the success of the NY-Sun program to date, the Roadmap recommends expanding the program through 2030 and setting an Incremental 4 GW Target of additional distributed solar by 2030. The Roadmap states that the MW Block Program has a proven track record for transparency and flexibility, and already has an existing programmatic infrastructure that can be used to extend the program through 2030. Specifically, the Roadmap recommends incentivizing 3,393 MW of new capacity through the expanded NY-Sun program, using a "missing money" approach to setting incentive levels, with the incentive level for each geographical area reflecting the amount needed by the marginal resource block to reach its assumed internal rate of return in a given year. To be clear, the Roadmap estimates that the remainder of the Incremental 4 GW Target, or approximately 607 MWs, would be achieved both through projects located on Long Island and statewide unincentivized solar projects. Thus, the focus of the Roadmap is on incentivizing 3,393 MW of solar – not the entire 4 GW.

The Roadmap breaks down the target capacity of 3,393 MW as follows:

- 2,943 MW of new Upstate C/I scale project capacity through new MW Block incentives, with the initial base incentive block set at 800 MW and an incentive rate of $0.17/Watt.

- 300 MW of new Consolidated Edison Company of New York, Inc. (Con Edison) nonresidential and C/I project capacity funded through an expanded MW block design and separated into two incentive categories, with 150 MW devoted to large projects (greater than or equal to 1 MW), and 150 MW devoted to small projects (<1 MW). The Roadmap proposes initial base incentive rates of $0.75/Watt for large projects and $1.30/Watt for small projects, with initial block sizes of 30 MW for each size category.

- A new Con Edison Residential incentive block of 150 MW. The Roadmap recommends cancelling all remaining unallocated capacity in the current Con Edison nonresidential MW Block structure (approximately 122 MW), to be replaced by the Con Edison Nonresidential incentives above. Funds recaptured from this cancelled capacity would be added to the new Con Edison Residential block at a rate of $0.15/Watt.

The Roadmap recommends no changes to the existing Upstate nonresidential MW Block structure; that is, once all Upstate nonresidential incentives are committed, eligible projects may apply for the available Upstate C/I MW Block incentives. For clarity, these projects would be subject to the NY-Sun nonresidential program rules, including incentive payment schedule, but would receive the Upstate C/I incentive rate and draw capacity from the Upstate C/I MW Block structure.

The Roadmap also recommends that the E Value component of the Value Stack continue to be used, in addition to further NY-Sun incentives, as a mechanism to provide compensation to Value Stack-eligible projects for their environmental attributes. For projects eligible to receive Value Stack compensation, the Roadmap recommends that the E Value be locked in at its current rate, subject to a Mid-Point Review.[13] The Roadmap further recommends that, going forward, the E Value be set at its current rate for all technologies eligible to receive the E Value through Value Stack compensation.

Regarding eligibility for the new incentives, the Roadmap proposes that Upstate C/I projects that have already received a NY-Sun incentive as of the date of the Roadmap's issuance would not be permitted to cancel their applications and re-apply at a higher incentive rate. However, the Roadmap suggests that nonresidential projects within the Con Edison

[13] As of the date of the Roadmap, the E Value rate was 3.103 cents per kilowatt hour (kWh).

service territory that apply to the NY-Sun program subsequent to the filing of the Roadmap, as well as Con Edison nonresidential projects that submitted applications under the current MW Block (i.e., Block 10) and were not previously awarded the Community Credit, should be allowed to opt into the new incentive structure. Further, projects that have not previously received a NY-Sun incentive commitment should be allowed to apply for these newly-available NY-Sun incentives, subject to regular program rules and eligibility requirements.

In addition to the above base incentives, the Roadmap recommends additional funding for various incentive adders. First, the Roadmap recommends the addition of 2,270 MW of Community Adder capacity, with the added incentive rate based on the incremental cost to develop a community solar project compared to a remote credited project, including the cost of initial customer acquisition and the differences in ongoing costs. The Roadmap proposes initially setting the Community Adder rate at $0.07/Watt for upstate and $0.10/Watt in the Con Edison territory, which reflect an anticipated balance of approximately 70% of new capacity being developed as community solar, and 30% of new capacity being developed as remote crediting or behind-the-meter projects. The Roadmap also recommends the continuation of other added incentives for projects that meet certain criteria and achieve other State policies and objectives, such as projects sited on a brownfield or landfill or utilizing a parking or rooftop canopy design. The Roadmap does not propose any changes to current NY-Sun program rules regarding the "stacking" of adders.

Finally, the Roadmap estimates that beyond the 3,393 MW of new capacity that would be incentivized through an expanded MW Program, the balance of new solar capacity needed to achieve the Incremental 4 GW Target would be comprised of new projects installed in Long Island (estimated to total 560 MW) and an estimated 47 MW of statewide residential deployment. Because Long Island electric customers do not pay into the CEF, from which NY-Sun's budget is derived, Long Island projects would not be eligible for the incentive funding proposed by the Roadmap.

2. Geographic Considerations

As noted above, the Roadmap recommends segmenting the Incremental 4 GW Target into one incentive group for C/I projects developed in the Upstate Utilities' service territories, and separate incentive groups for the Con Edison service territory.[14] The Roadmap notes that Upstate project costs and revenues are similar enough to warrant grouping the five Upstate Utilities together, while setting an overly prescriptive locational signal for those utilities could constrain cost-effective development. Likewise, the Roadmap does not recommend segmenting the Upstate Utilities service territories by project size, which would produce opportunities for gaming if developers sub-divide otherwise viable sites for use in a more attractive pricing tier. Conversely, distributed solar development in Con Edison is limited by siting constraints (particularly in New York City), high costs such as labor costs, and regulatory hurdles. For those reasons, and to encourage distributed solar development in New York City to replace existing in-City fossil generation, the Roadmap proposes a carve-out of approximately 450 MW of distributed solar projects developed specifically in the Con Edison service territory,

[14] The Upstate Utilities are Niagara Mohawk Power Corporation d/b/a National Grid (National Grid), Central Hudson Gas & Electric Corporation (Central Hudson), New York State Electric & Gas Corporation (NYSEG), Rochester Gas & Electric Corporation (RG&E), and Orange and Rockland Utilities, Inc. (O&R).

further broken down into residential, non-residential, and C/I projects.

Recognizing that Long Island plays an important role in New York's distributed solar accomplishments, and that solar deployment in Long Island continues at a robust rate, the Roadmap estimates that Long Island would contribute an additional 560 MW towards the Incremental 4 GW Target. As noted above, however, since Long Island customers do not pay into the CEF, incentive support, if needed, would have to come from other sources. Similarly, the Roadmap recognizes the important role that the New York Power Authority (NYPA) plays in statewide distributed solar development. The Roadmap notes that, while certain NYPA customers also do not pay into the CEF and therefore will not be eligible for any of the proposed incentives, $29 million in Regional Greenhouse Gas Initiative funding was previously set aside to help these customers deploy distributed solar, with $7.3 million remaining as of the date of the Roadmap.

3. Solar Energy Equity Framework (SEEF)

The Roadmap proposes expanding and adapting the SEEF to encompass the Incremental 4 GW Target. Specifically, the Roadmap recommends that no less than 1,600 MW, or 40 percent, of the Incremental 4 GW Target should be targeted toward LMI residents, regulated affordable housing, and disadvantaged and EJ communities under the SEEF.[15] At least half of this SEEF capacity (or 20 percent of total incremental capacity) would be targeted specifically to providing LMI residential customers with direct, guaranteed electric bill cost savings (including

[15] The Roadmap notes that additional requirements may be identified to balance the full range of potentially qualified subscribers/beneficiaries, such as public housing authorities and public schools serving disadvantaged communities.

LMI homeowners who install residential solar, LMI residents that individually subscribe to community solar, and those that are automatically enrolled in community solar through opt-out community solar programs). While the Roadmap primarily focuses on higher incentive levels and/or capacity targets for projects that provide direct cost savings benefits to customers targeted by the SEEF, the Roadmap explains that it is not intended to de-prioritize other components of the SEEF, such as technical assistance, predevelopment funding, and programmatic support for community-led solar. The Roadmap proposes an incremental $206.7 million in SEEF funding through 2030.

The Roadmap recommends a dedicated budget of $207 million for additional incentives and support for projects benefiting LMI residents, regulated affordable housing, and disadvantaged and EJ communities. NYSERDA estimates that the proposed dedicated budget will be further leveraged by approximately $400 million in additional base and Community Adder incentives for eligible projects, for a total estimated commitment of $607 million to projects within the SEEF.

4. Distribution System Investments

The Roadmap recognizes that existing distribution system hosting capacity constraints and the costs of upgrading the system to expand hosting capacity are key challenges impacting distributed solar development in New York. While acknowledging that the recently-adopted Cost-Sharing 2.0 framework will help expand the general hosting capacity of the distribution system, the Roadmap suggests that additional actions may be required, including: (1) modifications to utility planning processes to periodically evaluate the types of hosting capacity investments needed to achieve the Incremental 4 GW Target; (2) the inclusion and consideration of distribution investments that expand hosting capacity in line with the

Incremental 4 GW Target at locations of high distributed solar market interest in future utility Capital Investment Plans; and (3) revisiting the Cost-Sharing 2.0 framework to address cost allocation methodologies for distribution system upgrades and explore ways to accelerate utility investment in hosting capacity upgrades without increasing ratepayer risk.

5. Agricultural Protection and Land Use

The Roadmap specifies that existing requirements to avoid and minimize any negative impacts of distributed solar projects on farmland and the State's agricultural economy would extend to projects developed through the Incremental 4 GW Target. The State's Agricultural Technical Working Group, an independent advisory body convened by NYSERDA early in 2021, would continue to serve as the primary forum for stakeholder and interagency collaboration on policies and practices pertaining to distributed solar and agriculture.

6. Prevailing Wages

In analyzing the cost to achieve the Incremental 4 GW Target, the Roadmap considers various potential future labor policies, including reducing the MW threshold for renewable energy projects being subject to prevailing wage or project labor agreements from 5 MW to 1 MW.[16] The Roadmap notes that, since 2018, NYSERDA has applied prevailing wage and project labor agreement requirements to all of its large-scale renewables programs (i.e., wholesale renewable resources with a nameplate capacity greater than 5 MW). The Roadmap recommends expanding the application of prevailing wage to NY-Sun by making it a programmatic requirement for distributed solar projects having a nameplate capacity of 1 MW and above. The Roadmap estimates that this prevailing wage requirement would apply to

[16] The capacity noted here is based on its alternating current (AC) value.

approximately 1,550 MW to 1,850 MW of the projects procured through the Incremental 4 GW Target.

For budgeting purposes, the Roadmap includes funding for an additional incentive adder to offset the impact on project development costs as projects transition to prevailing wages (Prevailing Wage Adder). Based on an estimated additional cost of $0.125 per Watt for Upstate C/I projects and $0.20/Watt for Con Edison C/I projects, the Roadmap estimates that an additional $239 million in Prevailing Wage Adder funding would be required to achieve the Incremental 4 GW Target.[17] The Roadmap states that projects that began their interconnection application process prior to the date of the Roadmap would not be eligible for the Prevailing Wage Adder to offset the incremental cost of paying prevailing wages.

7. Build Back Better Considerations

The Roadmap recognizes that the Build Back Better Act (BBB Act), if enacted at the federal level, may have an impact on the Roadmap's recommendations. The Roadmap does not calculate specific financial impacts of individual items in the BBB Act but notes that there could be significant impacts in individual project economics. For example, the Roadmap estimates that increasing the Federal Investment Tax Credit (ITC) to 30 percent for the duration of the program could reduce total program costs by $525 million or more. The Roadmap recommends that, if the BBB Act is enacted, NYSERDA would amend and refile for Commission approval the NY-Sun Program Operating Plan to reflect relevant adjustments to incentive rates. The Roadmap notes that the proposed Mid-Point Review filing, which

[17] The Roadmap does not estimate any new offsetting incentives (e.g., increased federal tax credits) that may accompany a change in policy pertaining to prevailing wages at the federal level.

is addressed in more detail below, would include a BBB Act impact analysis and adjustments to total calculated program budget, program structure, and recommendations, again presuming that the BBB Act is signed into law.

8. Budget and Cost Recovery

The Roadmap recommends that the Commission authorize an increase to the NY-Sun budget of approximately $1.474 billion, broken down as follows: (a) $807 million for base project incentives in the Upstate and Con Edison territories; (b) $192 million for incentive adders, including the Community Adder and beneficial siting adders; (c) $207 million for the SEEF; (d) $239 million to assist the industry with the transition to prevailing wages and to mitigate the impact on project economics, (e) $16 million for the Cost Recovery Fee; (f) $12.3 million for Administration; and (g) $1.0 million for Evaluation. Specifically, the Roadmap proposes the following MW block and adder budget breakdown (Table 1) to meet the Incremental 4 GW Target:

Table 1.

	MW	Requested Funding
Upstate MW Block Incentives – C/I	2,943	$400,303,283
TOTAL – Upstate-specific Budget	***2,943***	***$400,303,283***
Con Edison MW Block Incentives – Residential	150	$22,500,000
Con Edison MW Block Incentives – Small Projects	150	$230,786,000
Con Edison MW Block Incentives – Large Projects	150	$153,858,000
Con Edison Rooftop Canopy Adder	4	$800,000
Con Edison Parking Canopy Adder	60	$12,000,000
TOTAL – Con Edison-specific Budget	***450***	***$419,944,000***
Community Adder (Upstate and Con Edison)	2,270	$165,207,000
Landfill/Brownfield Adder (Upstate and Con Edison)	93	$13,918,500
TOTAL – Incentives and Adders	**3,393**	**$999,372,783**

The Roadmap proposes that program costs be collected through 2032 from customers of the investor owned electric distribution companies via the Systems Benefit Charge (SBC) surcharge and utilize the existing Bill-As-You-Go mechanism established under the CEF Framework Order to transfer funding to NYSERDA.[18] According to the Roadmap, the costs of up-front incentives would be distributed across each of the utilities proportional to load and collected via the CEF surcharge. Thus, the funding mechanism associated with the expansion of NY-Sun would remain unchanged (i.e., no new processes or ongoing

[18] The Commission authorized the Bill-As-You-Go payment structure, whereby ratepayer funds are held by each of the utilities and transferred to NYSERDA as monies are necessary to meet near-term obligations. NYSERDA has in recent years utilized the Bill-As-You-Go structure as an efficient means to transfer funds with the utilities. See CEF Framework Order, pp. 96-103.

settlements between the utilities and NYSERDA would be required).

The Roadmap includes the following anticipated expenditures (Table 2) and proposed collections schedule to recover the costs (Table 3) associated with achieving the Incremental 4 GW Target:

Table 2.

Year	Anticipated Expenditures
2022	$28,900,000
2023	$33,100,000
2024	$220,600,000
2025	$182,800,000
2026	$198,800,000
2027	$193,200,000
2028	$192,800,000
2029	$191,100,000
2030	$180,300,000
2031	$34,300,000
2032	$17,800,000
Total	**$1,473,900,000**

Table 3.

Year	Incremental Collections
2022	$28,900,000
2023	$62,100,000
2024	$317,000,000
2025	$278,000,000
2026	$210,000,000
2027	$133,000,000
2028	$115,000,000
2029	$112,000,000
2030	$172,000,000
2031	$32,000,000
2032	$13,900,000
Total	**$1,473,900,000**

The Roadmap estimates that, while some incentives could be allocated to a small number of early projects completed in 2022-2023, most incentive payments would occur between 2024 and 2030 (e.g., an estimated $220 million expended in 2024), with a modest number of performance-based incentives made in 2031-2032. Assuming collections occur over the 11-year period of 2022-2032, the Roadmap estimates an average levelized ratepayer bill increase of 0.79%, or $0.71 per month. The Roadmap forecasts that expenditures, collections, and ratepayer impact would peak in 2024, with an average residential bill increase of 1.07%, or $0.92 per month. The Roadmap further estimates that the 2024 average residential bill increase would be 0.52% for Con Edison residential customers, and 1.07% for National Grid residential customers. The Roadmap estimates that the 2024 ratepayer increase for C/I ratepayers ranges from 0.97% for Con Edison to 3.14% for National Grid.

9. Mid-point Review

The Roadmap notes that the current 2020-2025 NY-Sun Operating Plan in effect, as of June 2020, provides Staff and NYSERDA with flexibility to, within the program structure approved by the Commission, adjust incentive and capacity levels in response to market and policy factors.[19] The Roadmap recommends that this flexibility be continued with respect to the Incremental 4 GW Target.

The Roadmap proposes a formal mid-program review process to determine, in light of potential changes in State and/or federal policy and market factors, whether any associated changes are necessary to the NY-Sun incentive structure and/or the E Value or method for setting it. As part of the Mid-Point Review, NYSERDA would provide a report that analyzes: (1) current project costs based on developer-reported data, utility-reported interconnection costs, and international cost trends in

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[19] See Case 19-E-0735, supra, NY-Sun Operating Plan Revised (filed June 8, 2020).

modules and other components; (2) market or policy factors that may be driving changes in rate of uptake and/or costs, such as broader adoption of net crediting, opt-out Community Distributed Generation (CDG), or other changes to state or federal policy; and (3) the impact of potential adjustments to the E Value or NY-Sun incentives in response to those factors. The Roadmap proposes that the Mid-Point Review report be filed by NYSERDA upon the earlier of (1) the commitment of half of the proposed incentivized capacity (i.e., 1,696 MW), or (2) December 31, 2025.

The Roadmap provides two options regarding the Mid-Point Review. First, NYSERDA could provide a draft of the Mid-Point Review to Staff, and/or present at a technical conference. Alternatively, NYSERDA could file its draft Mid-Point Review report with the Commission for stakeholder comment. The Mid-Point Review and recommendations would be subject to the Commission's review and adoption.

10. Additional Funds for Implementation, Administration, and Evaluation

The Roadmap notes that, as of September 30, 2021, approximately $15.6 million of funds previously authorized by the Commission remain for implementation of NY-Sun through 2025.[20] NYSERDA states that it is not requesting new funds at this time for implementation purposes associated with the Incremental 4 GW Target. The Roadmap recommends that NYSERDA be authorized to continue the quality assurance and quality control functions of the NY-Sun program, implement the proposed prevailing wage requirements noted above, continue to develop technical assistance responses to existing and emerging market

[20] These funds are used for, among other things, technical assistance and field review for quality assurance and quality control. See MW Block Order, p. 6.

barriers, and support pilot or demonstration efforts as warranted.

Regarding program administration, NYSERDA indicates that approximately $40 million of total funding should be budgeted for administrative and program coordination activities (e.g., staff costs, direct program management expenses, and facility and overhead costs) in order to deliver the intended outcomes.[21] Of this total, $28.9 million can be provided by funds that were previously authorized by the Commission for NY-Sun administrative purposes through 2025. NYSERDA thus requests $12.3 million in additional administrative funds, including for necessary post-completion performance payments, reporting, and other "close out" activities beyond 2030.

The Roadmap further reports that, as of November 30, 2021, the NY-Sun program has approximately $2.1 million remaining in previously-authorized NY-Sun program funds for evaluation purposes (e.g., to verify actual production of installed solar systems and assess the impact of the program on the market). NYSERDA requests that, in addition to these funds, the Commission authorize $1.0 million in new funding for program evaluation through the revised program end date of December 31, 2030, and for post-program evaluation activities beyond 2030.

11. Other Approaches Considered for Setting Incentive Levels

To determine the best pathway toward achieving the Incremental 4 GW Target, the Roadmap considered: (1) continuation of the administratively-set fixed incentive; (2) an

[21] The NY-Sun Operating Plan states that administrative costs include salary and fringe benefit costs for administrative support staff, direct program management expenses (travel and other costs), quality assurance and quality control, and allocable overhead administrative, facility, and equipment expenses.

administratively-set indexed incentive; (3) an auction-based fixed incentive; (4) an auction-based indexed incentive; and (5) a proposal proffered by the Joint Utilities (also at the technical conference on May 7, 2021).[22] Each of these five options is discussed and compared in detail in the Roadmap. For purposes of brevity, a summary of what NYSERDA and Staff considered as the best options is provided next.

Ultimately, the Roadmap recommends that the administratively-set fixed incentive, via continuation of the NY-Sun MW Block program, be utilized. Under this approach, the incentive would be set based on modeled distributed generation market conditions within the context of project characteristics and costs, timing, location, and program targets. The Roadmap based its preference to continue the administratively-set fixed incentive on the desire to ensure certainty given that the existing process has proven to be effective to date. Solar incentives under this approach can be set based on parameters that reflect market conditions, which Staff and NYSERDA found would provide project developers with a level of financial certainty without overpayment being a concern. The Roadmap noted that an administrative approach to setting prices to compensate distributed solar is also used in several other states, such as New Jersey and Illinois, meaning that developers are used to this approach outside of New York.

The Roadmap also gave serious consideration to an auction-based procurement approach (whether fixed or indexed) but found it to be less desirable than an administratively-set

[22] The Joint Utilities include Central Hudson, Con Edison, National Grid, NYSEG, RG&E, and O&R.

fixed incentive approach.[23] Under an auction-based approach, the incentive would be set through a competitive procurement in which developers bid in a price that would make their projects viable and cost effective. However, auctions would not be expected to consistently align with the typical distributed solar development process and timeline,[24] particularly as related to New York's Standardized Interconnection Requirements (SIR) for distributed solar projects.[25]

The Roadmap further noted that implementing the CLCPA requirements for equity and inclusion can, at a high level, be achieved under an administratively-set incentive approach by (1) targeting no less than 40 percent of the capacity receiving an administratively-set incentive be dedicated to benefiting eligible customers (i.e., project owners or subscribers), and (2) setting the incentive for this capacity at a level that

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[23] The Roadmap rejected the option proposed by the Joint Utilities primarily because it did not include a full program design proposal. As noted, a full evaluation of each of the proposals is provided in the Roadmap.

[24] The Roadmap notes that under Tier 1 of the Clean Energy Standard (CES), which utilizes an auction-based approach, procurements take place on an annual basis and typically require a long development cycle from project selection to deployment. In contrast, distributed solar is developed and deployed via a different sequence and on a much shorter timeline, and auctions for distributed solar would require greater-than-annual frequency.

[25] According to the Roadmap, auction participants would be required to maintain compliance with the SIR, and each major step in the interconnection process is itself time-gated by the SIR (e.g., payment of 25% of interconnection costs within 60 days of completion of a Coordinated Electric System Interconnection Review (CESIR) by the utility). The Roadmap also notes that the SIR currently does not have a mechanism for a project in the interconnection queue to "skip to the front of the line" if, in an auction scenario, a project later in the queue receives an award while an earlier project does not.

reflects the additional costs incurred and direct benefits targeted by projects serving eligible customers. Moreover, according to the Roadmap, under an administratively-set incentive approach, the SEEF could be extended with a continued emphasis on community solar strategies, and additional dedicated incentive funding for the SEEF would offset specific additional costs incurred by eligible projects and ensure that such projects deliver meaningful customer benefits.

For the administratively-set incentive approach, NYSERDA and Staff explored two further sub-options: (1) a tariff-based "E Value only" approach, whereby developers would receive a fixed per-kWh incentive over the 25-year assumed life of the project, which would be administratively calculated and revised periodically to reflect changes to expected costs and revenues, and (2) an expanded NY-Sun MW Block program with the E Value maintained at or near its current level. Two main challenges were identified in exploring an "E Value only" approach: the administrative complexity of maintaining multiple, periodically adjusted E Values across different regions, sizes, and levels of benefit for disadvantaged communities; and the potential increase in out-of-market E Value costs and resulting imbalance of cost recovery obligations across ratepayer groups. The Roadmap thus recommends continuation of MW Block "base" incentives (and additional upfront incentive "adders") coupled with continued use of the E Value as a mechanism to compensate Value Stack-eligible Distributed Energy Resource (DER) projects for their environmental attributes. The Roadmap recommends that the E Value be locked in at a rate of 3.103 cents per kWh, which reflects the social cost of carbon (SCC) at a 3% discount rate and an assumed system marginal emission rate of 0.553 tons per MWh.

The Roadmap acknowledges that, pursuant to the CLCPA, the New York State Department of Environmental Conservation (NYSDEC) created a Guidance Document to inform state agencies of options to establish a value for carbon.[26] However, the Roadmap found that setting the E Value using the NYSDEC Guidance Document's recommendation of the SCC at a 2% discount rate could lead to market inefficiency, and overpayment for carbon avoidance given that DERs could impose higher costs on ratepayers than project economics require. Similarly, the Roadmap does not recommend the NYSDEC Guidance Document's marginal abatement cost (MAC) approach, which represents the cost to reduce the last ton of emissions by the amount needed to meet a particular emissions target. According to the Roadmap, the MAC approach could be appropriate if the E Value represented the sole compensation mechanism available to Value Stack projects. However, since the Roadmap recommends that upfront NY-Sun incentives continue to be made available to Value Stack projects, setting the E Value using a MAC approach as well could lead to uncertainty and unnecessary administrative burden as NYSERDA and Staff would need to adjust two values to meet program goals rather than one.

NOTICE OF PROPOSED RULE MAKING

Pursuant to the State Administrative Procedure Act (SAPA) §202(1), a Notice of Proposed Rulemaking was published in the State Register on January 5, 2022 [SAPA No. 21-E-0629SP1]. The Secretary to the Commission (Secretary) also issued, on December 22, 2021, a Notice Soliciting Comments on Solar

[26] NYSDEC, Establishing a Value of Carbon: Guidelines for Use by State Agencies (issued December 2020), available at https://www.dec.ny.gov/docs/administration_pdf/vocguidrev.pdf (NYSDEC Guidance Document).

Roadmap. The time for submission of comments pursuant to the notices expired on March 7, 2022. The comments received are discussed below, as relevant, and summarized in Appendix A.

LEGAL AUTHORITY

The Commission has the responsibility and the authority under the Public Service Law (PSL) to ensure that utilities carry out "their public service responsibilities with economy, efficiency, and care for the public safety, the preservation of environmental values and the conservation of natural resources."[27] Furthermore, the Commission has the responsibility, pursuant to PSL §66-p, to ensure that a minimum of 70 percent of the statewide electric generation secured by jurisdictional load serving entities to meet the electrical energy requirements of all end-use customers in the state be generated by renewable energy systems by 2030, including the procurement of "at least ... six gigawatts of photovoltaic solar generation by [2025] ... ." Furthermore, the Commission is directed to design programs under PSL §66-p "in a manner to provide substantial benefits for disadvantaged communities ... including low to moderate income consumers."[28]

Pursuant to the State Energy Law, the Commission is required to consider actions to effectuate State energy policy and the New York State Energy Plan.[29] In fulfilling the mandates of the PSL and the State Energy Law, the Commission has directed the development and implementation of a number of programs to increase the deployment of energy efficiency resources in New York, including the Clean Energy Fund, the Renewable Portfolio

[27] PSL §5(2); see also PSL §66(3).

[28] PSL §66-p(7).

[29] State Energy Law §§3-103 and 6-104.

Standard, the Energy Efficiency Portfolio Standard, and the Energy Efficiency Transition Implementation Plans. The activities directed and authorized in this Order will continue and build upon the progress made through those programs.

DISCUSSION

A. Incremental 4 GW Target

Distributed solar resources have been and continue to be a vital component of New York's clean energy program, particularly as the State works toward the CLCPA goal of serving 70 percent of statewide electric load with renewable resources by 2030 (the 70 by 30 Target).[30] In less than two years since the Commission issued the NY-Sun Expansion Order extending and expanding the NY-Sun program, nearly all of the 6 GW Target has been committed, which both points to the competitive nature of the existing program and suggests a demand to expand the program target. The Incremental 4 GW Target represents a logical next step in accelerating distributed solar growth in New York, as the State bridges the gap to a future, sustainable market for distributed solar where development costs have decreased to the point where incentives are no longer required. It is also notable that the vast majority of commenters generally supported establishing an Incremental 4 GW Target to continue the positive momentum for distributed solar development in New York that has materialized over the last few years.[31] For these reasons, the

[30] See PSL §66-p(2).

[31] As discussed below, commenter perspectives differed with respect to the appropriate way to achieve the Incremental 4 GW Target. Some commenters expressed concern about the costs to achieve the Incremental 4 GW Target, while one commenter advocated that the Commission should focus on nuclear power instead of solar. One commenter also expressed that the Incremental 4 GW Target is insufficient, and that New York should aim for a higher target.

Commission formally adopts the Incremental 4 GW Target as the next phase of distributed solar development in New York State.

While the Roadmap presented a number of different options for approaching the Incremental 4 GW Target, the Commission agrees that continuation of the NY-Sun initiative, which provides upfront incentives for different distributed solar market sectors, provides a transparent, efficient, and cost-effective path forward to advance additional solar development in New York. The NY-Sun program has been an effective means of driving distributed solar deployment, and it is reasonable and appropriate to leverage that familiar framework towards achieving the Incremental 4 GW Target.

For these reasons, and well as those discussed below, the Commission adopts the Roadmap proposal to (a) extend the NY-Sun program through 2030, (b) expand the scope of the program to incentivize an incremental 3,393 MW of new distributed solar capacity statewide toward the broader Incremental 4 GW Target, and (c) increase NY-Sun funding by $1.474 billion. NYSERDA shall file an updated NY-Sun Operating Plan reflecting this program expansion approved in this Order by May 31, 2022.

B. Expanded NY-Sun Program

1. Base Incentives and Adders

Commenters generally supported the Roadmap recommendation to have carve-outs for projects in the Con Edison service territory, and projects located in upstate New York. The Commission agrees that it is appropriate to segment the expanded NY-Sun program into separate upstate and Con Edison allocations, particularly given the significant differences between the two regions in terms of solar development to-date, the "missing money" required to support future solar installations, developmental hurdles (e.g., siting), proportions of low-income customers within the two populations, and differences in hosting capacity. Separating the upstate and Con Edison allocations tailors the NY-Sun program to the specific needs of each geographical region.

Regarding Con Edison, the Roadmap recommended a specific carve-out of 450 MW of distributed solar, separated into multiple blocks for different market segments (including a Residential block and two tiers of Nonresidential incentives).[32] In its comments, the City of New York (the City) specifically requested that the Commission increase the total MW allocation to Con Edison from 450 MW to 568 MW, based on the current portion of statewide distributed solar being completed downstate. While historically the majority of distributed solar projects have been sited in upstate New York, using a historical snapshot of statewide installations to set the Con Edison carve-out does not account for new policies that are designed to foster increased solar development downstate. Moreover, based on the much-higher costs to develop solar projects in New York City as compared to the upstate region, significantly increasing the Con Edison allocation would require either a correspondingly-significant increase in the overall NY-Sun budget or drastically reducing base incentives and/or adders to a level that may not spur sufficient solar growth to achieve the Incremental 4 GW Target. Instead, as discussed below, the Commission modifies the incentives available to Con Edison projects in a manner that, while remaining within the budget authorized herein, should provide the necessary incentives to spur downstate distributed solar development and substantially increase the benefits accruing to downstate customers (especially low-income customers).

[32] Capacity values noted in this section are based on their direct current (DC) value.

Numerous stakeholders also raised concern that the proposed nonresidential incentives, coupled with a low Community Adder and the depletion of the Community Credit, could drive the market in New York City toward remote crediting projects and away from CDG projects, and would make it more difficult to achieve a target that 70% of new capacity be developed as community solar (as opposed to remote crediting or behind-the-meter projects). Commenters also raised concern that small projects, which can more easily meet the siting constraints of a dense urban area like New York City, may inadvertently be passed over in favor of medium-sized projects in the two-tiered framework. Several parties like the City, the Clean Energy Parties, and Powerflex Solar, LLC, offered specific proposals to add a third tier of incentives for small projects, along with corresponding changes to both base incentive and adder rates.

The Commission agrees with those commenters suggesting that changes are needed to the proposed base incentive block structure to align incentives more closely with the realities of developing solar in New York City, particularly with respect to smaller projects that can meet the siting constraints in New York City. Therefore, NYSERDA is directed to modify the Con Edison Nonresidential MW Blocks from a two-tier structure to a new, three-tier structure by splitting the proposed smaller tier into two separate sub-tiers, as follows: (a) 150 MW of large projects greater than 1 MW in size; (b) 100 MW of medium projects between 200 kW and 1 MW in size; and (c) 50 MW of small projects less than 200 kW in size. Introducing a specific incentive block for small projects will ensure adequate support for such projects, while still encouraging the development of larger solar arrays. NYSERDA should closely monitor projects developed in the less-than-200 kW size category to make sure that this new incentive rate does not encourage gaming of the program (i.e., larger projects sub-dividing to receive greater incentives).

Regarding the target presented in the Roadmap that 70% of all projects incentivized through NY-Sun should be CDG projects, the Commission notes that the target should not be considered a fixed goal. Instead NYSERDA's implementation of the expanded NY-Sun program should prioritize cost-effectiveness and a balanced market, in addition to the fundamental requirement that at least 35% of overall program benefits inure to disadvantaged communities. In particular, remote crediting remains an important component of the overall distributed solar mix because it has the potential to further reduce overall project and program costs. The Commission agrees that NYSERDA should maintain flexibility to adjust base incentives for future MW Blocks and adder rates depending on the impact of these changes on both CDG and remote crediting project development (e.g., by increasing future base incentive rates to still encourage remote crediting development). Likewise, NYSERDA should consider situations that may warrant lowering incentive and adder rates (e.g., if changes to Federal policies reduce solar development costs more than anticipated).

In tandem with the three-tiered base incentive structure, the Commission is also persuaded by those comments that assert that the proposed Community Adder for the Con Edison service territory may be insufficient to drive CDG development and could lead to a substantial market shift towards behind-the-meter or remote crediting projects targeted at larger corporate off takers rather than smaller customers (including low-income customers). However, rather than simply shifting some of the base incentives toward the Community Adder to drive mass market CDG development, the Commission instead finds that it is more appropriate to specifically focus this part of the program on disadvantaged communities, which historically have not proportionally benefited from CDG and solar development in general. To that end, the Commission directs NYSERDA to adopt the program structure for Con Edison as discussed below.

First, as several commenters noted, developer uptake of the Con Edison Inclusive Community Solar Adder (ICSA) has lagged behind the uptake of the ICSA available in upstate New York.[33] NYSERDA is directed to increase its current Con Edison ICSA incentive rates by $0.20/Watt for the remainder of the existing initial Con Edison 100 MW ICSA incentive block.[34] Thus, following this modification, the initial Con Edison ICSA rates shall be $0.30/Watt for projects meeting the base ICSA requirements, and $0.40/Watt for projects meeting the additional EJ criteria. These increases will help accelerate more CDG growth in the Con Edison service territory, in particular, projects that specifically target benefits towards LMI customers and disadvantaged communities, while also addressing the insufficiency of adders for Con Edison projects raised by stakeholders. NYSERDA is also directed to make available no less than 50 MW of additional Con Edison ICSA capacity in future block(s), with the incentive rates for those blocks to be set based on the NY-Sun program's progress toward the Incremental 4 GW Target and the CLCPA equity requirements, as well as the

[33] NYSERDA opened an initial Con Edison ICSA block of 100 MW in July 2021. As of March 28, 2022, 21.7 MW of that initial Con Edison block has been committed. See https://www.nyserda.ny.gov/All-Programs/NY-Sun/Contractors/Dashboards-and-incentives/Inclusive-Community-Solar-Adder.

[34] NYSERDA currently offers two tiers of ICSA for Con Edison projects: (1) a $0.10/Watt adder available to projects that meet the general ICSA program requirements; and (2) a $0.20/Watt "Environmental Justice Incentive" adder for projects that meet additional criteria defined in the NY-Sun Program Manual.

market's response to the increased initial ICSA rates. Likewise, the initial Community Adder rate should be increased from $0.10/Watt to no less than $0.20/Watt, with an initial block of 100 MW for Con Edison.[35]

Third, several commenters focused on the existing Multifamily Affordable Housing Incentive (MAHI) available to Con Edison projects located on affordable housing properties.[36] Like the ICSA, the MAHI is also available in two tiers: a $1.00/Watt tier for projects meeting base requirements, and a $2.00/Watt tier for projects meeting additional criteria set forth in the NY-Sun Program Manual. The Commission directs NYSERDA to increase the lower Con Edison MAHI tier from $1.00/Watt to $1.60/Watt, and maintain the $2.00/Watt MAHI for CDG projects that meet the enhanced criteria. The Commission finds it unnecessary at this time to direct changes to or removal of the 200 kW size threshold as proposed by some commenters, but encourages NYSERDA to continue to work collaboratively with affordable housing stakeholders and Staff to make appropriate adjustments to program rules and processes that may be warranted over time in response to market conditions.

Concurrently, the Commission directs that the per-Watt rates for the initial blocks of the Nonresidential and Residential base incentives should be modestly reduced from the levels proposed in the Roadmap, to accommodate the higher initial ICSA rates, Community Adder, and MAHI. These modifications, while differing slightly from the base incentive and adder rate adjustments recommended by various commenters,

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[35] NYSERDA should clarify that the ICSA and Community Adder can be "stacked."

[36] The MAHI currently sets a higher total incentive rate for projects smaller than 200 kW that are at regulated affordable housing properties, while larger projects are eligible for the full MAHI only for the first 200 kW of capacity.

strike an appropriate balance between addressing commenters' concerns about CDG development in the Con Edison service territory, and simultaneously ensuring that those CDG projects that are developed will focus on providing benefits to LMI customers and disadvantaged communities. When viewed in the aggregate, the Commission estimates that the changes described above should result in up to 70% of Con Edison nonresidential projects that receive base incentives also receiving funding through the SEEF (up from the 40% estimated in the Roadmap).

The revised initial base incentive targets and budgets established herein for Con Edison are specified in Table 4 below:

Table 4

Incentive Type	Project Size	Total Block Size	Revised Initial Incentive Rate ($/Watt)	Total Budget ($)
Nonresidential - Small	0-200 kW	50 MW	$1.20	$78,000,000
Nonresidential – Medium	200 kW-1 MW	100 MW	$1.00	$129,000,000
Nonresidential – Large	> 1 MW	150 MW	$0.50	$104,120,000
Residential		150 MW	$0.20	$30,000,000

As part of the Mid-Point Review, NYSERDA shall assess the level of capacity remaining in each category and propose adjustments to the allocation of MWs across the three project sizes (if any) based on the market response to the incentive rates. Any proposed reallocation of MW across the size categories must be conducted to maintain at least the total 300 MW target, as well as budget neutrality.

Regarding the upstate region, commenters generally are in support of the Roadmap's proposed incentive framework design and rates, including that the Upstate Utilities be grouped together for program purposes because project costs and revenues are similar across the upstate utilities. Based on the "missing money" analysis provided in the Roadmap, setting the initial base incentive block of the new Upstate C/I incentive category at 800 MW, with an incentive rate of $0.17/Watt, is reasonable to account for the new upstate Community Adder rate authorized here, and the anticipated step-down in the federal ITC. The existing Upstate Nonresidential MW Block structure will remain in its current form, and once those incentives are fully committed, eligible projects may apply for the C/I MW Block incentives. Accordingly, the Roadmap recommendations for base incentive allocations and adders for the upstate region are reasonable and are adopted.

2. Value Stack Compensation

Numerous commenters stated that, although paying upfront incentives is appropriate in the near term to support solar development, it should not be used as a long-term solution. Instead, these commenters support, as a long-term solution, reforming the Value Stack compensation mechanism (including other Value Stack components outside of the E Value, such as the Demand Reduction Value and the Locational System Relief Value).

The Commission acknowledges that upfront incentives may not represent the optimal solution in the future to achieve a self-sustaining solar market. However, the Value Stack compensation methodology has been continually refined over the last few years to improve its predictability, transparency, and accuracy.[37] Nevertheless, continual changes to the Value Stack methodology may create confusion in the CDG marketplace, as well as administrative burdens associated with having to grandfather customer subgroups into various Value Stack iterations to avoid disrupting developer expectations. At this point in time, the Commission views the Value Stack methodology as sufficiently developed and believes it would benefit from a period of stability. For those same reasons, the Commission declines, at this time, to re-establish the VDER Value Stack Working Group, as recommended by some commenters.[38]

Regarding the E Value calculation itself, the Commission agrees with the rationale set forth in the Roadmap for fixing the E Value component of the Value Stack at the current rate of 3.103 cents per kWh (based on the current SCC at a 3% discount rate), and for projects eligible for Value Stack compensation to be locked into that E Value rate for a period of 25 years. Fixing the E Value at a set price provides an additional level of stability to the overall Value Stack compensation methodology, as discussed above. While some commenters recommended using the SCC at a 2% discount rate, as set forth in the NYSDEC Guidance Document, the Commission finds that doing so could result in market inefficiency, overpayments for carbon avoidance, and imposition of higher costs on

[37] See, e.g., Case 15-E-0751, supra, Order on Net Energy metering Transition, Phase One of Value of Distributed Energy Resources, and Related Matters (issued March 9, 2017), Order on Value Stack Eligibility Expansion and Other Matters (issued September 12, 2018), Order Regarding Value Stack Compensation (issued April 18, 2019); Order Regarding Value Stack Compensation for High-Capacity-Factor Resources (issued December 12, 2019).

[38] To the extent billing-related issues continue to arise with respect to Value Stack compensation, those issues should be addressed as part of the on-going Billing and Crediting Working Group overseen by NYSERDA and Staff.

ratepayers than is supported by project economics. Likewise, other proposals advanced by commenters regarding the E Value calculation (e.g., accounting for both environmental and community benefits in the E Value itself or calculating different E Values based on time and location) would require substantial changes to the overall Value Stack methodology which, as noted above, could result in market confusion. The Commission further notes that the Roadmap calculated the total cost of the expanded NY-Sun program, as well as individual base incentive and adder elements of the expanded program, based on the existing Value Stack structure and a fixed E Value at 3.103 cents per kWh. Potential future changes to these Value Stack directives can be considered as part of the Mid-Point Review.

Accordingly, the Commission adopts the Roadmap's recommendation that eligible distributed solar projects continue to be compensated for their generation through the existing Value Stack, including payment of the E Value for their environmental attributes. To effectuate the changes to Value Stack compensation provided for in this Order, the utilities shall update their tariffs consistent with this part of the Order to be effective on June 1, 2022. Given the substantial public process associated with this proceeding, the requirement related to newspaper publication is waived.

3. Eligibility Requirements

The Commission is persuaded by comments from various parties arguing that projects that previously did not receive a NY-Sun base incentive (e.g., because the base incentive blocks were already fully allocated) but applied for and received either the ICSA or a brownfield/landfill adder should be allowed to apply for the new base incentives. This cohort of projects represents only a very small amount of distributed solar capacity in New York.[39] At the same time, these are the types of projects that should be pursued by the State because they specifically provide benefits to low-income customers and/or help to put sites like brownfields and landfills back into beneficial use. Allowing such policy-oriented projects to apply for and receive the new NY-Sun base incentives will avoid losing these projects to financial-related attrition, while having minimal impact on the overall budget adopted here. Projects that have received the ICSA and/or the brownfield/landfill adder will be permitted to retain those adders after they apply for and receive a new NY-Sun base incentive.

The Roadmap also sought stakeholder feedback on whether, on a going-forward basis, opt-out CDG projects should or should not be eligible for the Community Adder incentive, and/or whether such projects should be eligible for a partial Community Adder. Most respondents support extending the full Community Adder incentive to projects participating in opt-out CDG, citing the fledgling nature of this market segment and noting that potential savings from avoided customer acquisition activities is unknown, at this time, for such projects. Other commenters argued that opt-out CDG is expected to lower customer management costs, and therefore such projects have a lesser need for upfront incentives.

The Commission acknowledges the broad industry interest for opt-out CDG to be eligible for the Community Adder. Nevertheless, the specific parameters of an opt-out CDG program are still being developed, and Staff has only recently issued a

[39] Based on a review of the NY-Sun project pipeline, only 24 projects currently fall into this narrow category.

straw proposal on that topic.[40] It is premature at this time to adopt specific requirements or restrictions for opt-out CDG projects to receive NY-Sun incentives, particularly when many questions about the opt-out program remain unresolved. Instead, the eligibility of opt-out CDG projects to receive the Community Adder incentive should be addressed as part of the broader opt-out CDG program consideration within the Community Choice Aggregation (CCA) proceeding.[41]

Upon consideration of the comments received, the Commission adopts the other proposed incentive eligibility requirements set forth in the Roadmap. First, upstate projects that have already received a NY-Sun MW Block base incentive as of the date of the Roadmap will not be permitted to cancel their applications and re-apply at a higher incentive rate. Conversely, projects that did not previously receive a base incentive will be eligible to apply for the newly-available NY-Sun incentives, subject to regular program rules and eligibility requirements. Restricting projects that previously received a NY-Sun incentive from re-applying for the new incentives will avoid overpayments to such projects and will prevent back-sliding from the 6 GW Target, which these projects have already been counted towards.

Second, Nonresidential projects in the Con Edison service territory that apply to the NY-Sun program subsequent to the filing of the Roadmap, as well as Nonresidential projects that submitted applications to the current block (Block 10)

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[40] Case 14-M-0224 et al., Proceeding on Motion of the Commission to Enable Community Choice Aggregation Programs, Straw Proposal on Opt-Out Community Distributed Generation (issued March 29, 2022).

[41] Case 14-M-0224, supra, Order Identifying Further Procedural Steps Regarding the Development of Opt-Out Community Distributed Generation (issued November 22, 2021).

before the Roadmap's filing but were not previously awarded the Community Credit, may opt into the new Nonresidential incentive blocks. As noted in the Roadmap, all remaining unallocated capacity in Con Edison's current Nonresidential MW Block structure will be cancelled and replaced by the new Con Edison nonresidential incentives authorized in this Order.

4. Solar Energy Equity Framework (SEEF)

As the Commission has previously stated, the inclusion of LMI customers, as well as those living in disadvantaged and EJ communities, in New York State's clean energy programs is crucial both to the programs' success and to their fairness.[42] The CLCPA codified a requirement that disadvantaged communities receive at least 35% of the benefits of funds used in the context of the State's clean energy programs.[43] The Commission notes that the identification of disadvantaged communities is tasked to the Climate Justice Working Group (CJWG), pursuant to ECL §75-0111. The CJWG has issued draft criteria for identifying disadvantaged communities in New York, which are currently subject to a public comment period.[44] While those criteria are being finalized, it is important that concrete efforts be taken in the interim to design a program that provides quantifiable benefits to these communities, consistent with the CLCPA's goals.

The Commission finds that an expanded SEEF is an appropriate means of ensuring that the Incremental 4 GW Target will be administered in a manner that achieves the CLCPA's goals related to disadvantage communities. The Commission disagrees

[42] See NY-Sun Expansion Order, p. 23.

[43] Environmental Conservation Law (ECL) §75-0117.

[44] The draft criteria are available at https://climate.ny.gov/Our-Climate-Act/Disadvantaged-Communities-Criteria.

with those commenters expressing a concern regarding use of the SEEF for this purpose. In authorizing the SEEF in the NY-Sun Expansion Order, the Commission noted that the SEEF can offer a diverse array of strategies to direct the benefits from distributed solar projects developed through the NY-Sun program toward LMI customers and disadvantaged communities. Through the concrete commitments described in more detail below, the SEEF is well-positioned to enable the expanded NY-Sun program to comply with the CLCPA's requirements for disadvantaged communities.

The Commission directs that the expanded SEEF aim to achieve a goal of no less than 1,600 MW of new distributed solar capacity, or 40% of the Incremental 4 GW Target, targeted toward LMI residents, and those living in regulated affordable housing, and disadvantaged and EJ communities under SEEF. As proposed in the Roadmap, at least half of that 40% target must be focused on projects that provide LMI residential customers with direct, guaranteed bill savings, such as residential rooftop solar and CDG projects serving individual LMI customers, or CDGs serving LMI customers through an opt-out community solar program.[45] The Commission emphasizes that the SEEF, while primarily focused on higher incentive levels and/or capacity targets for projects that provide direct savings to LMI customers and disadvantaged communities, should also consider alternative means to support distributed solar for those communities. As suggested in the

[45] Residents of master-metered, multifamily buildings who receive cost savings from Value Stack credits applied to the master meter through sub-metering or other means would be included in this targeted capacity. See Case 15-E-0082, Community Net Metering, Order Establishing a Community Distributed Generation Program and Making Other Findings (issued July 17, 2015), pp. 13-15 (occupants of a master-metered multi-unit building are counted as mass market participants for purposes of compliance with the rule that a CDG project allocate at least 60% of its credits to mass market customers).

Roadmap, NYSERDA shall provide technical assistance, predevelopment funding, and other programmatic support for community solar projects serving these target communities. NYSERDA is also directed to continue working closely with interested stakeholders to maximize the SEEF's reach and effectiveness and ensure that the authorized SEEF budget is used in a thoughtful and comprehensive manner to benefit disadvantaged communities. Moreover, upon the CJWG's finalization of the criteria defining "disadvantaged communities," NYSERDA and Staff shall review the programmatic elements of the SEEF structure to assess compliance with the 35% funding requirement specified under ECL §75-0117, and file with the Commission any adjustments to the program design and budget that may be necessary to comply with that requirement.

We note that, within the overall SEEF framework itself, the ICSA has been demonstrably successful in fostering community solar projects serving low-income customers. The Commission thus directs that the ICSA be expanded to further drive distributed solar development that directly benefits LMI customers, along with modifications to the MAHI, Community Adder, and base incentives for Con Edison, as discussed above. These changes for Con Edison should help foster development of CDG projects in New York City that specifically subscribe LMI customers.[46] The Commission notes that NYSERDA shall retain flexibility through its NY-Sun Operating Plan to adjust future base incentive and adder rates based on commitment levels in

[46] As a programmatic requirement, projects are already required to dedicate at least 20% of capacity to guaranteed-savings subscriptions for individual LMI households, with a minimum 10% bill savings in order to receive the ICSA. This 10% bill savings assumption was utilized as part of NYSERDA's modeling of the costs and benefits associated with the expanded NY-Sun program, as compared to an assumed 5% bill savings for non-LMI mass market customers.

prior blocks, and to adjust to evolving market conditions.[47] The Commission also encourages NYSERDA to continue working with stakeholders and Staff to refine the parameters of the ICSA program, as needed, towards meeting the CLCPA requirements.

In order to accommodate increases to the ICSA rates described above, and to place a greater emphasis on program funds being spent on projects that provide benefits to disadvantaged communities, a greater portion of the overall program budget should correspondingly be shifted from base incentives to the SEEF. Accordingly, the Commission directs that the SEEF budget be increased from the $206.7 million proposed in the Roadmap to a revised budget of $251.7 million. While the Commission is not requiring, at this time, that NYSERDA specify individual carve-outs for the upstate and Con Edison regions, we are cognizant of commenters' concerns that one region may exhaust a disproportionate amount of the SEEF budget to the detriment of the other region. For this reason, the Commission directs NYSERDA, as part of its tracking of SEEF spending, to make a filing with the Commission in the event 50% of the total SEEF budget has been expended prior to the Mid-Point Review. As part of this filing, NYSERDA shall provide a breakdown of the spending by category (i.e., ICSA or other adder) and region (i.e., upstate or Con Edison), and recommend changes needed, if any, to ensure an equitable distribution of SEEF funds between upstate and Con Edison, and to maintain the path towards compliance with the CLCPA's requirements for disadvantaged communities.

[47] This flexibility, as well as the Commission's modified incentives for Con Edison obviates the need for specific base incentive carve-outs for SEEF projects as suggested by some commenters.

In its comments, the Joint Utilities state that they will be submitting a proposal for pilot programs under which utility-specific procurements would be used to provide community solar benefits directly to low-income customers. The pilots described appear similar to the Expanded Solar for All project the Commission recently approved for National Grid.[48] We direct the utilities to work with Staff and NYSERDA to ensure that these proposals are designed to efficiently use the appropriate limited portions of the approved SEEF budgets, if necessary.

Finally, the Commission reminds NYSERDA of its continuing obligation to report on metrics for energy savings and clean energy market penetration in the LMI market and to post such information on its website, pursuant to its NY-Sun Operating Plan. Careful tracking of SEEF funds spent and the corresponding benefits inuring to disadvantaged communities and LMI customers will be critical to ensuring compliance with the funding requirement for disadvantaged communities under the CLCPA.

5. Prevailing Wages

Many commenters voiced support for including a requirement that each developer that obtains a grant through the program pay prevailing wages for construction activities associated with project development and installation. The Commission agrees that, as a general policy, the transition to a green economy should be accompanied by the creation of well-paying jobs. Establishing clear standards for job quality in the clean energy sector will help protect workers, create good jobs, and help foster future sector growth. As noted in the Roadmap, NYSERDA has a longstanding practice of including requirements related to prevailing wages or project labor

[48] Case 19-E-0735, supra, Order Approving Expanded Solar For All Program with Modifications (issued January 20, 2022).

agreements in contracts entered into pursuant to its large-scale renewables programs. The Commission believes that it is both reasonable and appropriate to extend that practice to the Incremental 4 GW Target, so that distributed solar growth in New York is accompanied by well-paying jobs.

Given the foregoing, the Commission adopts the Roadmap's recommendation and determines that, for projects having a nameplate capacity of 1 MW AC or greater, eligibility for NY-Sun incentives is conditioned on the developers paying prevailing wages for construction activities associated with project development and installation.[49] Setting the threshold at 1 MW AC strikes a balance between the economic- and job-related benefits accruing from the prevailing wage requirement, and the incremental cost associated with complying with this requirement (on which the proposed budget for the Prevailing Wage Adder was based).

At the same time, to ensure that the Incremental 4 GW Target can be achieved in a timely manner, a new Prevailing Wage Adder is also appropriate to help offset some of the incremental development costs that result from the transition to prevailing wages. The Commission finds NYSDERA's estimates of $0.125/Watt and $0.20/Watt for Upstate and Con Edison C/I projects, respectively, to be a reasonable approximation of the incremental cost of prevailing wages, and an appropriate measure for the initial Prevailing Wage Adder rates. While some commenters argued that these estimates are too low, the Commission notes that NYSERDA and Staff will undertake a comprehensive review of the true cost of prevailing wages

[49] Construction and development activities subject to the prevailing wage requirements shall be specified by NYSERDA in its Operating Plan associated with the implementation of the Roadmap, as well as in NY-Sun project contracts.

(including any possible offsetting factors, such as future changes to federal tax policy and/or prevailing wage requirements) as part of the Mid-Point Review. Further actions can be taken at that time if it is determined that the $239 million budget for the Prevailing Wage Adder is insufficient to support the transition, or if modifications to the adder rate is warranted based on evolving impacts of prevailing wages on project development costs.

To further ensure that one region does not disproportionately exhaust the Prevailing Wage Adder budget to the other region's detriment, the Commission directs NYSERDA to track spending of the Prevailing Wage Adder budget. As ordered with respect to the SEEF budget, the Commission similarly directs NYSERDA to file a report with the Commission detailing the spending by region and recommending changes, as appropriate, to the adder incentive rates and/or structure if 50% of the total Prevailing Wage Adder budget is exhausted prior to the Mid-Point Review.

The Roadmap recommended that, to avoid impacting projects already under development, a project should only be subject to the prevailing wage requirement if it submitted its interconnection application to the utility after the Roadmap's filing, as opposed to the eligibility threshold for projects to qualify for the new base incentives, which is specifically tied to the date on which the project made its 25 percent interconnection payment. Many commenters noted that the implementation of prevailing wage requirement will take significant time and that there is a learning curve for developers to research and understand those requirements. For example, some commenters noted that setting up apprenticeship programs and training back-office staff will require time and money, and that such costs were not anticipated by developers whose projects are already in the interconnection queue. The Commission is persuaded by the comments received on this issue. Thus, a contractor will not be subject to the prevailing wage requirement unless it submits its initial interconnection application after the effective date of this Order (as opposed to the date of the Roadmap's filing). This will offer additional time for contractors to navigate the compliance and administrative intricacies associated with meeting prevailing wage standards, as well as how such requirements may impact project economics.

The Prevailing Wage Adder will be made available to all projects that are required to meet the prevailing wage requirement in order to receive NY-Sun incentives. The Commission is not persuaded that the Prevailing Wage Adder should be available to any project that voluntarily chooses to pay prevailing wages, regardless of whether such developers are obligated to meet the prevailing wage requirement, as some commenters suggest. Offering the Prevailing Wage Adder to all such projects would create budget uncertainty, as NYSERDA calculated the $239 million dedicated to offset the transition to prevailing wages based on the estimated capacity of projects that are expected to meet that requirement (i.e., projects 1 MW AC or larger in size). It could also create a situation where finite Prevailing Wage Adder funds become unavailable for projects that are required to meet the prevailing wage requirement.

6. Other Considerations

The Roadmap proposed various distribution hosting system and interconnection improvements to support the Incremental 4 GW Target. Without assessing the merits of these recommendations, the Commission notes that in May 2020 it commenced a case to implement Section 7(3) of the Accelerated

Renewable Energy Growth Act (Accelerated Renewables Act), as part of an effort to facilitate compliance with the renewables targets under the CLCPA.[50] The Commission has since issued two orders in that case to require the utilities to develop plans for distribution system upgrades for unbottling and facilitating access to renewable energy.[51] The Roadmap's proposals for distribution system investment, including future utility investments to realize the additional hosting capacity needed to achieve the Incremental 4 GW Target, should be addressed as part of that coordinated process.[52] Likewise, contemporaneously with issuance of this Order, the Commission is issuing an order amending the SIR, including finalizing a revised approach to funding distribution system upgrades (the Cost-Sharing 2.0 framework).[53] The SIR Order includes reporting requirements that will allow the Commission to evaluate the success of Cost Sharing 2.0 in the context of the Incremental 4 GW Target. In light of the steps taken by the Commission in the SIR Order, it

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[50] See Case 20-E-0197, Proceeding to Implement Accelerated Renewables Act, Order on Transmission Planning Pursuant to the Accelerated Renewables Act (issued May 14, 2020) (initiating proceeding to implement L. 2020, ch. 58, part JJJ, §7).

[51] See Case 20-E-0197, supra, Order on Phase 1 Local Transmission and Distribution Project Proposals (issued February 11, 2021); Order on Local Transmission and Distribution Planning Process and Phase 2 Project Proposals (issued September 9, 2021).

[52] Staff has initiated a stakeholder comment effort relating to the utilities' pending proposal for a coordinated grid planning process. This would be an appropriate forum for consideration of the distribution investment issues raised in the Roadmap. See Case 20-E-0197, supra, Notice Extending Comment Period (issued March 3, 2022).

[53] See Cases 20-E-0543 et al., Standardized Interconnection Requirements, Order Approving Compliance Filings, With Clarifications (issued April 14, 2022) (SIR Order). For example, the SIR Order directs that the Cost-Sharing 2.0 framework sunset after a period of five years, unless otherwise ordered by the Commission.

is appropriate to defer acting on the Roadmap's recommendations relating to the funding of distribution system infrastructure.

Several commenters recommended establishing an incentive adder specifically for "agrivoltaics."[54] The Commission continues to support the establishment of an agricultural program to offer support and incentives to projects that are designed to maximize agricultural and environmental co-benefits.[55] However, the record on this matter is incomplete. Accordingly, NYSERDA and Staff are directed to evaluate the potential for such an adder (whether on a stand-alone basis, or as an expansion of an existing adder focused on beneficial siting) and submit a proposal for Commission consideration if such an adder is deemed necessary and reasonable.

7. Budget and Program Funding

The Commission has reviewed the incremental $1.474 billion in funding proposed in the Roadmap and finds it is reasonable and appropriate relative to the achievement of the Incremental 4 GW Target. While the average per-Watt cost to achieve the Incremental 4 GW Target (approximately $0.37/Watt) is higher than the average cost to achieve the 6 GW Target ($0.30/Watt, based on the $573 million authorized in the NY-Sun Expansion Order to incentivize approximately 1,910 MW of distributed solar), the Commission notes that the expanded NY-Sun initiative authorized in this Order includes items that were not previously included in the NY-Sun program, such as funding specifically allocated to projects in the Con Edison service territory, which requires higher per-Watt incentives, as well as $239 million to assist the industry with transitioning to increased prevailing wage requirements.

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[54] "Agrivoltaics" generally refers to solar installations that integrate solar arrays and farming activity on the same land.

[55] NY-Sun Expansion Order, p. 25.

The Commission is mindful of the overall impact that collections for clean energy programs have on ratepayers, particularly given the number of programs that have been approved in recent years to achieve the State's clean energy goals. As noted in the NY-Sun Expansion Order, new collections should reflect holistic considerations of the funds collected for, and allocated to, clean energy programs, including compliance with the CLCPA's clean energy targets. In this case, based on an updated analysis of projected expenditures and collections, the Commission estimates that the costs to achieve the Incremental 4 GW Target will have a statewide average residential ratepayer bill impact of $0.75 per month over the eleven year program period, with a maximum residential ratepayer bill impact of $1.24 per month occurring in 2024. This equates to a 1.27% bill increase for a typical upstate National Grid customer, and a 0.91% bill increase for a typical downstate Con Edison customer, both assuming the customer uses 600 kWh of electricity per month. In turn, this funding is expected to support approximately $4.4 billion in private investment in New York State, with additional cost reductions possible depending on the status of future Federal tax and other policy changes (e.g., through the BBB Act).

Moreover, the expanded NY-Sun program will contribute to the overall 70 by 30 Target established by the CLCPA. As noted in the recent CES Modification Order, the amount of incremental renewable energy necessary to meet the 70 by 30 Target is calculated by subtracting the contribution of currently operating and already-contracted renewable energy projects from a projection of statewide electric load in 2030.[56]

[56] Case 15-E-0302, Clean Energy Standard, Order Adopting Modifications to the Clean Energy Standard (issued October 15, 2020) (CES Modification Order).

In turn, that incremental renewable energy requirement is allocated to various programs, including but not limited to the Offshore Wind Program, the NY-Sun program (in furtherance of the 6 GW Target), and Tiers 1 and 2 of the CES. The Commission notes that Tier 1 of the CES is specifically designed so that any distributed solar that may be deployed after achievement of the 6 GW Target would correspondingly reduce the renewable generation that must be procured through Tier 1.[57] Thus, to the extent the NY-Sun program funding authorized in this Order will enable the achievement of the Incremental 4 GW Target, the amount of renewable energy that must be procured through Tier 1 will be proportionally reduced and, correspondingly, the cost of the CES Tier 1 program will also decrease.

Table 5 below provides the revised targets and budgets for base incentives and adders based on the changes adopted in this Order regarding base incentives and adders.[58]

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[57] CES Modification Order, p. 22.

[58] Funds for the ICSA are incorporated into the SEEF budget.

Table 5

	MW	Requested Funding
Upstate MW Block Incentives – C/I	2,943	$400,303,283
Community Adder (Upstate)	2,060	$144,207,000
TOTAL – Upstate-specific Budget	***2,943***	***$544,510,283***
Con Edison MW Block Incentives – Residential	150	$30,000,000
Con Edison MW Block Incentives – Small Projects	50	$78,000,000
Con Edison MW Block Incentives – Medium Projects	100	$129,000,000
Con Edison MW Block Incentives – Large Projects	150	$104,120,000
Con Edison Rooftop Canopy Adder	4	$800,000
Con Edison Parking Canopy Adder	60	$12,000,000
Community Adder (Con Edison)	210	$42,000,000
TOTAL – Con Edison-specific Budget	***450***	***$395,920,000***
Landfill/Brownfield Adder (Upstate and Con Edison)	-	$13,918,500
TOTAL – Incentives and Adders	**3,393**	**$954,348,783**

Table 6 below provides the total budget and additional funding authorized in this Order, inclusive of SEEF funds, the Prevailing Wage Adder, and funds associated with administration, implementation, evaluation, customer education, and the Cost Recovery Fee.

Table 6

	Current Committed/ Expended	**Current Uncommitted**	**Requested Additional**	**TOTAL**
MWB Incentives and Adders	$1,343,921,601	$186,930,616	**$954,348,783**	$2,485,201,000
Funds to Assist Transition to Prevailing Wage	-	-	**$238,725,000**	$238,725,000
Administration	$17,630,682	$28,825,318	**$12,300,000**	$58,756,000
Implementation	$17,189,864	$15,410,136	**$0**	$32,600,000
Customer Education	$3,500,000	$3,000,000	**$0**	$6,500,000
Solar Energy Equity Framework	$35,339,780	$112,660,220	**$251,764,000**	$399,764,000
Evaluation	$393,880.85	$2,106,119	**$1,000,000**	$3,500,000
NY Cost Recovery Fee	$5,804,255	$20,237,340	**$15,758,404**	$41,800,000
TOTAL	$1,423,780,063	$369,169,750	**$1,473,896,187**	$3,266,846,000

Previously, when authorizing expansions to the scope and length of the NY-Sun program, the Commission directed the use of existing, uncommitted funds collected for the same or a similar purpose to fund the program expansion, and for such existing funds to be exhausted before any new funds are collected.[59] As noted in the Roadmap, however, all uncommitted legacy funds have since been exhausted, thus necessitating new collections to achieve the Incremental 4 GW Target. In order to fund the expanded NY-Sun program through 2032 (inclusive of close-out activities), additional funds are needed. As such, the Commission authorizes the total collections proposed in the Roadmap to fully fund the expanded NY-Sun program. However, modifications to the annual collections schedule are needed to better match collections to projected expenditures. Further, based on an analysis of NYSERDA's current available funds, the

[59] See, e.g., NY-Sun Expansion Order, pp. 18-19.

Commission finds that NYSERDA has sufficient funding to cover projected costs in 2022, thereby allowing incremental collections to be delayed until 2023. These incremental costs shall be allocated to each investor-owned electric utility based on its proportion of overall MWh load, and collected from ratepayers via the SBC surcharge, as detailed in Appendix B, which reflects the revised collection schedule.[60] Within 14 days of the date of this Order, NYSERDA is directed to file an update to its Cash Flow Analysis, as required in the CEF Framework Order, to reflect the projected expenditures and authorized collections associated with this Order.[61]

Funding will be provided to NYSERDA utilizing the existing Bill-As-You-Go mechanism established under the CEF Framework Order, which requires utilities to hold collections with carrying charges applied using the Other Customer Provide Capital Rate until requisitioned by NYSERDA, based on a two-month working capital need. As previously directed by the Commission, carrying charges associated with these and other SBC funds shall be segregated on the books of the utility for the benefit of the ratepayer, as designated by the Commission.

8. Mid-Point Review

Numerous parties acknowledged that a Mid-Point Review process is necessary and appropriate. However, there were many varying opinions on the appropriate timing for a Mid-Point Review, as well as the framework for such a review. For example, several commenters proposed that the Mid-Point Review should occur much earlier than the Roadmap recommendation of the

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[60] Each utility’s proportional MWh load was calculated utilizing the full service and retail access load as documented in the 2019 annual reports to the Commission, and is net of deliveries to NYPA customers.

[61] The Commission requires NYSERDA to file an annual CEF Cash Flow Analysis within 60 days of the end of each calendar year.

earlier of the date when half of the new capacity has been committed, or December 31, 2025. Other commenters proposed multiple reviews over the course of the expanded NY-Sun program, or for reviews to be performed on an annual basis.

Re-evaluating the program design on an excessively frequent basis would result in administrative inefficiencies and could create market uncertainty. Additionally, under the existing NY-Sun MW Block design, NYSERDA and Staff already have the option of revisiting incentive levels each time a new block is announced, thus providing for a certain degree of program flexibility within the existing program design to respond to market conditions. The Commission acknowledges, however, that there are substantial differences between the upstate and Con Edison incentive structures and it is unclear precisely how solar development will transpire in these two regions. For this reason alone, NYSERDA shall track distributed solar development separately for the Con Edison and upstate regions, and the Mid-Point Review should account for such tracking. Accordingly, the Mid-Point Review filing is triggered by the earlier of: (1) the date when 50% of either the upstate or Con Edison capacity allocations have been committed; or (2) December 31, 2025.

The Mid-Point Review filing and recommendations should be formally filed with the Commission for stakeholder comment in accordance with SAPA within 60 days after one of the above occurrences, with at least one intervening technical conference to offer stakeholders an opportunity to ask questions and provide feedback on the filing. As part of the Mid-Point Review, NYSERDA should analyze, at a minimum: (1) updated project cost estimates based on developer-reported data, utility-reported interconnection costs, and international cost trends in modules and other components; (2) the types of projects being developed in response to the incentives offered (i.e., remote crediting versus CDG projects); (3) market or policy factors that may be driving changes in rate of uptake and/or costs, such as broader adoption of net crediting, opt-out CDG, or other changes to state or federal policy; and (4) whether any changes to the E Value, base incentives or adders are warranted in response to the previous factors.

9. Implementation, Administration, Evaluation and Billing

The Commission adopts the Roadmap's proposals regarding implementation, administration, and ongoing evaluation of the expanded NY-Sun program, which were not challenged by commenters. NYSERDA is directed to exhaust its existing balances of uncommitted funds for these purposes and is authorized to thereafter collect the incremental amounts requested in the Roadmap for ongoing implementation, administration, and evaluation activities.

The Commission would be remiss in expanding NY-Sun without addressing the existing and ongoing billing problems related to customer participation in the Commission's community solar and net metering programs, particularly in the area served by Central Hudson. These billing problems could easily lead to a chilling effect regarding customer participation in these important programs. The Commission will closely monitor the roll-out of the expanded NY-Sun program to ensure that these billing problems do not persist. The utilities are reminded that the Commission has authority in rate cases and other contexts to review the prudence of their billing practices and impose rate treatment and corrective measures as deemed appropriate.

10. Reporting

As part of the CEF Framework and CEF Modification Orders, the Commission established various CEF-related reporting requirements, including but not limited to annual and quarterly reporting on NY-Sun activities.[62] These obligations shall continue with respect to the expanded NY-Sun program, and the Incremental 4 GW Target. Given NY-Sun's role as one of the four portfolios of the CEF, NYSERDA is further directed to update its overall Goals and Metrics Framework, as detailed in Appendix C of the CEF Modification Order, to reflect the decisions in this Order.

CONCLUSION

Based on the foregoing, the Commission approves the recommendations included in the Roadmap, with modifications, as noted above. This Order continues New York State's success in accelerating the pace of distributed solar deployment, which will help support the continued development of a clean, distributed, dynamic, and efficient electric grid. The Commission finds that establishing the Incremental 4 GW Target and expanding the NY-Sun program, as approved here, will drive this development, while continuing the trend of reduced prices and incentives associated with distributed solar, and is within the public interest.

The Commission also views this Order as providing appropriate mechanisms to support a substantial increase in program participation by LMI customers, and those living in affordable housing, and disadvantaged and EJ communities. The Commission encourages all energy market actors to continue to develop improvements and innovations that will reduce costs and maximize customer and system benefits.

[62] See CEF Modification Order, pp. 82-87; CEF Framework Order, Appendix D.

The Commission orders:

1. The Commission adopts the target of achieving 10 gigawatts of distributed solar deployment in New York State by 2030, as discussed in the body of this Order.

2. As discussed in the body of this Order, the NY-Sun program administered by the New York State Energy Research and Development Authority is expanded and extended to have a target of 10 GW, to run through 2030, and to have its funding level increased by approximately $1.474 billion, as discussed in the body of this Order.

3. The New York State Energy Research and Development Authority shall file an updated NY-Sun Operating Plan reflecting the decisions in this Order by May 31, 2022.

4. Central Hudson Gas & Electric Corporation, Consolidated Edison Company of New York, Inc., Niagara Mohawk Power Corporation d/b/a National Grid, New York State Electric & Gas Corporation, Rochester Gas & Electric Corporation, and Orange and Rockland Utilities, Inc. are directed to file tariff amendments modifying their Value Stack compensation methodologies, in conformance with the discussion in the body of this Order, on not less than 15 days' notice to become effective on June 1, 2022.

5. The requirements of Public Service Law §66(12)(b) and 16 NYCRR §720-8.1, as to newspaper publication, with respect to the tariff filings directed in Ordering Clause No. 4, are waived.

6. Central Hudson Gas and Electric Corporation; Consolidated Edison Company of New York, Inc.; New York State Electric & Gas Corporation; Niagara Mohawk Power Corporation d/b/a National Grid; Orange and Rockland Utilities, Inc.; and Rochester Gas and Electric Corporation shall file, on not less than 15 days' notice, revised electric System Benefits Charge

Statements to effectuate the next year's collections, as detailed in Appendix B of this Order, to become effective January 1 of each year, for years 2023 through 2032.

7. The New York State Energy Research and Development Authority shall, within 14 days of the effective date of this Order, file an update to its Clean Energy Fund Cash Flow Analysis to reflect the projected expenditures and collections authorized in this Order.

8. The New York State Energy Research and Development Authority shall, within 14 days of the effective date of this Order, file an update to its overall Goals and Metrics Framework, as detailed in Appendix C of the Order Approving Clean Energy Fund Modifications, issued on September 9, 2021, in Case 19-E-0735 et al., to reflect the decisions in the body of this Order.

9. The New York State Energy Research and Development Authority is directed to report the progress against the directives established in this order in its existing quarterly and annual NY-Sun and Clean Energy Fund Reports.

10. The New York State Energy Research and Development Authority and Department of Public Service Staff shall file, for Commission review, their Mid-Point Review and Recommendations within 60 days after the occurrence of the earlier of either (1) the date when 50 percent of either the Upstate or Con Edison capacity allocations have been committed or (2) December 31, 2025, as discussed in the body of this Order.

11. In the Secretary's sole discretion, the deadlines set forth in this Order may be extended. Any request for an extension must be in writing, must include a justification for the extension, and must be filed at least three days prior to the affected deadline.

12. These proceedings are continued.

By the Commission,

(SIGNED) MICHELLE L. PHILLIPS
Secretary

SUMMARY OF COMMENTS

AC Power, LLC (AC Power)

AC Power recommends that projects that have already secured the NY-Sun brownfield adder be eligible for full incentives at the proposed incentive levels, including the base incentive and Community Solar Adder.

AES Clean Energy Development, LLC (AES)

AES requests clarification regarding projects that have already received a $0 NY-Sun award and have applied for (but have not been awarded) the ICSA. AES supports eligibility for opt-out CDG projects to receive the Community Adder.

Alliance for a Green Economy (AGREE) New York and Vote Solar

AGREE and Vote Solar support the direction of the Roadmap but recommend targeting at least 40% of new solar capacity to serve low income and affordable housing residents within disadvantaged communities. NYSERDA should allocate additional funding to support community-owned solar projects to meet the CLCPA goal of 35-40% of investments benefiting disadvantaged communities. AGREE and Vote Solar state that the incentives that serve LMI residents, affordable housing and residents of disadvantaged communities should be improved upon, and recommends setting aside 40% of each base incentive block for SEEF projects as well as expanding eligibility for the multifamily affordable housing incentive to more than just the first 200 kW of a project. Additionally, AGREE and Vote Solar would like to see clarification regarding the majority SEEF funding that can be used to provide guaranteed bill savings to LMI customers. AGREE and Vote Solar state that they support robust investments in project serving the Con Ed territory and recommend increasing the MWs allocated there to 568 MW. AGREE and Vote Solar also support prevailing wage and recommend funding the participation of M/WBE's and workers of color.

American Farmland Trust (AFT)

AFT notes a concern among farmers that solar installations may have negative impacts on their land, such as increased competition for property, higher lease rates, or loss of access to farmland. AFT supports a specific adder for agrivoltaics, and recommends a stakeholder process to work with farmers, land trusts and community members to support farm and agricultural viability.

Ampion, PBC (Ampion)

Ampion generally supports the Roadmap and stating that it should be approved without delay and that the final version includes incentive values that reflect updated cost data given recent inflation. Ampion recommends a comprehensive review of the VDER Value Stack, including all components, be conducted sooner than the Mid-Point Review timeframe suggested in the Roadmap. Ampion also recommends that the NY-Sun program include a robust SEEF and, specifically, a replenished and simplified ICSA. Ampion also expresses support for an opt-out CDG program, on either a stand-alone basis or in conjunction with a commodity offering through a CCA.

Arcadia Power, Inc. (Arcadia)

Arcadia recommends a $0.11/Watt upstate MW block and a $0.13/Watt Community Adder to more-accurately reflect the cost difference between remote crediting and CDG projects, and to ensure that the NY-Sun program does not unintentionally result in a windfall for remote crediting projects. Arcadia notes that CDG provides extensive, unique benefits to New Yorkers, particularly disadvantaged communities. Arcadia also expresses that the Roadmap appropriately prioritizes SEEF funding, although support for disadvantaged communities should be further strengthened. Arcadia states the Community Adder should require that a project subscribe 40% of its offtake to disadvantaged communities, and that the ICSA should be expanded. Regarding CCAs, Arcadia states that they are limited in their ability to enroll disadvantaged communities, and should play a limited role in achieving the Roadmap's vision. In particular, Arcadia recommends that the Commission study the question of an appropriate cap on CCA opt-out CDG capacity (e.g., 5% of allocated capacity in each utility territory), or alternatively, that CCAs should be treated as large customers under the existing rule that 60% of a CDG's output be subscribed to customers with less than 25 kW of demand. Arcadia also recommends that opt-out CDG projects be precluded from the Community Adder or ICSA.

BlueWave and Lightstar Renewables, LLC (BlueWave and Lightstar)

Bluewave and Lightstar support the establishment of a specific adder for agrivoltaics, and the adoption of a clear definition for agrivoltaic systems. Separately, Lightstar concurs with the comments submitted by the Clean Energy Parties. Lightstar also recommends that NYSERDA and Staff avoid decreasing incentive levels as the first block progresses, even if federal incentives are passed. Lightstar also recommends that projects that received base compensation but did not receive the Community Adder should now be eligible for the new

Community Adder, and projects that received a Community Adder but no base incentive should now be eligible for new base compensation.

Solar Energy Industries Association, the Alliance for Clean Energy New York, the Coalition for Community Solar Access, and the New York Solar Energy Industries Association) (Clean Energy Parties)

The Clean Energy Parties recommend that the Commission approve the Roadmap without delay and approve the overall budget and allocation of funds/capacity between upstate and Con Edison, but with cost-neutral adjustments to the specific incentive levels in NYSERDA's Operating Plan. The Clean Energy Parties specifically propose breaking the NYSERDA proposed C&I MW Block into three tranches including (1) a 50 MW tranche for project less than 200 kW in size (2) a 100 MW tranche for projects between 200 kW and 1,000 kW and (3) a 150 MW tranche for projects larger than 1,000 kW. The Clean Energy Parties also propose significantly increasing the Community adder to $0.80/Watt, principally paid for by reducing the base incentives for C&I projects above 200 kW. The residential base incentive should be increased to $0.30/Watt (with the proposed 150 MW tranche should be maintained, and the Residential LMI adder should be increased to $1.20/Watt to offset some of the losses associated with the Customer Benefit Charge (CBC). The Clean Energy Parties recommend creating stackable adders for Canopies, Affordable Housing, CDG, and the ICSA.

The Clean Energy Parties also recommend that the Commission reconvene the Value Stack working group to consider proposals for VDER tariff improvements, including long-term E Value improvements that track the marginal emissions rate over time, and to determine a long-term NY-Sun successor program for distributed solar. The Commission should also expand and improve on the Cost Sharing 2.0 framework and the Distribution System Implementation Planning process, such that distribution planning is more forward looking and holistic and the upgrade costs necessary to achieve the CLCPA goals are not borne solely by DER developers. The Clean Energy Parties offer that the work of the NARUC Comprehensive Electricity Planning Task Force could be instructional in identifying enhancements that can be made, specifically the process outlined in the Roadmap. At a minimum, the Clean Energy Parties recommend that embedding forecast development into utility projections, significantly enhancing stakeholder engagement, creating hosting capacity metrics, and considering alternative technologies should be part of a reformed distribution planning process.

Regarding NY-Sun eligibility, the Clean Energy Parties recommend that projects that received partial incentives be allowed to fully take advantage of the new funding, so as to avoid project attrition. The Clean Energy Parties endorse eligibility for "opt-out" CDG to receive the Community Adder, an expanded ICSA as part of SEEF, and the Roadmap's recommendation to expand SEEF eligibility to new customers. As to prevailing wages, the Clean Energy Parties support the Roadmap recommendation to make it a requirement for projects greater than 1 MW in size, but recommend robust financial support along with delaying implementation of the requirement to the Order's effective date. The Clean Energy Parties recommend that LIPA also take steps to encourage distributed solar, and to start discussions on tariff reforms. The Clean Energy Parties support exploration of a pilot program for dual-use incentives for solar sited on agricultural lands, as well as continued discussions around appropriate agricultural preservation and mitigation requirements and practices going forward. Finally, the Clean Energy Parties recommend a formal review of the program after an initial 1 GW of capacity has been allocated.

Citizens Energy Corporation (CEC)

CEC recommends (1) permitting projects that have already received incentives to remain eligible for new NY-Sun incentives, and (2) providing an additional Environmental Justice Area incentive to encourage the development of projects within disproportionately and negatively impacted inner-city neighborhoods.

City of New York (City)

The City generally supports the Roadmap's recommendations, including but not limited to continuation of (i) existing program structures such as an administrative approach to valuing incentives, (ii) the criteria that must be satisfied for a project to reserve incentives, (iii) the Bill-As-You-Go method for collecting program funds, and (iv) conducting a periodic program review, are reasonable and should be adopted. The City agrees with the Roadmap that projected ratepayer impacts are modest and reasonable when considered against projected ratepayer benefits. The City supports a mid-program review process, but recommends either an accelerated threshold for triggering the review process, or for annual reviews. That notwithstanding the City notes that up-front incentives may not represent a long-term solution, and therefore the Commission should initiate a proceeding to identify a long-term successor program within 90 days after the Order is issued (including, potentially, modifications to Value Stack compensation). The City states that the mid-term review would serve as a reasonable deadline to finalize a proposal for the next phase.

Regarding the upstate and Con Edison allocations, the City recommends increasing the capacity allocated to Con Edison from 450 MW to 568 MW, or 14.2% of the Incremental 4 GW Target, to keep pace with current portion of statewide completed distributed solar. The City states that a 568 MW allocation can readily be achieved by maintaining the Roadmap's proposed $420 million budget for Con Edison, by reallocating and redesigning incentive levels. The City expresses that this change is justified given the advantages of projects sited in Con Edison's service territory, the expected rate of project development there, the Roadmap's emphasis on the importance of geographic equity, and the concentration of disadvantaged communities in Con Edison's service territory. As to the proposed Con Edison incentives, the City recommends segmenting the two-tiered structure as follows: (1) large nonresidential projects (greater than 1 MW), at an initial $0.30/Watt base incentive level; (2) medium nonresidential projects (200kW-1 MW) at an initial $0.75/Watt base incentive level; (iii) small nonresidential projects (less than 200 kW) at a $1.10/Watt base incentive level; (iv) residential projects at $0.30/Watt. The City further recommends allocating 60% of the savings that would result from the modified base incentive proposal (i.e., approximately $70 million) towards increasing the Community Adder to $0.60/Watt for Con Edison CDG projects. The City comments that if the intent is that CDG should account for 70% of new distributed solar as the Roadmap indicates, the Community Adder must be sufficient to make community solar projects more attractive than a remote crediting or behind-the-meter project. The City also recommends increases to the ICSA and various

Affordable Housing and Affordable Solar adders, and to allow for adder stacking. The City also recommends that incentive levels do not decrease unless the Federal government enhances the current ITC above existing levels or the Commission increases the E Value (or makes other, similar improvements to Value Stack components). The City supports exploring a timing and locationally differentiated E Value that considers EJ concerns and could minimize ratepayer impacts for the most energy cost-burdened ratepayers. The City also supports allowing opt-out CDG to receive the Community Adder, but argues that Expanded Solar for All projects should not be eligible, because they have reduced customer acquisition costs and the utility is able to achieve additional profit by administering said programs.

The City requests dedicated blocks of prevailing wage and Community Adder funding for the Con Edison territory. The City expresses that the Roadmap's expanded definition of disadvantaged communities may dilute funding directed specifically to disadvantaged communities under the CLCPA's explicit mandates, thus resulting in a proposal that is inconsistent with the CLCPA's disadvantaged communities' requirement. To that end, the City recommends that the Commission reserve 40% of base incentives for SEEF projects, specify that more than 50% of SEEF funding can be utilized for direct incentives to individual households, and expand eligibility for the MAHI to more than the first 200 kW of a project. The City also supports specific Con Edison carve-outs for the Prevailing Wage Adder and Community Adder, expressing a concern that most of the prevailing wage dollars going to upstate projects. Projects of any size that pay prevailing wages should be allowed to access the Prevailing Wage Adder.

Scenic Hudson, Natural Resources Defense Council, Sierra Club, The Nature Conservancy, New York League of Conservation Voters, New Yorkers for Clean Power, Citizens for Local Power, Association for Energy Affordability, and Hudson River Sloop Clearwater (Clean Energy Advocates)

The Clean Energy Advocates support extension of the NY-Sun program, while noting that the Commission should be planning for the elimination of up-front incentives and the establishment of self-sustaining distributed solar industry. Noting that NY-Sun incentives likely will be allocated quickly, NYSERDA and Staff should begin planning for another round of improvements to the VDER tariff.

The Clean Energy Advocates support the NY-Sun goals of increasing access to solar energy through the SEEF, and urges NYSERDA to coordinate the NY-Sun program and SEEF with existing efforts to address barriers to LMI customer and disadvantaged communities' access to distributed solar resources. To ensure that the benefits of distributed solar are distributed equitably across the state, NYSERDA should consider increasing the 150 MW allocated to Con Edison residential and small projects, and whether adders for rooftop and parking lot projects are sufficient or should be increased. The Commission also should address hosting capacity constraints and upgrade costs to enable achievement of the Incremental 4 GW Target, direct the utilities to engage with municipalities and stakeholders to develop expanded hosting capacity plans, and direct the development of a statewide Clean Energy Mapping tool to help developers locate suitable sites for their projects. The Clean Energy Advocates also support an incentive adder for agrivoltaics. Finally, the Clean Energy Advocates support the Roadmap's approach to applying prevailing wages.

Climate Jobs New York (CJNY)

CJNY generally supports the Roadmap, in particular the proposed prevailing wage standard.

Community Choice Aggregation Administrators of New York (CCAANY)

CCAANY proposes that projects participating in opt-out CDG be eligible for the full Community Adder and ICSA. CCAANY states that a single incentive structure for all community solar projects lowers the risk for participation in opt-out CDG and incentivizes new opt-out CDG market participants. Conversely, the opt-out CDG market is still in a nascent state, and lowering incentives for opt-out CDG will not facilitate competition in this market. CCAANY also argues that opt-out CDG projects should have access to the ICSA, given that opt-out CDG has developed methodologies to serve entire LMI and environmental justice populations, rather than smaller numbers of individual households.

Delaware River Solar (DRS)

DRS argues that any CDG project that received a tranche confirmation by paying the interconnection deposit and are also eligible to receive the Market Transition Credit or Community Credit but did not receive a NYSERDA base incentive should be eligible for new NY-SUN MW Block incentives. DRS also recommends that the Community Adder be applicable at some level to CDG projects that choose opt-out CDG to source its customers.

Distributed Sun, LLC (DSUN)

DSUN supports the prevailing wage requirement but recommends that it not apply to projects with an interconnection filing date prior to the filing of the Roadmap.

Ecogy Energy (Ecogy)

Ecogy generally supports the CEP's comments. Ecogy also recommends reevaluating the disproportionate deployment of solar energy between the Con Edison and upstate regions, expanding the ICSA and Community Adder, and addressing issues with net crediting. Ecogy further recommends further bifurcation of available incentives by project size. Ecogy notes other barriers to project development, including building codes, permitting processes, high rates, Value Stack compensation issues, inflationary pressures, and supply chain constraints.

Ecovis Group Inc. (Ecovis)

Ecovis states that the prevailing wage requirement creates inequities for apprenticeship programs. Ecovis also notes an inconsistency in how prevailing wages are applied , which could lead to confusion and administrative complexity for developers.

Fairstead Solar (Fairstead)

Fairstead requests that the Commission reinstate a Community Credit for on-site affordable housing solar projects, or allow for the stacking of incentives for remote credited projects.

Good Energy, L.P. (Good Energy)

Good Energy asserts that opt-out CDG projects should be eligible for the full Community Adder and suggests that the ICSA be made available to opt-out CDG projects for municipalities that demonstrate sufficient LMI and disadvantaged characteristics.

GreenSpark Solar

GreenSpark Solar generally supports CEP's comments. GreenSpark Solar also emphasizes the need to immediately begin working on the next phase of programmatic support for solar, based on how quickly funds will be expended as part the NY-Sun program. GreenSpark Solar states that the Value Stack does not accurately represent the value that distributed solar provides to the grid, and urges to improvements to elements of the Value Stack, particularly the E Value. GreenSpark Solar also recommends uniform interconnection standards for all utilities, and advocates for continued support for the Non-Residential (less than 750 kW) storage program.

Joint Utilities

The Joint Utilities support the recommendations in the Roadmap, and express an intent to propose pilots focused on improving the procurement process and commercial framework for distributed solar resources that provide benefits to low income customers participating in utility Energy Affordability Programs. The Joint Utilities also urge the Commission to improve the Mid-Point Review by considering alternative funding mechanisms, the necessary incentive levels, and other potential incentives to leverage program costs such as tax credits or federal funding.

Kendall Sustainable Infrastructure, LLC (KSI)

KSI proposes that all projects without MW Block allocations should be eligible for the new upfront MW Block incentives, new Community Credit Incentives, and any new enhancements to the Value Stack. Similarly, if a project has been awarded a landfill or brownfield incentive but no MW block allocation, it should still be eligible for any new MW Block Incentives and any other new enhancements to the Value Stack. Such projects should be eligible to obtain awards even if they have started construction, as long as they have not been placed in service. Beyond the MW Block Program, KSI recommends increasing the E Value, as well as re-instating some level of ongoing community solar component to the VDER Value Stack. For low- and moderate-income community solar, KSI proposes prohibiting subscriptions from being associated with credit checks or home ownership requirements. The Commission should also support distributed solar projects paired with storage, through new incentives, and changes to the interconnection process to allow for storage to be studied and installed at a later date. Lastly, KSI proposes that projects be permitted to elect whether or not to pay prevailing wages and, if prevailing wages are selected, to be eligible for an incentive to cover the additional expense.

Kinetic Communities Consulting (KC^3)

KC^3 agrees with WE ACT's recommendations regarding support for low income and affordable housing residents within disadvantaged communities and minority and women-owned business enterprises (MWBEs). KC^3 also recommends requiring annual program reviews, carving out 400 MW specifically for LMI community-owned solar projects in disadvantaged communities, incentivizing the use of community benefit agreements to transfer ownership to communities, cooperatives, land trusts, or other socially just entities, and allowing adder stacking. KC^3 further recommends that the total capacity allocated to Con Edison should be increased from 450 MW to 568 MW, and changing base incentive and adder rates to increase equitable outcomes.

Long Island Power Authority (LIPA) and PSEG Long Island (PSEG)

LIPA/PSEG states that its expected contribution to the Incremental 4 GW Target is greater than LIPA's pro rata share of the state's electric load, though it has no objection to accepting an above-proportional share. LIPA/PSEG reiterate the need for the Commission to resolve the question of how to compensate load serving entities that interconnect an above-proportional share of the State's net metered solar. LIPA/PSEG support allocating 40% of the Incremental 4 GW Target to LMI residents, regulated affordable housing, disadvantaged environmental justice communities. LIPA notes that it is developing a Community Solar Feed-In-Tariff program that would enroll LMI customers in community solar procured through a competitive bid process.

Metro Industrial Areas Foundation (Metro IAF)

Metro IAF supports the Roadmap, but urges the Commission to modify it so that the NY-Sun program can offer fully or substantially subsidized on-site solar installations to building owners in disadvantaged communities who have replaced their fossil-fuel heating systems with heat pumps.

Multiple Intervenors (MI)

MI recognizes that the CLCPA mandates achievement of aggressive clean energy goals, and generally supports cost-effective efforts to decarbonize the State's electric system. However, the Commission carefully must evaluate whether the Roadmap constitutes the most cost-effective means of achieving the CLCPA mandates. MI states that the Roadmap does not adequately justify either the substantial increase in the CEF budget or the inclusion of certain categories of costs, such as for prevailing wages. MI also remarks that the cost impacts associated with the Roadmap should be evaluated in conjunction with the numerous other financial obligations imposed on customers, and that the Commission should consider, among other things, rapidly increasing wholesale electricity and natural gas prices, and the challenging economic conditions caused by the COVID-19 pandemic. The Commission should also analyze the Roadmap in the context of all other programs and initiatives that customers are already required to fund.

New York Construction Materials Association, Inc. (NY Materials)

NY Materials recommends that the Commission consider providing incentives for solar resources located at "grayfield" properties where land is developed or slated to be developed for mineral extraction.

New York Energy Democracy Alliance (EDA)

EDA agrees with WE ACT's positions and recommendations. EDA also asserts that the 10% bill discount for LMI households is too low and that the interpretation of the CLCPA's allocation of benefits ignores job creation and health benefits that correlate to the development of the clean energy economy. EDA requests that additional money be allocated to the SEEF and ICSA. EDA recommends carveouts for community-owned solar and MWBE projects. EDA also recommends exempting LMI households from the CBC charge. EDA supports increased upfront incentives, but also recommends increasing the E Value or establishing a floor net metering value.

New York Power Authority (NYPA)

NYPA supports continued financial support for distributed solar projects, but recommends that the Commission immediately begin consideration of tariff-based compensation mechanisms, including the E Value, that will provide greater long-term economic certainty for project owners and developers. NYPA also recommends further processes and stakeholder engagement to evaluate how compensation mechanisms for distributed solar resources can be modified to account for the unique development timelines inherent to public sector customer projects.

New York State Trade Unions

Hudson Valley Building and Construction Trades Council, International Association of Heat & Frost Insulators & Allied Workers, IUEC Local 62 Syracuse, Laborers' Local 79, Labor International Union Of North American, Local no. 17, New York State Building and Construction Trades Council, New York State Elevator Constructors, New York State Laborers Employment Cooperation and Education Trust, North Atlantic States Regional Council of Carpenters, NYS Conference of Operating Engineers, Plattsburgh/ Saranac Lake Building and Construction Trades Council, and the United Union of Roofers, Waterproofers and Allied Trades all express support for prevailing wages.

Norbut Solar Farm

Norbut Solar Farm states that projects that paid their 25% interconnection payments between March 12 and April 12, 2021, and are locked into a $27.41/MWh E Value, should retroactively be eligible to receive the $31.03/MWh E Value proposed by the Roadmap, or be eligible for another type of compensation.

Pace University (Pace)

Pace requests that Community Credit be reinstated for projects in the Con Edison service territory that: (1) are sited on property owned by institutions, like higher education and hospitals, and (2) paid their 25% interconnection payments prior to December 31, 2021.

PowerFlex, LLC (PowerFlex)

PowerFlex recommends a three-tiered incentive structure for incentives, as follows: (1) small C&I solar (less than 500 kW), (2) medium C&I solar (between 500 kW and 1500 kW) and (3) large C&I solar (1,500 kW to 7000 kW). Additionally, PowerFlex recommends adjusting initial MW Block sizes to 50 MW, and increasing the incentive rate for medium and large projects. PowerFlex also recommends increasing the rates for both the Community Adder and the Parking Canopy Adder.

Power Global

Power Global requests clarification on the cost sharing and the grid upgrade processes.

ReneSola Power (ReneSola)

ReneSola supports the Roadmap’s overall budget and allocation of program funds/capacity, and recommends that NYSERDA be authorized to finalize details of the blocks/incentive levels as part of its Operating Plan after taking stakeholder feedback into consideration. ReneSola also recommends increasing the initial block sizes to align with the approximately 1,100 MW of pending projects in the queue. ReneSola recommends that the program be reviewed earlier than the proposed Mid-Point Review, and that such review should include the potential for changes to the Value Stack. ReneSola also recommends that projects previously approved for base incentive should be eligible for new adders, and vice versa.

REVitalize (PUSH Buffalo, UPROSE, the POINT, CDC, and New York City Environmental Justice Alliance)

REVitalize generally supports the proposed Con Edison carve-out, but recommends a total capacity of at least 1 GW, and a higher per-watt incentive for both smaller and larger projects. REVitalize also recommends increasing the E Value for projects located in disadvantaged communities, in order to capture the health, social, environmental, and climate impacts associated with replacing fossil fuel generators in those areas. REVitalize requests clarity on the incentives and funding allocations associated with the SEEF to ensure that all LMI households, disadvantaged and environmental justice communities receive 40% of the benefits of distributed solar investments. REVitalize further recommends modifying existing eligibility for incentive programs like the ICSA so that disadvantaged communities and low-income communities are automatically geo-qualified, and increasing the Community Adder for projects that are partially owned by or co-developed with community-based organizations.

REVitalize suggests reducing to 250 kW the threshold for when projects are required to pay prevailing wages. REVitalize also proposes a suite of labor, training, and job quality standards that should apply to public work projects, projects in receive of more than $100,000 in total financial assistance, projects with a value of more than $10 million, and privately-financed projects on public property. REVitalize expresses support for the Cost Sharing 2.0 framework, and proposes various improvements to the interconnection process. REVitalize also requests that NYSERDA work directly with, and be accountable to, environmental justice communities through its Co-Design process. Lastly, more support is needed for solar investments paired with storage.

CEC Stuyvesant Cove, Inc. dba Solar One (Solar One)

Solar One strongly supports the Roadmap, with several recommendations: (1) various changes to the Con Edison incentives, including a higher Community Adder, a three-tiered base incentive structure, and higher, stackable adders; (2) evaluation of NY-Sun's compliance with the CLCPA during the Mid-Point Review; (3) approval of the new prevailing wage requirements, provided that sufficient funding is available to offset the labor cost increases and administrative requirements; and (4) development of a long-term plan to shift the solar industry away from capacity-based incentives and towards performance-based incentives.

Sunrise Solar Solutions and Sunrise Community Solar (Sunrise Solar)

Sunrise Solar expresses concern that the Roadmap undermines the Value Stack, and fails to properly value the benefits of clean energy. Sunrise Solar advocates for a true per-kWh community solar credit, and recommends 180 MW of such a credit in the Con Edison territory at $0.12/kWh. Sunrise Solar also suggests greater incentives for solar located on carports, higher incentives for residential solar, and support for solar paired with storage.

Solitude Solar, LLC d.b.a US Light Energy (USLE)

USLE supports the Roadmap, and recommends the following: (1) an accelerated Mid-Point Review timeline; (2) stakeholder working groups to consider Value Stack reforms; (3) revenue-based instead of capacity-based compensation; (4) careful monitoring of the impact of the prevailing wage requirements; (5) expedited interconnection reforms; (6) expansion of the Office of Renewable Energy Siting to include projects 1 MW and above; and (7) Real Property Tax Law reforms.

WE ACT for Environmental Justice (WE ACT)

WE ACT stresses the need for the incremental NY-Sun program investment to meet the CLCPA's requirements for disadvantaged communities. WE ACT also supports: (1) using block incentives as a short-term solution; (2) targeting at least 40% of new solar capacity to serve low income and affordable housing within disadvantaged communities; (3) specific investments in the Con Edison service territory, but increasing the Con Edison capacity allocation to 568 MW; (4) the prevailing wage requirement, albeit at a lower threshold of 500 kW as opposed to 1 MW; and (5) an annual program review process. WE ACT further recommends additional program improvements to support LMI community-owned projects, and MWBE participation in community solar (including through the creation of a Minority-Business Enterprise Adder and a Women-Business Enterprise Adder). WE ACT proposes that all adders be stackable, and that low-income households and low-income community-owned projects be exempt from the CBC charge. WE ACT further recommends increasing the capacity allocation for Con Edison to 568 MW, restructuring the Con Edison base incentives and adders as proposed by the City of New York, and having specific Con Edison carve-outs for the Community Adder and the Prevailing Wage Adder. Finally, WE ACT proposes that NYSERDA develop a $100 million fund to assist members of disadvantaged communities with owning their own solar projects.

Other Commenters

Various individuals submitted comments on the NY-Sun, making recommendations on a variety of topics, including: (1) the need for adders for canopy (especially over parking lots), commercial rooftop, and agrivoltaic projects; (2) consideration of incentives that last over time as opposed to upfront incentives; (3) the need for a goal more ambitious than 10 GW of solar by 2030; (4) greater support for DERs paired with storage; (5) the need for more in-depth review of prevailing wages; (6) the need for a new Community Credit; (6) more benefits to environmental justice communities; and (7) billing and crediting issues. One individual commenter expressed opposition to the Roadmap, stating that the State should focus on nuclear power.

INCREMENTAL COLLECTIONS BY UTILITY

	Central Hudson	**Con Edison**	**NYSEG**	**Niagara Mohawk**	**O&R**	**RG&E**	**Total**
2023	$2,825,070	$25,947,265	$9,331,664	$17,357,608	$2,377,682	$4,162,142	$62,001,430
2024	$10,052,302	$92,326,834	$33,204,387	$61,762,694	$8,460,384	$14,809,939	$220,616,541
2025	$8,328,966	$76,498,605	$27,511,929	$51,174,288	$7,009,962	$12,270,968	$182,794,718
2026	$9,059,605	$83,209,262	$29,925,347	$55,663,429	$7,624,894	$13,347,410	$198,829,947
2027	$8,804,668	$80,867,752	$29,083,247	$54,097,060	$7,410,329	$12,971,813	$193,234,869
2028	$8,783,366	$80,672,106	$29,012,885	$53,966,181	$7,392,401	$12,940,430	$192,767,369
2029	$8,708,553	$79,984,972	$28,765,764	$53,506,518	$7,329,435	$12,830,209	$191,125,451
2030	$8,217,279	$75,472,793	$27,143,006	$50,488,063	$6,915,961	$12,106,420	$180,343,523
2031	$1,564,724	$14,371,438	$5,168,538	$9,613,876	$1,316,929	$2,305,290	$34,340,796
2032	$812,943	$7,466,590	$2,685,281	$4,994,828	$684,202	$1,197,699	$17,841,543
TOTAL	$67,157,476	$616,817,618	$221,832,048	$412,624,545	$56,522,178	$98,942,321	$1,473,896,187