NYSERDA’s Promise to New Yorkers:
NYSERDA provides resources, expertise, and objective information so New Yorkers can make confident, informed energy decisions.

Mission Statement:
Advance innovative energy solutions in ways that improve New York’s economy and environment.

Vision Statement:
Serve as a catalyst – advancing energy innovation, technology, and investment; transforming New York’s economy; and empowering people to choose clean and efficient energy as part of their everyday lives.
# NYSERDA Record of Revision

<table>
<thead>
<tr>
<th>Revision Date</th>
<th>Description of Changes</th>
<th>Revision on Page(s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>11/14/2018</td>
<td>Original Issue</td>
<td>Original Issue</td>
</tr>
</tbody>
</table>
NY-Sun Initiative
Quarterly Performance Report to the
Public Service Commission
Quarter Ending September 30, 2018

Final Report

Prepared by:
New York State Energy Research and Development Authority
Albany, NY
Table of Contents

NYSERDA Record of Revision ........................................................................................................ i
List of Tables ................................................................................................................................ iii

1 Overview of NY-Sun ................................................................................................................... 1
   1.1 Introduction ......................................................................................................................... 1
   1.2 High-Level Accomplishments during This Quarter ............................................................. 1

2 Progress and Results ................................................................................................................. 3

List of Tables

Table 1. Capacity toward 3GW Goal .......................................................................................... 3
Table 2. Production Associated with 3GW Goal ......................................................................... 4
Table 3. Budget and Financial Status for NY-Sun Programs ..................................................... 5
1 Overview of NY-Sun

1.1 Introduction

NY-Sun is a $1 billion initiative to expand solar capacity throughout New York State by utilizing public funds in a strategic manner to build a self-sustaining solar market. NY-Sun provides financial support to qualified solar installation contractors and presents a comprehensive approach to reducing solar market costs and barriers. NY-Sun’s goal, referred to as the 3 Gigawatts Goal, is to install three gigawatts (GW) of solar electric capacity by 2023, while building a self-sustaining solar industry.

Through September 30, 2018, 722 megawatts (MW) of solar have been installed statewide with New York State Energy Research and Development Authority (NYSERDA) NY-Sun funding (Table 1), with an additional 883 MW in the pipeline (Table 2). The NYSERDA NY-Sun funded solar capacity installed statewide as of September 30, 2018 generates approximately 847,030 megawatt-hours (MWh) of electricity each year, reducing annual carbon dioxide equivalent (CO$_2$e) emissions by 445,805 metric tons (MT). The budget and financial status associated with NY-Sun programs is presented in Table 3.

Expanding the view to include all of NYSERDA’s funding support for distributed solar, 1,229 megawatts (MW) have been installed statewide, and an additional 926 MW are in the pipeline as of September 30, 2018. These collective distributed solar installations, which span multiple NYSERDA funding sources and programs, generate approximately 1,424,584 MWh of electricity each year, reducing annual CO$_2$e emissions by 749,781 MT.

1.2 High-Level Accomplishments during This Quarter

- There were more NYSERDA-supported projects completed in Q3 2018 than any previous quarter, with over 105 MW brought online. This represents a 126% increase over Q3 in 2017.
- Uptake for the Affordable Solar Residential Onsite program during Q3 2018, which provides additional incentives for on-site residential projects for low- to moderate-income homeowners, 1

---

1 The Clean Energy Fund Investment Plan Budget Accounting and Benefits Chapter was submitted on February 22, 2016, in which NYSERDA adopted the NYS Public Service Commission’s recommendation in its January 21, 2016 Order Establishing the Benefit Cost Analysis Framework. NYSERDA fulfilled the recommendation that New York State’s greenhouse gas (GHG) emissions factor methodology shift from an average grid emission profile to a marginal grid emission profile. Due to this shift, New York State’s factor to calculate GHG emissions reductions has changed from 625 pounds CO$_2$e/MWh to 1,160 pounds CO$_2$e/MWh. The emissions reductions calculated for this quarterly report reflect the new factor of 1,160 pounds CO$_2$e/MWh.

2 This number is exclusive of projects funded through NYSERDA’s Large Scale Renewables program, which are not distributed energy resources.
was comparable to Q2 2018. Through Q3 2018, 382 installations were completed with 57 more in the pipeline. More than 70 NY-Sun contractors have submitted Affordable Solar projects to date.

- The Affordable Solar Predevelopment and Technical Assistance program, which provides funding to support the development of community solar projects serving low- to moderate-income households as well as solar serving multifamily affordable housing properties, approved twelve project applications through Q3 2018, with ten predevelopment projects under contract.

- In Q3, the fourth round of solarize campaigns continued. Campaigns are located in Long Island, the Capital District, Western NY, Mid-Hudson Valley, and the Southern Tier region. Out of the 12 awarded campaigns, six are focused on community solar, with the remaining on rooftop residential. These campaigns will run throughout the calendar year and close at the end of Q4.

- Although the NY-Sun incentives have been distributed to Long Island, Green Jobs - Green New York financing is still available for Long Island residents. As of the third quarter of 2018, 1,040 financing-only Long Island projects have been completed and 176 additional Long Island financing-only project applications have been received or approved.

- Through the Clean Energy Siting and Soft Cost Reduction initiative, which seeks to reduce soft cost barriers inhibiting the deployment of clean energy technologies, NYSERDA has been working with local government officials to help implement sections of the Clean Energy Guidebook.

- Program development for Solar for All, which will expand access to community solar for approximately 10,000 low-income households, continued in Q3 2018. The first round of the Solar for All Request for Proposals (RFP) was released on May 24, 2018, which was followed by the launch of the Solar for All website and the community solar participant sign-up portal in Q3 2018. The Solar for All projects awarded under the first round of RFPs will be contracted by NYSERDA in Q4 2018.

- Following the launch of the NY Energy Storage Roadmap in June, NYSERDA designed a new PV+Storage incentive program, which launched on October 25, 2018.

- NYSERDA announced a new Quality Assurance designation for NY-Sun, which will recognize builders who consistently meet high standards of quality in the NY-Sun Residential & Nonresidential program. Recognized builders will be able to use the designation in marketing materials as proof of the quality projects in our program. This new designation will go into effect in early 2019.

- To help educate consumers about community solar, NY-Sun debuted an informational community solar animation, which will reduce soft costs for solar developers.

- NY-Sun released its first quarterly email newsletter to participating contractors and builders. This newsletter contained program and industry news and highlights.
## 2 Progress and Results

### Table 1. Capacity toward 3GW Goal

Through September 30, 2018 (MW)$^{3,4}$

<table>
<thead>
<tr>
<th>Program</th>
<th>Projects Completed (Installed Units) with Adjustments through 6/30/18</th>
<th>Projects Completed (Installed Units) 7/01/18 - 9/30/18</th>
<th>Projects Completed (Installed Units) through 9/30/18</th>
<th>Applications Approved but Not Yet Contracted (Current Pipeline)</th>
<th>Projects Contracted but Not Yet Completed (Current Pipeline)</th>
<th>Total (Current Pipeline + Installed Units) through 9/30/18</th>
</tr>
</thead>
<tbody>
<tr>
<td>Residential / Small Commercial</td>
<td>424.30</td>
<td>23.95</td>
<td>448.27</td>
<td>3.95</td>
<td>53.58</td>
<td>505.51</td>
</tr>
<tr>
<td>Commercial / Industrial</td>
<td>102.27</td>
<td>70.91</td>
<td>173.19</td>
<td>2.63</td>
<td>304.03</td>
<td>900.05</td>
</tr>
<tr>
<td>Competitive PV</td>
<td>97.63</td>
<td>2.51</td>
<td>100.14</td>
<td>0.00</td>
<td>10.03</td>
<td>119.17</td>
</tr>
<tr>
<td>Grand Total</td>
<td>624.20</td>
<td>97.38</td>
<td>721.59</td>
<td>6.78</td>
<td>876.68</td>
<td>1,605.03</td>
</tr>
</tbody>
</table>

---

$^{3}$ 1,000 MW equals one GW.
$^{4}$ Changes in numbers for previously reported completed projects are due to lagged data and/or QA/QC.
Table 2. Production Associated with 3GW Goal

Through September 30, 2018 (MWh)\(^5\), \(^6\), \(^7\)

<table>
<thead>
<tr>
<th>Program</th>
<th>Projects Completed (Installed Units) with Adjustments through 6/30/16</th>
<th>Projects Completed (Installed Units) 7/1/16 - 9/30/16</th>
<th>Projects Completed but Not Yet Contracted (Current Pipeline) through 9/30/16</th>
<th>Applications Approved but Not Yet Contracted (Current Pipeline)</th>
<th>Projects Contracted but Not Yet Completed (Current Pipeline)</th>
<th>Total (Current Pipeline + Installed Units) through 9/30/16</th>
</tr>
</thead>
<tbody>
<tr>
<td>Residential / Small Commercial</td>
<td>498,064</td>
<td>28,127</td>
<td>528,192</td>
<td>4,633</td>
<td>62,910</td>
<td>593,735</td>
</tr>
<tr>
<td>Commercial / Industrial</td>
<td>120,054</td>
<td>83,241</td>
<td>203,296</td>
<td>3,520</td>
<td>943,808</td>
<td>1,150,423</td>
</tr>
<tr>
<td>Competitive PV</td>
<td>114,598</td>
<td>2,945</td>
<td>117,543</td>
<td>0</td>
<td>22,343</td>
<td>139,888</td>
</tr>
<tr>
<td>Grand Total</td>
<td>722,716</td>
<td>114,314</td>
<td>647,030</td>
<td>7,553</td>
<td>1,020,061</td>
<td>1,664,044</td>
</tr>
</tbody>
</table>

---

\(^5\) Changes in numbers for previously reported completed projects are due to lagged data and/or QA/QC.

\(^6\) Note that the megawatt-hours included in Table 2 are estimated amounts based on a statewide capacity factor. NYSERDA does not, by filing this report, make any claim to the environmental attributes associated with those megawatt-hours.

\(^7\) The NY-Sun program does not determine the delivery or use of solar energy (MWh) from projects that receive funding. Generation from NY-Sun-funded projects may be used by customers for their own voluntary use or used toward meeting State requirements to deliver renewable energy to electricity customers in New York State, depending on ownership of the environmental attributes and/or renewable energy certificates (RECs) from those projects. Where NYSERDA has not acquired the RECs from a NY-Sun-funded project, NYSERDA makes no claim to the environmental attributes of that energy.
Table 3. Budget and Financial Status for NY-Sun Program
As of September 30, 2018 (in dollars)\(^8\)

<table>
<thead>
<tr>
<th>Program</th>
<th>Pre-encumbrances</th>
<th>Open Encumbrances</th>
<th>Expended Funds</th>
<th>Grand Total</th>
<th>Budgeted Funds 2014-2023</th>
</tr>
</thead>
<tbody>
<tr>
<td>Residential/Small Commercial</td>
<td>$1,051,285</td>
<td>$18,986,328</td>
<td>$241,724,845</td>
<td>$261,762,458</td>
<td>$533,522,000</td>
</tr>
<tr>
<td>Commercial/Industrial</td>
<td>$1,533,397</td>
<td>$270,890,347</td>
<td>$20,406,617</td>
<td>$292,830,361</td>
<td>$479,713,718</td>
</tr>
<tr>
<td>Competitive PV</td>
<td>-</td>
<td>$36,089,521</td>
<td>$17,718,761</td>
<td>$53,808,282</td>
<td>$53,808,282</td>
</tr>
<tr>
<td>Program Implementation</td>
<td>$410,285</td>
<td>$2,771,206</td>
<td>$5,050,764</td>
<td>$8,232,255</td>
<td>$32,600,000</td>
</tr>
<tr>
<td>Low- to Moderate-Income</td>
<td>$213,025</td>
<td>$1,221,092</td>
<td>$1,096,981</td>
<td>$2,531,098</td>
<td>$13,000,000</td>
</tr>
<tr>
<td>Consumer Education</td>
<td>-</td>
<td>$2,998,221</td>
<td>$501,779</td>
<td>$3,500,000</td>
<td>$3,500,000</td>
</tr>
<tr>
<td>Administration</td>
<td>$25,000</td>
<td>$879,263</td>
<td>$8,750,030</td>
<td>$9,654,293</td>
<td>$38,706,000</td>
</tr>
<tr>
<td>Evaluation</td>
<td>-</td>
<td>$2,858</td>
<td>$147,142</td>
<td>$150,000</td>
<td>$2,500,000</td>
</tr>
<tr>
<td>NYS Cost Recovery Fee</td>
<td>-</td>
<td>-</td>
<td>$1,911,354</td>
<td>$1,911,354</td>
<td>$19,250,000</td>
</tr>
<tr>
<td>Total</td>
<td>$3,232,992</td>
<td>$333,838,836</td>
<td>$297,308,273</td>
<td>$634,380,101</td>
<td>$1,176,600,000</td>
</tr>
</tbody>
</table>

---

\(^8\) Administration, Evaluation, and NYS Cost Recovery Fee are for NY-Sun funds only.
NYSERDA, a public benefit corporation, offers objective information and analysis, innovative programs, technical expertise, and support to help New Yorkers increase energy efficiency, save money, use renewable energy, and reduce reliance on fossil fuels. NYSERDA professionals work to protect the environment and create clean-energy jobs. NYSERDA has been developing partnerships to advance innovative energy solutions in New York State since 1975.

To learn more about NYSERDA’s programs and funding opportunities, visit nyserda.ny.gov or follow us on Twitter, Facebook, YouTube, or Instagram.