



NY Green Bank
A Division of NYSERDA

NY Green Bank

Metrics, Reporting & Evaluation
Quarterly Report No. 25
(Through September 30, 2020)

Case 13-M-0412

11/14/2020

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Schedule

Transaction Profiles:

- Eden, 2nd Upsize– Bridge Loan – (Community Distributed Generation – Solar)
- Generate Capital, Upsize – Term Loan – (Multiple End-Users – Multiple Technologies)
- Oya Solar – Interconnection to Construction – (Community Distributed Generation - Solar)
- Saranac – Preferred Bridge – (Commercial and Industrial – Energy Efficiency)
- Sunrun Mars – Term Loan – (Residential - Solar)
- Paycheck Protection Program Loans – (Multiple End-Users – Other)

1 Highlights¹

During the quarter ended September 30, 2020, NY Green Bank (“**NYGB**”) committed \$87.8 million across eight new investments.² Since its inception NYGB has committed more than \$1.1 billion to clean energy and sustainable infrastructure projects in New York State (“**NYS**” or the “**State**”).³ During the quarter NYGB generated \$6.4 million in revenues, bringing its cumulative total since inception to \$100.2 million. NYGB’s investments continue to mobilize capital in NYS; at quarter end its portfolio was expected to support up to \$3.0 billion in project costs for clean energy and sustainable infrastructure projects.

1.1 Performance at a Glance as of September 30, 2020⁴



Figure 1 Progress Toward Fiscal Year 2020-2021 Investment Target (\$225.0 MM)

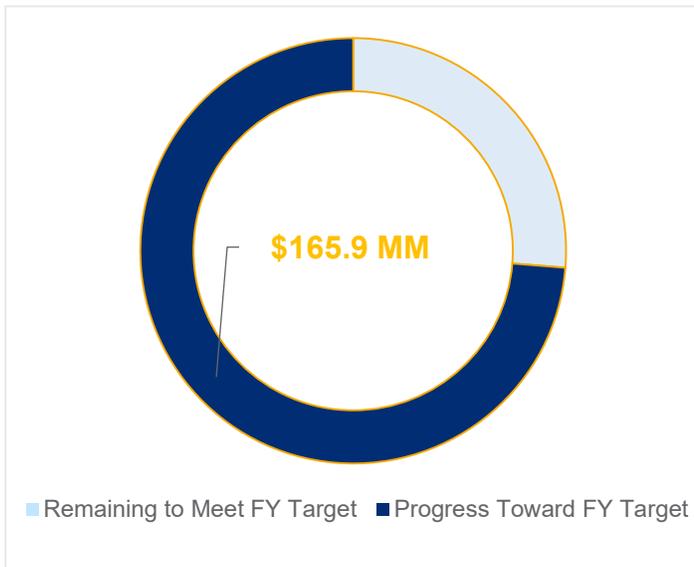


Figure 2 Overall Investments to Date



¹ This Quarterly Report (“**Report**”) is filed by NYGB with the NYS Public Service Commission (the “**Commission**” or the “**PSC**”) pursuant to the Metrics, Reporting & Evaluation Plan developed in consultation with the Department of Public Service (“**DPS**”) and filed with the Commission (the “**Metrics Plan**”).

² The period April 1, 2020 to March 31, 2021 is referred to as the Plan Year of Fiscal Year (“**FY**”) throughout this Report.

³ See: <https://greenbank.ny.gov/-/media/greenbanknew/files/2020-Business-Plan-NYGB.PDF?la=en>

⁴ NYGB’s investments to date drive estimated gross lifetime greenhouse gas (“**GHG**”) emissions reductions equivalent to removing between 137,289 to 208,627 cars from the road for a period of 24 years.

2 Business Update

NYGB's investment activities fall into two broad categories, relating to:

- (a) Transactions that have closed, which collectively comprise NYGB's Investment Portfolio, discussed in [Section 2.1](#); and
- (b) Transactions that are in process but not yet closed, which collectively comprise NYGB's Active Pipeline, discussed in [Section 2.2](#).

2.1 Investment Portfolio Activity

NYGB's current portfolio was more than \$694.8 million at quarter end, registering for the fourth consecutive quarter the highest end-of-quarter total since the inception of the fund. NYGB continued to provide flexible capital to active project developers, owners, service providers and manufacturers of NYS projects.

Table 1 summarizes investment activity made during the quarter ended September 30, 2020. Full Transaction Profiles for the investments described in this [Section 2.1](#) are also included in the [Schedule – Transaction Profiles](#) to this Report. Additionally, NYGB's Transaction Profiles are publicly available at www.greenbank.ny.gov/Investments/Portfolio.

Table 1 New Investments

New Transactions	Description	NYGB Commitment	Closing Date
Saranac Waterfront Lodges	NYGB committed \$5.0 million in September 2019 to finance the construction and operation of an energy efficient lodging property seeking LEED® certification at completion. When the Project's construction and operational delays resulted in a short-term \$2.0 million liquidity requirement, NYGB increased its funding commitment in July 2020 with \$2.0 million of additional preferred equity units to finance incremental construction costs and support the opening and extended ramp-up of the property.	\$2.0 million	July 17, 2020
Generate Capital Upsize	In November 2019, NYGB provided a senior secured \$35.0 million term loan facility to Generate PPL SPV I, which is owned by Generate Lending, LLC a limited liability company that is owned by Generate Capital, Inc. In July 2020, NYGB increased the facility by an additional \$29.8 million and extended the maturity date to July 2023. Loan proceeds refinanced a portion of a senior secured term loan between Generate Capital and Plug Power, Inc. This transaction is expected to result in increased Sponsor investment in NYS clean energy projects that amount to at least \$60.0 million.	\$29.8 million	July 17, 2020
Sunrun Mars	NYGB has entered into five transactions to accelerate the deployment of more than 20,000 solar projects at homes across NYS developed by Sunrun Inc. Sunrun is a national solar provider that markets and develops residential solar energy systems. In August 2020, NYGB closed a \$19.0 million commitment to participate in an aggregation-to-term loan facility. The transaction was part of a \$265.0 million financing (the " SVB/Investec Credit Facilities ") arranged by SVB and Investec.	\$19.0 million	August 14 th , 2020
PPP Loan 1	NYGB entered into three loans to eligible borrowers in the State's clean energy industry as an approved lender to the Small Business Administration's (" SBA ") Paycheck Protection Program (" PPP ").	\$9,605.9	August 17, 2020
PPP Loan 2		\$1,724.0	August 17, 2020
PPP Loan 3		\$14,613.2	August 24, 2020

Eden 2nd Upsize	In November 2019, NYGB provided a 24-month senior secured \$2.5 million bridge loan facility to Eden Devco Borrower LLC, which is owned by Eden Devco LP, a limited partnership that is managed by Eden Renewables LLC. In March 2020, NYGB increased the Bridge Loan size to \$4.3 million. In August 2020, NYGB further increased the bridge loan size to \$6.3 million. Loan proceeds will finance project interconnection deposits to National Grid for community distributed generation solar projects.	\$2.0 million	August 28, 2020
Oya Solar	In September 2020, NYGB committed \$35.0 MM to a construction and interconnection facility to finance the development of 5 community distributed generation solar projects in NYS. These transactions are expected to provide NYS residents and businesses a greater variety of energy choices and, ultimately, lower-cost clean energy opportunities.	\$35.0 million	September 4, 2020
Total		\$87.8 million⁵	

2.2 Pipeline Activity

Each proposed NYGB investment is categorized by the stage it has reached in NYGB's internal credit underwriting and transaction execution processes. Figure 3 Cumulative Pipeline Activity summarizes NYGB's overall transaction status and Active Pipeline from inception through September 30, 2020.⁶ At quarter end NYGB was managing an Active Pipeline of \$789.9 million.

Figure 3 Cumulative Pipeline Activity

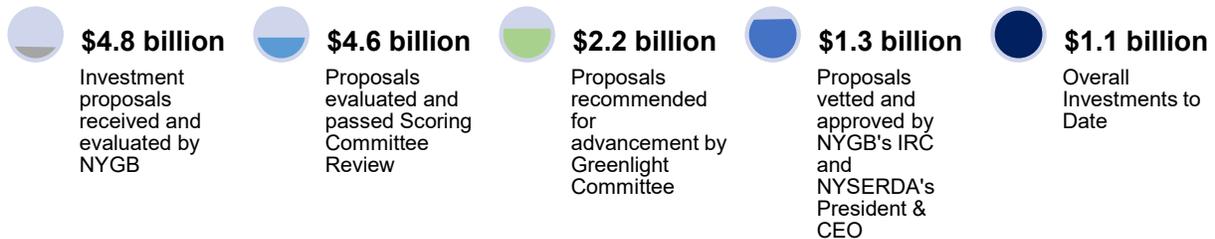


Figure 4 Distribution of Active Pipeline by Investment Stage



Figure 5 End-Use Segment of Active Pipeline

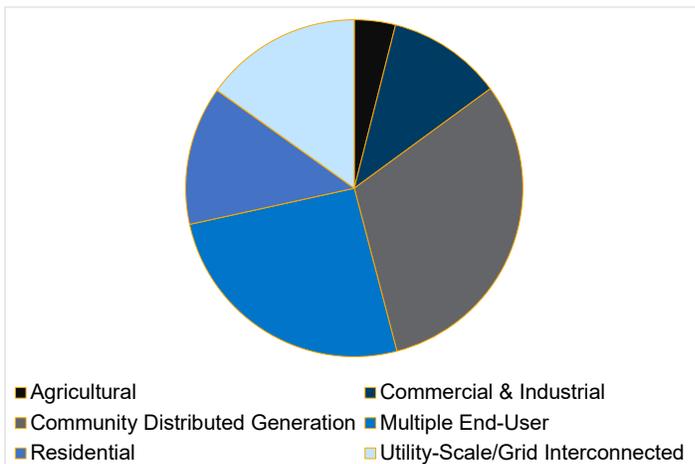
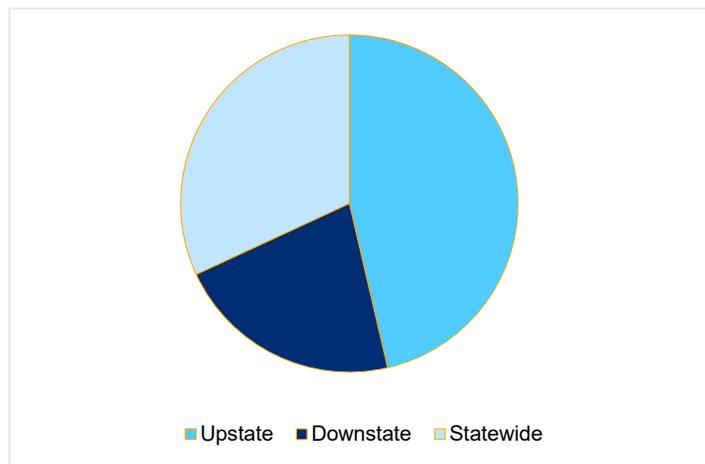


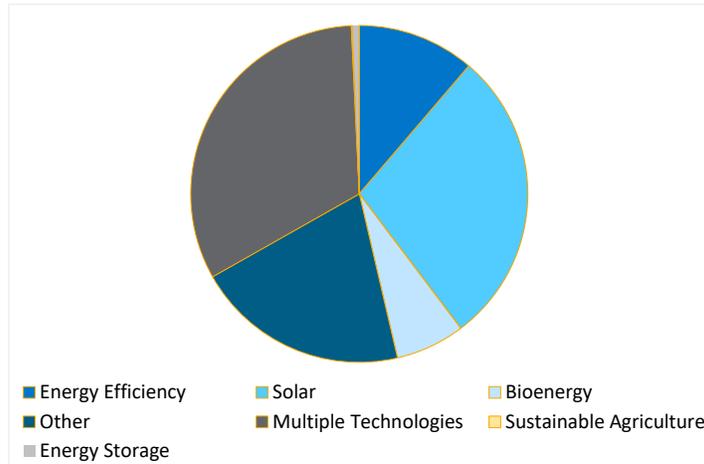
Figure 6 Geographic Distribution of Active Pipeline



⁵ Note that due to rounding for the purposes of presentation in this Report, the sum of each NYGB Commitment may not be identical to the Total NYGB Commitment amounts.

⁶ "IRC" takes the meaning Investment and Risk Committee

Figure 7 Technology Distribution of Active Pipeline



2.3 Support of the NYS Clean Energy Market Recovery During the COVID-19 Crisis

NYGB took specific actions to help NYS clean energy and sustainable infrastructure businesses recover during the COVID-19 crisis as the State’s economy reopened under the NY Forward plan. On March 27, 2020, the U.S. Congress enacted the Coronavirus Aid, Relief, and Economic Security Act (the “**CARES Act**”), which provides economic relief to small businesses and others that have been impacted by the COVID-19 pandemic. Among other things, the CARES Act expands the Section 7(a) loan program administered by the SBA by establishing the PPP. Under the PPP, the SBA is authorized to guarantee loans from banks and certain non-bank lenders to small businesses and other eligible borrowers.

After the PPP was established, NYGB earmarked \$50.0 million in capital and applied to the Small Business Administration, and was approved as a PPP lender to provide PPP loans to small businesses and other eligible borrowers in NYS’s clean energy industry. These loans have provided, and will continue to provide, critical support throughout the current health crisis and will help ensure NYS’s clean energy industry is able to remain as stable as possible.

2.4 Additional Achievements and Activities

In the quarter ended September 30, 2020, in addition to those matters referenced elsewhere in this report and ongoing “business as usual” activities (e.g., origination, execution and routine outreach), NYGB’s achievements include:

(a) Continuing Stakeholder Outreach & Communications:

- i. All events in which NYGB representatives participated during this quarter were virtual, due to COVID-19 related restrictions around in-person gatherings.⁷ Virtual events included:
 - i. *EV100 Webinar*: On August 18, New York State Energy Research & Development Authority (NYSERDA) Clean Transportation Program Leads and NYGB presented in the *EV100 Webinar: Funding Your Company EV Fleet Conversion and Deploying Charging*. NYGB provided an overview of its capital solutions for financing company

⁷ NYGB did not organize or participate in any in-person events during the previous quarter. Following guidelines set by the Centers for Disease Control and Prevention, NYGB will only organize or participate in remote events under the lowest-risk category for community, work and school events and gatherings. See: <https://www.cdc.gov/coronavirus/2019-ncov/community/large-events/considerations-for-events-gatherings.html#:~:text=Limit%20attendance%20or%20seating%20capacity,at%20least%206%20feet%20apart>.

fleet conversions from fossil fuel driven combustion engines to electric vehicles, and its financing solutions for supporting the deployment of charging infrastructure.

- ii. *ACEEE Webinar*: On September 15, NYGB presented at the *ACEEE Webinar: Building Energy Performance Standards and Importance of Financing*, speaking to the important role financing will play to help buildings comply with energy performance standards. NYGB described how policy changes, such as New York City's Local Law 97, will increase the number of commercial buildings required to implement energy efficiency upgrades and presented financing solutions that can be used to meet the requirements.
 - iii. *Build Back Greener*: On September 22, NYGB spoke at the Danish Clean Tech Hub event *Build Back Greener – Principles for Kickstarting the Sustainable Transition through Partnerships*. During a fireside chat, NYGB discussed how partnerships can spur investments in sustainability with Torben Möger, CEO, Pension Denmark and Erik Thomas Johnson, Head of Sustainable Business Development in DI, moderating.
 - iv. *Clean Transportation Summit*: On September 29, at ANCA's Virtual Clean Transportation Summit, NYGB provided the opening remarks outlining the New York State's clean transportation infrastructure goals and incentives, as well as needs for the 2023 World University Games.
- ii. *NYGB Leadership in the U.S. Climate Alliance Finance Working Group*: As co-chair of the U.S. Climate Alliance Finance Working Group, NYGB continued to develop a series of webinars to present various climate financing solutions to the membership. During the quarter ended June 30, 2020, the Working Group focused on clean transportation, an area of interest identified by the Membership. On August 31, NYGB presented with Atlas Policy Group Founder, Nick Nigro, at the USCA Climate Finance Working Group Webinar: Clean Transportation. The webinar provided a broad overview of the EV market, its challenges, and financing gaps, followed by an in-depth discussion of NYGB's approach to program funding and opportunities to create financing frameworks that are scalable and replicable.

(b) Public Reporting & Metrics:

- i. On August 15, 2020, NYGB filed its Quarterly Report for the period ended June 30, 2020 (available at www.greenbank.ny.gov/Resources/Public-Filings).
- ii. NYGB will host its regular Quarterly Review Webinar for this Report in early December 2020, including discussion of activities from NYGB's quarter ended September 30, 2020.

3 Regulatory Framework

3.1 Purpose

As a steward of considerable public capital, NYGB periodically reports its progress and performance to allow all stakeholders, including the NYS Public Service Commission (the "**Commission**" or the "**PSC**"), and the general public to assess NYGB's achievement of its overall mission.

Defined terms used in the text of this Report but not separately described have the meanings respectively given to them in the Metrics Plan.

3.2 NYGB Mission and Operating Principles

NYGB's mission is to accelerate clean energy deployment in NYS by working in collaboration with the private sector to transform financing markets.

The key elements of NYGB’s mission are to collaborate with private participants, implement solutions that overcome market barriers, and transform financial markets, with the goal to attract private sector investment in clean energy by enabling greater scale, new and expanded asset classes, and increased liquidity.

NYGB follows certain important operating principles to increase private sector market participation:

- (a) Focusing on wholesale capital markets (that is, providing structured financial products to developers and specific projects that result in clean energy benefits for all New Yorkers at scale – rather than funding consumers/homeowners directly);
- (b) Structuring financial products to foster replicable sustainable infrastructure investments;
- (c) Pricing financial products consistently with commercial approaches to credit quality and risk, earning a return on investment to preserve and grow NYGB’s capital base;
- (d) Collaborating with, rather than competing against, market participants that can engage, or are already engaging, the financial markets, but where that engagement or progress is constrained by a lack of available financing; and
- (e) Recycling its capital into new clean energy projects when income is generated and as investments mature or are realized, maximizing the impact of its capital across multiple deployments.

3.3 Relationship to NYS Clean Energy Policy

NYGB contributes to the primary Clean Energy Fund (“**CEF**”) objectives of GHG emissions reductions, customer bill savings, energy efficiency, clean energy generation and mobilization of private sector capital.⁸ In turn, the CEF objectives support the State’s clean energy targets, including under the Green New Deal, which mandates a significant increase in the State’s Clean Energy Standard (“**CES**”) with a goal of 70.0% energy generation from renewable sources by 2030 and 100.0% carbon-free electricity by 2040.⁹ The CEF objectives also support the Climate Leadership and Community Protection Act (“**CLCPA**”),¹⁰ which puts NYS on a road to economy-wide carbon neutrality, through a target of reducing GHG emissions from all anthropogenic sources 85.0% over 1990 levels by the year 2050, a plan to offset remaining emissions, and an interim mandate of 40.0% GHG emission reductions by 2030.^{11,12}

4 Tables

4.1 Quarterly Metrics¹³

NYGB monitors its counterparties’ clean energy project installations throughout the duration of each investment through the receipt and review of periodic reports and by applying updated impact benefit

⁸ As set out in the CEF Order (Cases 14-M-0094 etc.) issued and effective on January 21, 2016, page 40.

⁹ Announced by Governor Andrew M. Cuomo in the 2019 State of the State, See www.governor.ny.gov/sites/governor.ny.gov/files/atoms/files/2019StateoftheStateBook.pdf.

¹⁰ Governor Cuomo signed Senate Bill S6599 into law on July 18, 2019. See legislation.nysenate.gov/pdf/bills/2019/a8429.

¹¹ The CLCPA codified and expanded New York’s Green New Deal and other nation-leading clean energy and climate targets for the State, including: (a) quadrupling New York’s offshore wind target to 9,000 MW by 2035 (up from 2,400 MW by 2030); (b) doubling distributed solar deployment to 6,000 MW by 2025 (up from 3,000 MW by 2023); (c) deploying 3,000 MW of energy storage by 2030 (up from 1,500 MW by 2025); (d) more than doubling new large-scale land-based wind and solar resources through the CES; (e) maximizing the contributions and potential of New York’s existing renewable resources; (f) expanding and enhancing the Solar For All Program to increase access to affordable and clean energy for low-income, environmental justice and other underserved communities; and (g) initiatives to achieve carbon neutral building stock Statewide, including through the energy efficiency target to reduce energy consumption by 185 trillion Btus below forecasted energy use in 2025.

¹² Additionally, the CLCPA required a Climate Action Council be formed and policy roadmap developed to ensure that 35% of clean energy program resources benefit disadvantaged communities and individuals working in conventional energy industries are provided with training and opportunities in the growing clean energy economy.

¹³ Regular reporting of energy and environmental benefits are inclusive of all transactions that receive NYGB funding, regardless of whether these transactions also receive support from ratepayer or other programs. In terms of assessing the extent of overlap and common benefits, NYSERDA will modify intake information received on incentive programs to determine whether NYGB

calculation factors advised by DPS. Based on information received, NYGB regularly assesses the actual and expected energy and environmental impact benefits across its portfolio. As new information becomes available informing NYGB of NYS market uptake of clean energy projects, NYGB may correspondingly adjust (up or down) the overall portfolio's high and low estimated Total Project Costs and energy and environmental metrics (identified at closing of each investment and reflected in Transaction Profiles). Consistently monitoring and refining expected outcomes improves the accuracy of NYGB's portfolio-level estimate of impact benefits as it works toward meeting the CEF objectives to support the State's clean energy goals. Given such periodic adjustments, the aggregate estimated benefits reported in Quarterly Reports are the most up-to-date estimates (and no longer reflect the sum of the low and high estimated benefits specified in the Transaction Profiles at the time of each transaction close).

Table 2 presents required metrics for the period April 1, 2020 through September 30, 2020 and the previous quarter ending March 31, 2020.

Table 2 Quarterly Metrics

Quarterly Metric	Prior Quarter	Current Quarter
Capital Position		
▪ Authorized Capital (\$)	\$1.0 billion	\$1.0 billion
▪ Authorized Administrative Expenses (\$)	\$17.6 million	\$17.6 million
▪ Authorized Evaluation Expenses (\$)	\$4.0 million	\$4.0 million
Operational Matters		
▪ Cumulative Revenues (\$) ¹⁴	\$93.2 million	\$100.2 million
▪ Cumulative Operating Expenses (\$) ¹⁵¹⁶	\$49.7 million	\$53.0 million
▪ Direct Operating Expenses (\$)	\$30.6 million	\$32.8 million
▪ Allocated Expenses (\$)	\$19.1 million	\$20.2 million
▪ Credit Facility (if in place)		
▪ Credit Facility Amount (\$)	Not Applicable	Not Applicable
▪ Credit Facility Drawn Amount (\$)	Not Applicable	Not Applicable
▪ Credit Facility Fees & Interest (Cumulative) (\$)	Not Applicable	Not Applicable
Investment Portfolio		
▪ Committed Funds (\$)	\$145.5 million	\$172.1 million
▪ Deployed Funds (\$) ¹⁷	\$490.0 million	\$522.7 million
▪ Current Portfolio (\$) ¹⁸	\$635.4 million	\$694.8 million

capital is involved for incentive program customers. Evaluation sampling of NYGB clients will also seek to identify transactions that involve funding from both within and outside of NYGB, including other ratepayer-funded programs to the extent possible. These two sources of information will allow NYSEERDA to estimate a reasonable overlap value for energy and environmental benefits so they are not double-counted when NYGB impacts are included in CEF or other NYS clean energy program results.

¹⁴ Cumulative Revenues include quarterly fair market value adjustments related to NYGB capital held in U.S. Treasury securities, consistent with U.S. generally accepted accounting principles. In addition, Cumulative Revenues are always stated net of impairments.

¹⁵ Cumulative Operating Expenses currently include \$604,109 in evaluation expenses.

¹⁶ Due to rounding, Cumulative Operating Expenses does not equal the sum of Direct Operating Expenses and Allocated Expenses

¹⁷ Deployed Funds as presented in Table 2 are net of all capital repaid to the reporting date.

¹⁸ The dollar value of the Current Portfolio is expected to fluctuate from quarter to quarter, including to reflect any increases or decreases in Committed Funds and/or Deployed Funds. Committed Funds increase when new transactions are executed with commitments that have not yet been funded, and/or in connection with existing transactions, where repaid amounts may be available to be redrawn pursuant to the terms of investment agreements. Deployed Funds increase where the total dollars funded into investments exceed amounts repaid in the same period. Decreases in Committed Funds occur, for example, in connection with the release of undrawn funds at the end of an availability period or otherwise consistent with the terms of an investment, while decreases in Deployed Funds occur primarily when NYGB investments are repaid from time to time, allowing those monies to be recycled into new clean energy investments in the State, generating further benefits for ratepayers. Note that due to

Quarterly Metric	Prior Quarter	Current Quarter
▪ Overall Investments to Date (\$)	\$1.0 billion	\$1.1 billion
▪ Total Project Costs (Cumulative) (\$) ¹⁹	In the range of \$2.3 to \$2.9 billion	In the range of \$2.4 to \$3.0 billion
▪ Mobilization Ratio	Tracking at least 2.6:1 on average across portfolio	Tracking at least 2.8:1 on average across portfolio ²⁰
▪ Portfolio Concentrations (%) ²¹	75.7% Renewable Energy	74.6% Renewable Energy
	7.6% Energy Efficiency	7.7% Energy Efficiency
	16.7% Other	17.7% Other ²²
▪ Number & Type of NYGB Investments	51 – Renewable Energy	54 – Renewable Energy
	10 – Energy Efficiency	11 – Energy Efficiency
	9 – Other	11 – Other
▪ Number & General Type of NYGB Counterparties ²³	64 – Local Development Corporation; Global, Corporate and/or Investment Bank; Regional Bank; Specialty Finance Company; Energy Project Developer; Municipal, University, Schools & Hospitals; Energy Technology Provider & Vendors; Government Authority; Insurance Company; Transportation	68 – Local Development Corporation; Global, Corporate and/or Investment Bank; Regional Bank; Specialty Finance Company; Energy Project Developer; Municipal, University, Schools & Hospitals; Energy Technology Provider & Vendors; Government Authority; Insurance Company; Transportation
▪ Estimated Gross Lifetime Energy Saved by Fuel Type from Energy Efficiency Projects (MWh/MMBtu) and/or Estimated Gross Lifetime Clean Energy Generated (MWh) for Committed Funds & Deployed Funds ²⁴	Estimated Gross Lifetime Energy Saved by Fuel Type (Energy Efficiency): 369,000 - 451,000 MWh; and 1.48 – 2.14 million MMBtu	Estimated Gross Lifetime Energy Saved by Fuel Type (Energy Efficiency): 369,000 – 451,000 MWh; and 1.48 – 2.14 million MMBtu
	Estimated Gross Lifetime Clean Energy Generated: 21.5 – 29.7 million MWh	Estimated Gross Lifetime Clean Energy Generated: 22.8 – 34.4 million MWh

rounding for the purposes of presentation in this Report, the sum of Committed Funds and Deployed Funds may not be identical to Current Portfolio. In addition, Current Portfolio is always stated net of any portfolio losses.

¹⁹ Further to the definition of “**Total Project Costs (Cumulative)**” in the Metrics Plan (see page 15), Total Project Costs (Cumulative) may include fair market value (“**FMV**”) data for a subset of NYGB’s investments. FMV is an estimated market valuation of fully installed energy projects provided by NYGB’s counterparties and is often required for federal income tax purposes by institutional investors and for certain grant program purposes unconnected with NYGB. As projects progress and the cost of installed equipment and labor are known and reported to NYGB by its counterparties, NYGB seeks to adjust reported values and replace FMV in its aggregated data sets and periodic reporting with reported actual costs.

²⁰ Given the range of Total Project Costs that NYGB investments mobilize, the Mobilization Ratio also represents a range: currently of 2.4:1 to 3.0:1.

²¹ Based on executed transactions and reflecting dollar values invested by NYGB in renewable energy and energy efficiency transactions, each as a proportion of the Current Portfolio.

²² “Other” technology classification includes: CHP, sustainable transportation, fuel cells, energy storage, microgrids and other types of projects that, while falling within “clean energy,” are not readily classified as either renewable energy or energy efficiency.

²³ In reporting the number and type of NYGB counterparties, NYGB seeks to reflect counterparties that are discrete (i.e., where NYGB is involved in different transactions with the same counterparty, that party is counted only once for the purposes of this metric); and directly in the transaction with NYGB (i.e., vendors or other counterparties to NYGB’s clients or expected future transaction participants are not counted).

²⁴ NYGB does not, by filing this Report, make any claim to the environmental attributes associated with megawatt-hours expected to be generated by projects supported by investments in its portfolio. NYGB has relinquished all such rights and disavows any and all rights to any environmental claims or renewable energy.

Quarterly Metric	Prior Quarter	Current Quarter
<ul style="list-style-type: none"> ▪ Estimated Gross First Year²⁵ Energy Saved by Fuel Type from Energy Efficiency Projects (MWh/MMBtu) and/or Estimated Gross First Year Clean Energy Generated (MWh) for Committed Funds & Deployed Funds 	Estimated Gross First Year Energy Saved by Fuel Type (Energy Efficiency) 25,800 – 31,600 MWh; and 86,000 – 122,000 MMBtu	Estimated Gross First Year Energy Saved by Fuel Type (Energy Efficiency) 25,800 – 31,600 MWh; and 86,000 – 122,000 MMBtu
	Estimated Gross First-year Clean Energy Generated 1,066,000 – 1,408,000 MWh	Estimated Gross First-year Clean Energy Generated 1,148,000 – 1,749,000 MWh
<ul style="list-style-type: none"> ▪ Estimated Gross Lifetime Energy Saved from CHP (MWh) for Committed Funds & Deployed Funds 	Estimated Gross Lifetime Energy Saved from CHP: 60,700 - 74,200 MWh	Estimated Gross Lifetime Energy Saved from CHP: 60,700 – 74,200 MWh
<ul style="list-style-type: none"> ▪ Estimated Gross First Year Energy Saved from CHP (MWh) for Committed Funds & Deployed Funds 	Estimated Gross First Year Energy Saved from CHP: 2,973 – 3,634 MWh	Estimated Gross First Year Energy Saved from CHP: 2,973 – 3,634 MWh
<ul style="list-style-type: none"> ▪ Estimated Gross Lifetime Energy Savings from CHP (MMBtu)²⁶ for Committed Funds & Deployed Funds 	Estimated Gross Lifetime Energy Savings from CHP: -6,017,500 – -7,096,000 MMBtu	Estimated Gross Lifetime Energy Savings from CHP: -10,166,700 – -30,811,400 MMBtu
<ul style="list-style-type: none"> ▪ Estimated Gross First Year Energy Savings from CHP (MMBtu) for Committed Funds & Deployed Funds 	Estimated Gross First Year Energy Savings from CHP: -610,940 – -720,830 MMBtu	Estimated Gross First Year Energy Savings from CHP: -1,025,870 – -3,092,370 MMBtu
<ul style="list-style-type: none"> ▪ Estimated Gross Clean Energy Generation Installed Capacity from CHP (MW), if applicable, for Committed Funds & Deployed Funds 	14.4 MW	19.4 – 41.4 MW
<ul style="list-style-type: none"> ▪ Estimated Gross Clean Energy Generation Installed Capacity (MW), if applicable, for Committed Funds & Deployed Funds 	690.7 – 983.2 MW	722.0 – 1,066.2 MW
<ul style="list-style-type: none"> ▪ Estimated Gross Lifetime GHG Emission Reductions (metric tons)²⁷ for Committed Funds & Deployed Funds 	11.06 – 15.43 million metric tons	11.6 – 17.2 million metric tons
Indirect Impact Benefits²⁸		
<ul style="list-style-type: none"> ▪ Estimated Lifetime Energy Saved (MWh) 	-	-
<ul style="list-style-type: none"> ▪ Estimated Lifetime Energy Saved (MMBtu) 	-	-

²⁵ All “estimated gross first year” metrics refer to the first year of estimated gross benefits (e.g., energy saved, installed capacity, GHGs, etc.) that are expected to occur when each underlying project is fully installed. This means that estimated gross first year benefits across NYGB’s portfolio do not (and are not intended to) correspond to installed benefits in any given year, and instead represent cumulative estimated benefits across NYGB’s portfolio based on transactions executed through the CEF term. Note that underlying projects will usually be installed over one or more years following execution of investment agreements (reflecting project development/implementation and funding deployment cycles). The sum of all estimated gross first year measures will approximate the total annual CEF benefits goals for NYGB investments at the end of the CEF term (i.e., in 2025). As set out in Section 2.2.2 of the Metrics Plan, NYGB reports on installed energy and environmental benefits associated with NYGB’s portfolio in the prescribed form annually, with such reporting included in the Quarterly Metrics Report for each quarter ended December 31.

²⁶ For CHP systems, energy savings in thermal unit form is computed as the difference between the natural gas displaced by the recovered thermal energy and natural gas consumption by the generator. See www.nyserda.ny.gov/-/media/Files/Publications/PPSER/Program-Evaluation/2015ContractorReports/2015-Distributed-Generation-CHP-Impact-Evaluation-Final.pdf for information on CHP Impact evaluation methods in NYS.

²⁷ NYSERDA utilizes a 1,103 lbs/MWh conversion factor to estimate GHG emissions reductions for electric generation and energy efficiency savings across all components of the CEF.

²⁸ NYGB reports and tracks indirect impact benefits to reflect the contribution to NYS clean energy goals made by NYGB activities and related incremental value for all NYS consumers.

Quarterly Metric	Prior Quarter	Current Quarter
▪ Estimated Lifetime Clean Energy Generation (MWh)	4.1 – 8.5 million MWh	4.1 – 8.5 million MWh
▪ Estimated Installed Capacity CHP (MW)	-	-
▪ Estimated Installed Capacity (MW)	61.2 – 129.7 MW	61.2 – 129.7 MW
▪ Estimated Lifetime GHG Emissions Reductions (Metric Tons)	2.2 – 4.5 million metric tons	2.2 – 4.5 million metric tons
Investment Pipeline		
▪ Active Pipeline (In the Quarter) (\$)	\$987.2 million	\$789.9 million
Investment Process		
▪ Proposals Received – Value (Cumulative) (\$)	\$4.4 billion	\$4.8 billion
▪ Approvals - Scoring Committee (Cumulative) (\$)	\$4.2 billion	\$4.6 billion
▪ Approvals - Greenlight Committee (Cumulative) (\$)	\$1.8 billion	\$2.2 billion
▪ Approvals - IRC (Cumulative) (\$)	\$1.1 billion	\$1.3 billion

4.2 Direct and Indirect Metrics Benefits

As NYGB has developed and grown since inception, with increasing diversity in the nature and type of transactions in which it participates, its activities have the potential to generate both direct and indirect impact benefits for NYS residents. While the Metrics Plan was designed with an initial focus on direct impact benefits, NYGB differentiates between Direct and Indirect Impact Metrics, tracking both to more comprehensively quantify the estimated impact of each NYGB investment on the NYS clean energy and sustainable infrastructure market. This is consistent with the CEF Order, which specifically recognizes the importance of catalyzing markets and generating indirect benefits as part of CEF initiatives, including over longer time horizons.²⁹

The quantification of indirect impact benefits is intended to capture the market transformational effects of NYGB investment activity. Many other CEF initiatives also anticipate accruing indirect benefits related to longer-term effects from follow-on market activity. These indirect impacts are grounded in a theory of change developed for each initiative, and NYSERDA will use market evaluation approaches, consistent with the rest of the CEF, to verify the indirect impacts as they accrue. Estimated indirect benefits are reflected in NYGB progress reporting, in general and towards meeting NYGB CEF goals. The realization and evaluation of NYGB indirect benefits over time will also be reflected in periodic reporting as appropriate. Both direct and indirect metrics contribute to the reductions of GHGs in the State from NYGB activity.

For NYGB, Direct and Indirect Impact Metrics are further defined as follows:

²⁹ See CEF Order (Cases 14-M-0094 et al.) pages 68 – 69: “The approved [CEF eligibility criteria] provide NYSERDA with the needed flexibility to choose initiatives that will create the greatest benefits for the least cost and to support innovative new technologies and approaches. We recognize that initiatives oriented towards market development, while they have the potential to create the greatest benefits for ratepayers in the long run, will have more indirect and less easily calculated clean energy benefits as compared to resource acquisition programs. We require NYSERDA to take a broad view of these indirect benefits when considering whether an initiative is eligible for CEF funding and to also take into account other benefits of the initiative, including its contribution to all of the CEF goals and its economic development benefits. Funding market-based projects with an indirect impact on clean energy is wholly consistent with the Commission’s historic approach to clean energy programs. For example, the Commission approved workforce development programs, designed to achieve both indirect clean energy benefits and economic development benefits, as part of both [the energy efficiency performance standard] and [the renewable portfolio standard]. Holistic consideration of these benefits will best support the SEP, the goals described in the New York State Energy Law, and the interests of ratepayers”.

- (a) *Direct Impact Metrics*: Direct Impact Metrics quantify the estimated impact of the counterparty's project development or business-building activity. The types of Direct Impact Metrics that NYGB tracks are those outlined in the Metrics Plan (and publicly reported quarterly), in aggregate on a path to achieving the impact benefit objectives by the end of the CEF in December 2025. Benefits are tracked on an estimated and actual basis (with actuals reported annually for NYGB's Investment Portfolio in each calendar year). NYGB investments typically involve terms that limit or incentivize the use of NYGB investment proceeds to new or incremental project development in NYS.
- (b) *Indirect Impact Metrics*: Indirect Impact Metrics seek to measure the effect of NYGB investment for projects, pipelines, or other counterparty structures that wholly or in part catalyze other developments in the clean energy and sustainable infrastructure market beyond that in which NYGB directly invests (e.g., providing liquidity in the secondary markets and in relation to large-scale renewables with merchant exposure). While NYGB investments might not fund new project development, material indirect benefits are nevertheless expected to accrue to the State over time as a result of this type of NYGB activity. NYGB tracks such estimated benefits (which can be in MWs, MWh, MMBtus, or metric tons of GHG reduced/avoided) on a lifetime basis. The realization of indirect impact benefits is expected over time. To confirm the nature and extent of indirect impact benefits that are in fact realized by the State, periodic market assessments will occur as needed to verify that new development activity has in fact eventuated, validating NYGB's estimated indirect impact benefits.

5 Progress Against Plan Deliverables

In its Annual Business Plan 2020 – 2021, filed on June 19, 2020, NYGB identified deliverables (the “**Plan Deliverables**”) that collectively mark its progress toward key initiatives in the period April 1, 2020 through March 31, 2021.

NYGB's Quarterly Reports are required to address progress against the Plan Deliverables and provide a brief narrative (as appropriate) of status and an explanation of any material variances relative to expectations.

Table 3 summarizes NYGB's performance against the Plan Deliverables for the quarter ended September 30, 2020.

Table 3 Annual Deliverables Table

Category	Deliverable	Status in Quarter Ended September 30, 2020
Support Post-COVID-19 Crisis Economic Recovery		
Market Engagement	<ul style="list-style-type: none"> Develop and implement survey to understand COVID-19 impact and post-PAUSE stakeholder financing needs. Convene market participants via Webinar to communicate NYGB's specific approaches to provide liquidity to clean energy financing markets. 	<p>☑ Achieved Last Quarter: On April 14, 2020, NYGB issued the <i>COVID-19 Impact Survey</i> 140+ clean energy market received responses identifying financing gaps and near-term financing challenges emerging in clean energy industry because of current circumstance. To remain collaborative and responsive to changing market needs, NYGB developed and communicated its financing solutions in the <i>COVID-19 Impacts Webinar</i> on June 2, 2020.</p>
Liquidity Solutions	<ul style="list-style-type: none"> Develop and implement financing structures to provide liquidity to clean energy market participants during and following the NY Forward reopening of the State's economy. 	<p>☑ Ongoing and On-track: In the <i>COVID-19 Impacts Webinar</i>, NYGB outlined various financing solutions to address financing needs emerging as a result of COVID-19. In addition, on July 15, 2020, NYGB issued <i>PON-1: Paycheck Protection Program Loans</i> ("PON-1"). Under PON-1 eligible applicants could apply to NYGB for a Paycheck Protection Program loan to cover payroll costs and certain other expenses. In order to satisfy NYGB's mandate, PPP loans were required to have the potential to enable borrowers to reduce greenhouse gas emissions in New York State. In the third quarter, NYGB executed three transactions under PON-1.</p>
Strong and Growing Portfolio Driving Material Clean Energy Investments Across NYS		
Committed Funds	<ul style="list-style-type: none"> Deliver at least \$225.0 million of incremental commitments in the 2020 – 21 Plan Year (at an average rate of \$56.25 million in closed transactions per quarter).³⁰ 	<p>☑ Ongoing and On-track: NYGB committed \$87.2 million to during the second quarter of the Plan Year.</p>
Active Pipeline	<ul style="list-style-type: none"> Maintain an Active Pipeline of at least \$450.0 million per quarter on average throughout the 2020 – 21 Plan Year. 	<p>☑ Achieved for the Quarter: NYGB's pipeline of \$789.9 million meets the quarterly target.</p>
Clean Energy for Disadvantaged Communities	<ul style="list-style-type: none"> Design and launch an initiative to deploy capital at scale into low-to-moderate income ("LMI") and other disadvantaged communities including as appropriate, modified goals, metrics and investment criteria. 	<p>☑ Achieved this Quarter: NYGB worked with Community Development Financial Institutions, housing agencies, affordable housing developers and operators, and other groups to launch a new initiative aimed at making investments of at least \$150 million to expand clean energy and energy efficiency solutions that benefit the State's affordable multifamily housing market.</p>
Large-Scale Renewables	<ul style="list-style-type: none"> Assist NYSERDA in evaluating offshore wind port infrastructure projects to help achieve the State's \$200.0 million goal of supporting port infrastructure investment. 	<p>☑ Ongoing and On-track: On July 21, 2020 NYSERDA, with the support of NYGB, Empire State Development and the New York State Department of Transportation, issued, a combined solicitation for investing in the state's port infrastructure, ORECRFP20-1.</p>

³⁰ The extent to which COVID-19 may impact NYGB's accomplishments, including meeting its capital deployment target, is uncertain.

Category	Deliverable	Status in Quarter Ended September 30, 2020
	<ul style="list-style-type: none"> Coordinate outreach to awardees of the NYSERDA approved land-based renewable projects to communicate NYGB's financing approach. 	<input checked="" type="checkbox"/> Achieved for the Quarter: NYGB conducted outreach to the awardees of the NYSERDA approved land-based renewable projects and outlined its financing approach.
Energy Storage	<ul style="list-style-type: none"> Convene tax equity providers and other lenders interested in providing capital to projects that include energy storage to explain NYGB's financing approach and demonstrate how tax equity providers could access projects. 	<input checked="" type="checkbox"/> Not Yet Started
Energy Efficiency	<ul style="list-style-type: none"> Contribute to NYSERDA's Advanced Efficiency Solutions Program's initiatives as applicable to describe NYGB's approach to financing energy efficiency projects in commercial buildings. 	<input checked="" type="checkbox"/> Not Yet Started
Clean Transportation	<ul style="list-style-type: none"> Participate in a webinar with EV100 to raise awareness of NYGB's clean transportation financing approach and outline the financing structures NYGB has developed to address the challenges associated with EV and EV infrastructure financing. 	<input checked="" type="checkbox"/> Achieved this Quarter: On August 18, 2020, NYGB presented in the EV100 Webinar: <i>Funding Your Company EV Fleet Conversion and Deploying Charging</i> . NYGB presented its capital solutions for financing company fleet conversions of fossil fuel to electric vehicles and for deploying charging infrastructure.
Technology & Business Innovation	<ul style="list-style-type: none"> Host a webinar in conjunction with NYSERDA's Technology to Business Innovation Program to articulate how NYGB can help finance emerging business models at the commercial deployment stage. 	<input checked="" type="checkbox"/> Ongoing and On-track: In collaboration with the NYSERDA Technology to Business Innovation Program, NYGB will be holding this webinar during the Plan Year.
Mobilizing Capital in Support of CEF and CLCPA Goals		
Mobilization Ratio	<ul style="list-style-type: none"> Continue progress toward mobilizing capital into clean energy and sustainable infrastructure projects in the State through NYGB activity by the end of the CEF in 2025. Reassess original CEF \$8.0 billion capital mobilization target as part of CEF triennial review. 	<input checked="" type="checkbox"/> Ongoing and On-track: At quarter end, NYGB investments were expected to mobilize \$3.0 billion of project costs in NYS. NYGB continues to analyze forecasted mobilization as part of the CEF triennial review.
Debt Facility	<ul style="list-style-type: none"> Put in place a debt financing (e.g., bank facility, bond issuance or other structure) if prudent decision-making supports, taking into consideration the pace of capital commitment and the time expected to complete the debt financing, to ensure the ability to continue funding clean energy assets at the point that investments are expected to exceed NYGB's current capitalization. 	<input checked="" type="checkbox"/> Ongoing and On-track: NYGB has reengaged its strategic advisor related to addressing NYGB's liquidity needs and actively exploring options for advancing a future debt financing.
LMI Initiative	<ul style="list-style-type: none"> Develop mobilization and impact goals related to dedicated commitment to transactions supporting LMI and disadvantaged communities to meet the goals of the CLCPA. 	<input checked="" type="checkbox"/> Ongoing and On-track: NYGB concluded its engagement with a consultant and continues to develop mobilization and impact goals.
Strengthening Operations		

Category	Deliverable	Status in Quarter Ended September 30, 2020
Legal Services for LMI Transactions	<ul style="list-style-type: none"> Identify approved law firms with practice groups dedicated to LMI-focused transactions. 	<input checked="" type="checkbox"/> Ongoing and On-track: NYGB identified law firms from its pool of prequalified law firm that are willing to cap their fees for transactions that support disadvantaged communities.
Valuation Services	<ul style="list-style-type: none"> Evaluate and select slate of approved valuation services providers pursuant to RFP 14. 	<input checked="" type="checkbox"/> Ongoing and On-track: NYGB received and evaluated proposals during the Quarter ended June 30, 2020.
Investment Proposal Submission Process	<ul style="list-style-type: none"> Review and revise RFP 1 to clarify NYGB's investment criteria and streamline the proposal submission process. 	<input checked="" type="checkbox"/> Ongoing and On-track: NYGB has proposed quantitative and qualitative changes to its investment RFPs to capture projects' potential to benefit LMI/disadvantaged communities.

Schedule – Transaction Profiles

As required by the Metrics Plan, Transaction Profiles for each of the transactions closed during the quarter to which this Report relates are attached.

Bridge Loan to Support the Deployment of Community Solar Projects

Eden Renewables, LLC

On November 8, 2019, NY Green Bank (“**NYGB**”) provided a 24-month senior secured \$2.5 million bridge loan facility (the “**Bridge Loan**”) to Eden Devco Borrower LLC (“**Borrower**”), which is owned by Eden Devco LP (“**Sponsor**”), a limited partnership that is managed by Eden Renewables LLC (“**Eden**”). Bridge Loan proceeds will finance project interconnection deposits to National Grid for community distributed generation (“**Community DG**”) solar projects. This transaction is expected to provide New York State (“**NYS**”) residents and businesses with a greater variety of energy choices and, ultimately, lower-cost clean energy opportunities.

Transaction Description

Eden is developing a portfolio of Community DG solar projects in NYS and requested that NYGB provide a \$2.5 million Bridge Loan to finance interconnection deposits to National Grid for such projects, due under the New York State Public Service Commission (the “**Commission**”) Standardized Interconnection Requirements and Application Process.¹

This transaction is expected to support up to 84.5 MW of solar assets in the State which is expected to: (i) provide commercial and residential project subscribers access to reliable, clean, low-cost energy; and (ii) reduce up to 373,019 metric tons of greenhouse gas (“GHG”) emissions annually in NYS. As there has been an increasingly strong demand for Community DG solar throughout NYS, capital providers are recognizing, and will continue to recognize, the value in providing financing to enable the deployment of these projects. NYGB expects the Bridge Loan product to serve a template for private capital to build on.

This Transaction Profile is provided pursuant to the “NY Green Bank – Metrics, Reporting & Evaluation Plan, Version 3.0” (the “**Metrics Plan**”) developed in collaboration with the NYS Department of Public Service and filed with the Commission on June 20, 2016.²

Form of NYGB Investment

NYGB Product	Product Sub-Type	Committed Capital
Asset & Investment	Bridge Loan	\$2.5 million

Location(s) of Underlying Project(s)

Capital Region. The first projects in the Bridge Loan will be located in Rensselaer County, NY.

¹ Under the revised NYS Standardized Interconnection Requirements, within 60 business days of receiving the Coordinated Electric System Interconnection Review (“**CESIR**”) results, interconnection applicants must pay the applicable utility 25.0% of the interconnection upgrade estimates.

² Case 13-M-0412.

Types of Client & Counterparty Organizations that are Transaction Participants

	Name	Participant Type
Client	Eden Renewables LLC	Energy Project Developer
Counterparties (current)	National Grid	Electric Utility

Summary of Financing Market Objectives & Barriers Addressed

Beneficiary	Market Barrier	Financing Solution
Solar Project Developers	Project sponsors are often expected to pay for interconnection upgrade expenses with equity funds as they finalize construction financing arrangements. This results in a relatively inefficient use of sponsor equity, which limits project deployment efforts and effectively restricts the amount of Community DG being deployed in NYS, slowing the rate of deployment.	This transaction encourages a more efficient use of sponsor equity and supports project development efforts in NYS by bridging the period in which project sponsors need to finalize project financing arrangements for projects for which the CESIR process has been completed. NYGB's role will create an easier pathway forward for developers and will enable greater deployment of community and other distributed generation assets throughout the State.
Capital Market Participants	As a relatively new form of clean energy project, Community DG lacks financing precedents and has limited performance history in NYS. As such, it can be more difficult for private sector capital providers to assess and price the underlying risk exposures associated with Community DG project investments.	Projects supported as a result of this transaction will generate project and customer performance data to draw new investors and financial institutions into the marketplace by demonstrating that competitive risk-return profiles can be achieved by Community DG-enabled business models.
Community DG Subscribers	Due to project siting, property ownership and consumer preference issues, on-site solar project installations may not be viable for a number of NYS homeowners, renters, and businesses. This limits the number of solar projects getting done to those with suitably sited homes or businesses.	This transaction supports the deployment of Community DG solar projects, which provide those who are not otherwise able to install solar energy generation systems on their property (e.g., homeowners whose rooftops cannot support solar systems, renters and those who cannot afford solar stand-alone systems), with voluntary access to clean, low-cost energy, regardless of where their home or business is located.

Technologies Involved

Technology	Measures
Renewable Energy	Solar photovoltaic systems

Metrics & Evaluation Plan

Planned Energy & Environmental Metrics

NYGB’s minimum investment criteria specifically require that “transactions will have the potential for energy savings and/or clean energy generation that will contribute to greenhouse [(‘GHG’)] reductions in support of New York’s energy policies”.³ In addition, the Metrics Plan requires that the following energy and environmental measures applicable to this transaction be reported on⁴:

- Estimated gross lifetime and first-year electricity savings (MWh);
- Estimated gross lifetime and first-year fuel savings (MMBtu); and
- Estimated gross lifetime and first-year GHG emission reductions (metric tons).

The estimated gross lifetime and first-year energy and environmental impacts of the Bridge Loan, are as follows:

Energy/Environmental Impact	Lifetime Low Estimate	Lifetime High Estimate	Annualized Low Estimate	Annualized High Estimate
Estimated clean energy generated (MWh)	745,700	1,739,967	29,828	69,599
Estimated clean energy generation installed capacity (MW) ⁵	25.34	59.12	Not Applicable	
Estimated GHG emission reductions (metric tons) ⁶	373,019	870,378	14,921	24,815

Planned Market Characterization Baseline & Market Transformation Potential

The Metrics Plan requires that market evaluation occurs when a critical mass of NYGB financing and investment arrangements are put in place, approximately three to five years following initial NYGB capital deployments. Market evaluation activities commenced in 2018 on sectors that have been supported by NYGB since its inception, and the data set will be updated going forward to include indicators specific to this and other transactions. Baseline data will be used as a comparison point against which to assess market progress in the later studies. Progress indicators are defined below for the short, mid and long-terms.

Short-term progress indicators will identify early activity levels and will be regularly tracked for the duration of the transaction. These include, but are not limited to:

- Size (i.e., generation capacity and expected dollar value) and location of projects financed by the Bridge Loan;
- Aggregate expected energy generation for projects financed by the Bridge Loan; and
- The number of projects that finalize construction financing arrangements.

Mid and long-term indicators will be expected to show progress through program tracking or market evaluation over time. These include, but are not limited to:

- Market volume of Eden Devco LP projects increases;
- General understanding of renewable energy benefits by financial community increases;
- Increased awareness and use of Community DG subscriber performance data by financing entities;
- Increased awareness and use of project/technology performance data by financing entities;
- Demonstration of competitive risk-return profiles for Community DG solar investment;
- Decreased project costs;

³ Case 13-M-0412, “Order Establishing New York Green Bank and Providing Initial Capitalization” issued and effective December 19, 2013 of the Commission, Ordering Clause 6 at pages 24 – 25.

⁴ See Metrics Plan, Section 2.0, pages 2 - 6.

⁵ Installed clean energy generation capacity at full deployment of funds is the same for first-year and lifetime duration.

⁶ As of January 1, 2016, the New York State Energy Research and Development Authority (“NYSERDA”) utilizes a 1,160 lbs./MWh conversion factor to estimate GHG emissions reductions for electric generation and energy efficiency savings across all components of the Clean Energy Fund. NYSERDA previously utilized a 625 lbs./MWh conversion factor.

- Volume of secondary market financing of Community DG solar assets; and
- Number of new lending participants.

Proposed Method of Outcome/Impact Evaluation (by NYSERDA) & Timeframe

NYSERDA will evaluate the impact this transaction has had on the clean energy finance markets and the energy/environmental benefits which it delivers.

Market evaluation will address the short, mid and long-term indicators identified above. Methods will include analysis of program data along with interviews and surveys of market participants (project subscribers, financial community) to track information including but not limited to: participation rates, project scale information, interest in solar financing (generally and with regard to Community DG specifically), and influence of NYGB's participation on financial markets. As noted, baseline data was collected on key indicators in the first phase evaluation during 2018 – 19. Later follow-up studies will assess progress against baseline levels for other market segments as those evolve. The specific timing of these efforts may be revised based on experience or other factors as NYGB's investment portfolio further develops and evolves.

Impact evaluation will assess which of the projects funded under the Bridge Loan raised construction financing and were completed, commissioned, and placed in service.

As with all NYGB investments, Eden projects that receive an incentive or funding from other entities (e.g., utility, other NYSERDA program) will, in accordance with the Metrics Plan, be tracked in order to minimize any double-counting activity on a consolidated basis. As set out in the Metrics Plan, evaluation sampling approaches will also be used as a mechanism to estimate overlap and minimize double counting. Attempts will be made to coordinate market and impact evaluation activities for these projects that receive support from multiple sources in order to maximize the efficiency of data collection and avoid participant survey fatigue.

Accelerating Clean Energy Investment in New York State

Generate Capital, Inc.

In November 2019, NY Green Bank (“**NYGB**”) provided a senior secured \$35.0 million term loan facility (the “**Facility**”) to Generate PPL SPV I (“**Borrower**”), which is owned by Generate Lending, LLC (“**Parent**”), a limited liability company that is owned by Generate Capital, Inc. (“**Sponsor**” or “**Generate**”). In July 2020, NYGB increased the Facility size to \$55.2 million and extended the maturity date to July 2023. Loan proceeds will refinance a portion of a senior secured term loan (“**Underlying Loan**”) between the Parent and Plug Power, Inc. This transaction is expected to result in increased Sponsor investment in New York State (“**NYS**” or the “**State**”) clean energy projects that amount to at least \$60.0 million.

Transaction Description

Generate builds, finances, owns and operates sustainable infrastructure in North America. NYGB entered into the \$35.0 million Facility, and subsequently increased the commitment to \$55.2 million, to support Generate and leverage its illiquid position in a senior secured loan with Plug Power.

Generate Capital has a NYS portfolio and pipeline that includes rooftop solar, community solar, anaerobic digesters, and fuel cells. The Facility provides liquidity to Generate to invest in NYS projects that have the potential to reduce greenhouse gas (“**GHG**”) emissions. Generate plans to invest at least \$60.0 million in NYS clean energy projects and will report to NYGB its investment activity in the State. Given its pipeline, Generate expects to invest in 44.0 MW of clean energy generating projects which will deliver environmental and economic development benefits to New Yorkers across the State. By demonstrating to investors that Generate can monetize their interests in business models with limited liquidity, NYGB expects this transaction to attract more investors seeking clean energy investments in NYS. This transaction serves as a precedent and signal to address this critical market need.

This Transaction Profile is provided pursuant to the “NY Green Bank – Metrics, Reporting & Evaluation Plan, Version 3.0” (the “**Metrics Plan**”) developed in collaboration with the NYS Department of Public Service and filed with the NYS Public Service Commission (the “**Commission**”) on June 20, 2016.¹ This Transaction Profile contains specific information in connection with the Generate transaction entered into on December 3, 2019, as required by the Metrics Plan.²

Form of NYGB Investment

NYGB Product	Product Sub-Type	Committed Capital
Asset & Investment	Term Loan	\$55.2 million

Location(s) of Underlying Project(s)

Multiple Regions. The rooftop solar projects are located in New York City. Other investment opportunities in Generate’s pipeline are located in other regions of the State.

¹ Case 13-M-0412.

² See Section 4.0, page 8 and Schedule 3.

Types of Client & Counterparty Organizations that are Transaction Participants

	Name	Participant Type
Client	Generate PPL SPV I	Borrower
Counterparties (current)	Generate Lending, LLC	Parent
	Generate Capital, Inc.	Sponsor

Summary of Financing Market Objectives & Barriers Addressed

Beneficiary	Market Barrier	Financing Solution
Clean Energy Project Developers	Clean energy developers face difficulties receiving cost-effective financing for their clean energy projects.	NYGB's support of private capital investors encourages more investing activity in the NYS clean energy market.
Capital Market Participants	Many capital market participants are not comfortable underwriting clean energy investments with structural features that result in illiquid positions.	NYGB's participation sets an important precedent for investors that NYGB will support investors seeking to expand and accelerate NYS investment opportunities.
New Yorkers	There continues to be a shortage of precedent clean energy project investments to attract private capital.	By catalyzing investment in clean energy in NYS, NYGB is providing New Yorkers with greater choices and access to clean energy.

Technologies Involved

Technology	Measures
Renewable Energy	Solar photovoltaic systems
Bioenergy	Anaerobic digesters
Other	Energy Storage Fuel Cells

Metrics & Evaluation Plan

Planned Energy & Environmental Metrics

NYGB's minimum investment criteria specifically require that "transactions will have the potential for energy savings and/or clean energy generation that will contribute to greenhouse ('GHG') reductions in support of New York's energy policies".³ In addition, the Metrics Plan requires that the following energy and environmental measures applicable to this transaction be reported⁴:

- Estimated gross lifetime and first-year clean energy generated (MWh);
- Estimated gross clean energy generation installed capacity (MW); and
- Estimated gross lifetime and first-year GHG emission reductions (metric tons).

The estimated gross lifetime and first-year energy and environmental impacts of the Term Loan, are as follows:

³ Case 13-M-0412, "Order Establishing New York Green Bank and Providing Initial Capitalization" issued and effective December 19, 2013 of the Commission, Ordering Clause 6 at pages 24 – 25.

⁴ See Metrics Plan, Section 2.0, pages 2 - 6.

Energy/Environmental Impact	Lifetime Low Estimate	Lifetime High Estimate	Annualized Low Estimate	Annualized High Estimate
Estimated energy generated (MWh)	461,052.63	3,764,532.74	46,105.26	376,453.27
Estimated clean energy generated (MWh)	501,623.88	559,615.08	20,064.96	22,384.60
Estimated fuel consumption (MMBtu) ⁵	4,149,269.06	23,715,386.72	414,926.91	2,371,538.67
Estimated energy generation installed capacity (MW)	5.00	27.10	N/A	
Estimated clean energy generation installed capacity (MW)	17.30	17.00	N/A	
Estimated GHG emission reductions (metric tons)	298,865.65	656,387.71	14,831.02	317,579.76

Planned Market Characterization Baseline & Market Transformation Potential

The Metrics Plan requires that market evaluation occurs when a critical mass of NYGB financing and investment arrangements are in place, approximately three to five years following initial NYGB capital deployments. Market evaluation activities commenced in 2018 on sectors that have been supported by NYGB since its inception, and the data set will be updated going forward to include indicators specific to this and other transactions. Baseline data will be used as a comparison point against which to assess market progress in later studies.

Proposed Method of Outcome/Impact Evaluation (by NYSERDA) & Timeframe

NYSERDA will evaluate the impact this transaction has had on the clean energy finance markets and the energy/environmental benefits which it delivers.

Market evaluation will address the short, medium and long-term indicators identified above. Methods will include analysis of program data along with interviews and surveys of market participants (project developers, financial community) to track information including but not limited to NYS investment. As noted, baseline data was collected on key indicators in the first phase evaluation during 2018 – 19. Later follow-up studies will assess progress against baseline levels for other market segments as those evolve. The specific timing of these efforts may be revised based on experience or other factors as NYGB's investment portfolio further develops and evolves.

Impact evaluation will assess the performance of the projects invested in by Generate Capital located in NYS. As with all NYGB investments, projects supported by Generate investments that received incentive or funding from other entities (e.g., utility, other NYSERDA program) will, in accordance with the Metrics Plan, be tracked in order to minimize any double-counting activity on a consolidated basis. As set out in the Metrics Plan, evaluation sampling approaches will also be used as a mechanism to estimate overlap and minimize double counting. Attempts will be made to coordinate market and impact evaluation activities for these projects that receive support from multiple sources in order to maximize the efficiency of data collection and avoid participant survey fatigue.

⁵ Estimated fuel consumption will be included in the estimated energy savings (MMBtu) from CHP categories in NYGB consolidated reporting.

Continued Support of Distributed Generation in New York State

OYA Solar Inc.

In September 2020, NY Green Bank (“NYGB”) committed to an up to \$35.0 MM construction and interconnection facility to finance the development of up to thirteen community distributed generation (“CDG”) solar projects in New York State (“NYS” or the “State”). These transactions are expected to provide NYS residents and businesses a greater variety of energy choices and, ultimately, lower-cost clean energy opportunities.

Transaction Description

OYA is a privately held Toronto-based solar developer founded in 2009. OYA provides an in-house development and execution platform to manage the complete project lifecycle including origination, construction, operations and asset management.

With its commitment, NYGB expects to support the deployment of up to 78.0 MW of CDG projects in NYS. These transactions will help NYGB continue to demonstrate the viability of distributed generation in the State, draw new investors and financial institutions into the marketplace, and lower the cost of capital in this market sector. By driving solar deployment activity in the State, NYGB’s commitment will help NYS meet its 6.0 GW solar target by 2025. Consumers are expected to be the ultimate beneficiaries in the form of broader access to lower-cost clean energy generation, with corresponding resiliency, affordability, choice, and environmental benefits.

This Transaction Profile is provided pursuant to the “NY Green Bank – Metrics, Reporting & Evaluation Plan, Version 3.0” (the “**Metrics Plan**”) developed in collaboration with the NYS Department of Public Service and filed with the New York Public Service Commission (the “**Commission**”) on June 20, 2016.¹ This Transaction Profile contains specific information in connection with the OYA transaction entered into in September 2020, as required by the Metrics Plan.

Form of NYGB Investment

NYGB Product	Product Sub-Type	Committed Capital
Asset Loan & Investment	Construction Loan with Interconnection Bridge	\$35.0 million

Location(s) of Underlying Project(s)

Statewide.² Projects will be located throughout NYS.

Types of Client & Counterparty Organizations that are Transaction Participants

	Name	Participant Type
Sponsor	OYA Solar NY, LP	Energy Project Developer

¹ Case 13-M-0412.

² Defined as projects located in four or more regions of the State.

Summary of Financing Market Objectives & Barriers Addressed

Beneficiary	Market Barrier	Financing Solution
Solar Project Developers	Interconnection and construction financing are an inefficient use of sponsor equity, which limits project deployment efforts and effectively restricts the amount of distributed generation development in NYS.	These transactions encourage a more efficient use of sponsor equity and support project development efforts in NYS by providing interconnection and construction financing to a project developer. NYGB's role helps to create an easier pathway forward for developers and enables greater deployment of distributed generation assets throughout the State.
Capital Markets Participants	As a relatively new form of clean energy project, CDG lacks financing precedents and has limited performance history in NYS. As such, it can be more difficult for private sector capital providers to assess and price the underlying risk exposures associated with distributed generation project investments.	Projects supported by these transactions will generate project and customer performance data to draw new investors and financial institutions into the marketplace by demonstrating that competitive risk-return profiles can be achieved by distributed generation enabled business models.
CDG Subscribers	Due to project siting, property ownership and consumer preference issues, on-site solar project installations may not be viable for many NYS homeowners, renters, and businesses. This limits solar access to those with suitably sited homes or businesses.	These transactions support the deployment of CDG solar projects, which provide those who are not otherwise able to install solar energy generation systems on their property (e.g., homeowners whose rooftops cannot support solar systems, renters and those who cannot afford solar stand-alone systems), with increased access to clean, low-cost energy, regardless of where their home or business is located.

Technologies Involved

Technology	Measures
Renewable Energy	Solar photovoltaic systems

Metrics & Evaluation Plan

Planned Energy & Environmental Metrics

NYGB's minimum investment criteria require that NYGB-supported transactions have the potential for energy savings and/or clean energy generation that will contribute to greenhouse gas ("GHG") reductions in support of the State's energy policies.³ In addition, the Metrics Plan requires that the following energy and environmental measures, applicable to these transactions, be reported:⁴

- Estimated gross lifetime and first-year clean energy generated (MWh);
- Estimated gross clean energy generation installed capacity (MW); and
- Estimated gross lifetime and first-year GHG emission reductions (metric tons).

The estimated gross lifetime and first-year energy and environmental impacts of the Facility are as follows:

³ Case 13-M-0412, "Order Establishing New York Green Bank and Providing Initial Capitalization" issued and effective December 19, 2013 of the Commission, Ordering Clause 6 at pages 24 – 25.

⁴ See Metrics Plan, Section 2.0, pages 2 - 6.

Energy/Environmental Impact	Lifetime Low Estimate	Lifetime High Estimate	Annualized Low Estimate	Annualized High Estimate
Estimated clean energy generated (MWh)	793,170.43	2,261,656.80	31,726.82	90,466.27
Estimated clean energy generation installed capacity (MW) ⁵	31.26	78.00	N/A	
Estimated GHG emission reductions (metric tons)	396,765.07	1,313,341.25	15,870.60	45,253.65

Planned Market Characterization Baseline & Market Transformation Potential

The Metrics Plan requires that market evaluation occur when a critical mass of NYGB financing and investment arrangements are in place. Market evaluation activities commenced in 2018 on sectors that NYGB has supported since inception, consistent with the requirement for such assessments approximately three to five years following initial NYGB capital deployments.⁶ NYSERDA collected baseline data for the solar sector in 2019 and will update the data to include indicators specific to this transaction. NYSERDA will use baseline data collected for indicators as a comparison point against which to assess market progress in later studies. Progress indicators are defined below for the short, medium and long terms.

NYGB expects that program and/or future market evaluation will demonstrate progress across short-term indicators; including:

- Size (i.e., generation capacity and expected dollar value) and location of projects financed by the Facility;
- Aggregate expected energy generation for projects financed by the Facility; and
- The number of projects that finalize construction financing arrangements.

NYGB expects that program tracking and/or future market evaluation will demonstrate progress across medium- and long-term indicators; including:

- Increased market volume of CDG projects;
- Increased general understanding of renewable energy benefits by financial community;
- Increased awareness and use of CDG subscriber performance data by financing entities;
- Increased awareness and use of project/technology performance data by financing entities;
- Demonstration of competitive risk-return profiles for CDG investment;
- Decreased project costs;
- Increased volume of secondary market financing of distributed solar assets; and
- Presence and number of new lending participants.

Proposed Method of Outcome/Impact Evaluation (by NYSERDA) & Timeframe

NYSERDA will evaluate the direct and indirect impacts that the Facility will have on the clean energy finance markets and the energy/environmental benefits delivered by these loans.

Market evaluation will assess the short, medium and long-term indicators identified above. Methods will include analysis of program data along with interviews and surveys of market participants (e.g., project subscribers, financial community) to track information including but not limited to: participation rates, project scale information, interest in solar financing (generally and with regard to CDG specifically), and influence of NYGB's participation on financial markets. As noted, NYSERDA collected baseline data on key indicators in its first phase evaluation during 2018 – 19. Later follow-up studies will assess progress against baseline levels for other market segments as those evolve. The specific timing of these efforts may be revised based on experience or other factors as NYGB's investment portfolio further develops and evolves.

Impact evaluation will assess which of the projects funded under the Construction Loan with Interconnection Bridge raised construction financing and were completed, commissioned, and placed in service.

⁵ Installed clean energy generation capacity at full deployment of funds is the same for first-year and lifetime duration.

⁶ See Metrics Plan, Section 3.3 at page 7.

In accordance with the Metrics Plan, NYGB will track OYA projects that receive incentives or funding from other entities (e.g., utility, other NYSERDA program) to minimize any double-counting activity on a consolidated basis. As set out in the Metrics Plan, evaluation sampling approaches will also be used as a mechanism to estimate overlap and minimize double counting. NYSERDA and NYGB will attempt to coordinate market and impact evaluation activities for projects that receive support from multiple sources in order to maximize the efficiency of data collection and avoid participant survey fatigue.

Supporting Energy Efficient New Building Construction in New York State

Saranac Waterfront Lodges

NY Green Bank (“**NYGB**”) initially committed \$5.0 million on September 25, 2019 to finance the construction and operation of an energy efficient lodging property seeking LEED® certification at completion. The project is located in the Village of Saranac Lake (the “**Project**”) and is being developed by Saranac Lake Resort Owner, LLC (“**Saranac**”). When the Project’s construction and operational delays resulted in a short-term \$2.0 million liquidity requirement, NYGB increased its funding commitment on July 17, 2020 with \$2.0 million of additional preferred equity units to finance incremental construction costs and support the opening and extended ramp-up of the property. The Project’s energy efficiency measures are expected to reduce greenhouse gas (“**GHG**”) emissions relative to design standards. This is NYGB’s first investment in an energy efficient, new building (“**New Construction**”) asset as part of its ongoing efforts to participate in sustainable infrastructure investments in support of Clean Energy Fund objectives. The Project is expected to create approximately 71 full time jobs in New York State (“**NYS**”), supporting economic development in the North Country.

Transaction Description

Saranac Waterfront Lodge is registered under the LEED green building program and seeks to be the first LEED-certified hotel in the Adirondack Park, located on the shores of Lake Flower and partially located on a former Superfund site, remediated in 2018 under the guidance of the New York State Department of Environmental Conservation (“**NYSDEC**”). The Project will incorporate energy efficiency measures including efficient HVAC equipment and insulation, advanced lighting, and improved building controls, in addition to stormwater management improvements and electric vehicle charging stations.

NYGB’s \$7.0 million preferred equity investment (the “**Investment**”) diversifies NYGB’s portfolio and presents an opportunity to increase market awareness of energy efficiency in the New Construction space. NYGB’s investment signals to the market that NYGB capital is available to finance New Construction projects pursuing energy efficiency upgrades, increasing primary building efficiency deployment in NYS. The investment also supports economic development and job creation in the downtown Saranac Lake region and demonstrates the viability of financing a sustainable new build in a tertiary market like the North Country. In addition to seasonal and part-time positions, the Project is expected to create approximately 71 full-time jobs upon opening, and 116 jobs from construction.

This Transaction Profile is provided pursuant to the updated “NY Green Bank – Metrics, Reporting & Evaluation Plan, Version 3.0” (the “**Metrics Plan**”) developed in collaboration with the NYS Department of Public Service and filed with the NYS Public Service Commission (the “**Commission**”) on June 20, 2016.¹ This Transaction Profile contains specific information in connection with the Saranac Lake Resort transaction entered into on September 25, 2019, as required by the Metrics Plan.²

Form of NYGB Investment

NYGB Product	Product Sub-Type	Committed Capital
Asset Investment	Preferred Equity Investment	\$5.0 million
Asset Investment	Preferred Equity Bridge Investment	\$2.0 million

¹ Case 13-M-0412.

² See Section 4.0, page 8 and Schedule 3.

Location(s) of Underlying Project(s)

North Country. The Project is located in Saranac Lake, New York.

Types of Client & Counterparty Organizations that are Transaction Participants

	Name	Participant Type
Client	Saranac Lake Resort Owner, LLC	Company
Vendor	BBL Construction	Construction Manager
Vendor	Skyward Hospitality	Hotel Manager

Summary of Financing Market Objectives & Barriers Addressed

Beneficiary	Market Barrier	Financing Solution
Owners & Developers	When designing new buildings in NYS, owners and developers of New Construction projects are not always able to rely on energy modeling and cost-benefit analysis in order to secure appropriately priced capital, reducing their ability to realize the benefits of energy efficient technology.	NYGB's participation in this transaction signals to the market that capital is available to finance the construction of real estate developments pursuing energy efficiency upgrades. This should result in greater interest from private sector capital providers in committing capital for similar project types, which will ultimately expand liquidity in energy efficiency markets while reducing overall costs for all.
Capital Market Participants	On an individual basis, there is limited capital support for energy efficiency projects; however, capital providers are more likely to participate on an aggregated basis once a pipeline of projects has achieved meaningful scale.	NYGB's willingness to support the Project helps to demonstrate to the broader market that there is lender comfort with an appetite for investments in energy efficient, new building projects.
New Yorkers	While interest and activity in energy efficient New Construction projects are increasing rapidly in NYS, a relatively small number of financial models are being used, preventing New Yorkers from realizing the benefits of completed projects.	By providing financing, NYGB is encouraging primary building efficiency deployment for commercial and institutional projects in NYS. Ultimately, this is expected to provide New Yorkers with more efficient building stock at a lower cost. The investment also supports economic development and job creation in a tertiary market like the North Country.

Technologies Involved

Technology	Measures
Energy Efficiency	HVAC, Advanced Lighting, Improved Building Controls, higher-rated insulation

Metrics & Evaluation Plan

Planned Energy & Environmental Metrics

NYGB’s minimum investment criteria specifically require that “transactions will have the potential for energy savings and/or clean energy generation that will contribute to GHG reductions in support of New York’s energy policies.”³ In addition, the Metrics Plan requires that the following energy and environmental measures, applicable to this transaction, be reported:⁴

- Estimated gross lifetime and first-year electricity savings (MWh);
- Estimated gross lifetime and first-year fuel savings (MMBtu); and
- Estimated gross lifetime and first-year GHG emission reductions (metric tons).

The estimated lifetime and first-year energy and environmental impacts of the Project, facilitated by NYGB’s financial participation in this transaction, are as follows:

Energy/Environmental Impact	Lifetime Low Estimate	Lifetime High Estimate	Annualized Low Estimate	Annualized High Estimate
Electricity savings (MWh)	660.73	777.33	44.05	51.82
Fuel savings (MMBtu)	4,891.26	5,754.42	326.08	384.63
Estimated GHG emission reductions (metric tons)	632.53	744.15	42.17	49.61

Planned Market Characterization Baseline & Market Transformation Potential

The Metrics Plan requires that market evaluation occur when a critical mass of NYGB financing and investment arrangements are in place. Market evaluation activities commenced in 2018 on sectors that NYGB has supported since inception, consistent with the requirement for such assessments approximately three to five years following initial NYGB capital deployments. NYSERDA will use baseline data collected for indicators as a comparison point against which to assess market progress in later studies. Progress indicators are defined below for the short, medium and long terms.

NYGB expects that program and/or future market evaluation will demonstrate progress across short-term indicators; including:

- Size and location of projects financed by the Facility;
- Aggregate expected energy generation for projects financed by the Facility; and
- The number of projects that finalize construction financing arrangements.

NYGB expects that program tracking and/or future market evaluation will demonstrate progress across medium- and long-term indicators; including:

- Increased market volume of high-performance new construction projects;
- Increased general understanding of high-performance new construction project benefits by financial community;
- Increased awareness and use of high-performance new construction subscriber performance data by financing entities;

³ Case 13-M-0412, “Order Establishing New York Green Bank and Providing Initial Capitalization” issued and effective December 19, 2013 of the Commission, Ordering Clause 6 at pages 24 - 25.

⁴ See Metrics Plan, Section 2.0, pages 2 - 6.

- Increased awareness and use of project/technology performance data by financing entities;
- Demonstration of competitive risk-return profiles for high-performance new construction investment;
- Decreased project costs;
- Increased volume of secondary market financing of high-performance new construction; and
- Presence and number of new lending participants.

Proposed Method of Outcome/Impact Evaluation (by NYSERDA) & Timeframe

NYSERDA will evaluate the impact this transaction has had on the clean energy finance markets and the energy and environmental benefits delivered by this transaction.

Market evaluation will address the short, medium and long-term indicators identified above. Methods will include analysis of program data along with interviews and surveys of market participants to track information including but not limited to: participation rates, project scale information, interest in New Construction financing, and influence of NYGB's participation on financial markets. As noted, baseline data was collected on key indicators in the first phase evaluation during 2018 – 2019. Subsequent studies will assess progress against baseline levels for other market segments like New Construction. The specific timing of these efforts will be determined (and may be revised) on an ongoing basis as NYGB's investment portfolio continues to grow and evolve.

Impact evaluation is expected to draw upon and include data collected to support project-specific measurement and verification activities (e.g., those associated with PON 3609⁵). Impact evaluation activities will likely rely upon energy consumption data collected through environmental reports. Project savings will be assessed by comparing actual energy consumption data against forecasted consumption, as set forth in the energy model completed for LEED certification.

As with all NYGB investments, projects that receive incentives or funding from other entities (e.g., utility, other NYSERDA program) will be tracked, in accordance with the Metrics Plan, in order to minimize any double-counting activity on a consolidated basis. As set forth in the Metrics Plan, evaluation sampling approaches will be used as a mechanism to estimate overlap and minimize double counting. Attempts will also be made to coordinate market and impact evaluation activities for the Project to maximize the efficiency of data collection and avoid survey fatigue.

⁵ NYSERDA's Commercial New Construction Program Opportunity Notice PON 3609 offers objective technical and financial support to building owners to effect a permanent transformation in the way buildings are designed and constructed in NYS.



Increasing Opportunities for NY Residents to Go Solar, Expanding Market Liquidity

Sunrun Inc.

NY Green Bank (“NYGB”) has entered into five transactions to accelerate the deployment of more than 20,000 solar projects at homes across New York State (“NYS”) by Sunrun Inc. (“Sunrun”). Sunrun is a national solar provider that markets and develops residential solar energy systems. The five transactions complement each other – two provide financing to fund the purchase of materials and installation of the solar projects and three provide post-construction financing. The first of the post-construction financings was arranged by Investec Bank PLC (“Investec”), an international specialty bank and asset manager, the second by SunTrust Robinson Humphrey Inc. (“SunTrust”) and ING Capital LLC (“ING”), and the third by Investec and Silicon Valley Bank (“SVB”). NYGB participates alongside a lender group to provide the revolving credit facility to finance construction of Sunrun’s projects. The equipment financing facility was jointly arranged by KeyBank N.A. (“Key”) and ING.

Transaction Descriptions

Investec Credit Facilities

On May 13, 2016, NYGB closed a \$25.0 million commitment to participate in a transaction consisting of two credit facilities – a loan aggregation revolving facility and a term loan (together the “NYGB Loan Products”), which are expected to accelerate the deployment of over 5,000 solar projects at homes across NYS. The transaction was part of a broader \$340.0 million financing (the “Post-Construction Aggregation Facilities”) arranged by Investec that provides Sunrun with a larger financing to expand its business in NYS and elsewhere. The \$340.0 million Post-Construction Aggregation Facilities (which include the NYGB Loan Products) represent one of the largest aggregation financings for a residential solar developer at the time of closing. On March 27, 2018, NYGB and the lender group consented to extend the deployment period and the maturity of the Post-Construction Aggregation Facilities by over two years based on Sunrun’s demonstrated ability to continually deploy solar PV projects in NYS and nationally. On April 20, 2018, NYGB and the lender group consented to expand the Post-Construction Aggregation Facilities up to \$595.0 million to further support Sunrun’s continued growth. NYGB’s share of this increase is \$10.0 million, bringing NYGB’s overall commitment to the Post-Construction Aggregation Facilities to \$35.0 million.

Construction Loan Facility

On June 16, 2016, NYGB committed \$25.0 million which, along with financing from other lenders, allows Sunrun to increase its existing revolver from \$205.0 million to \$250.0 million. The revolver (“**Construction Loan Facility**” or “**CLF**”) will be used by Sunrun to fund customer acquisition, purchase of materials, and construction and installation of the systems, and will ultimately be refinanced through Credit Facilities (such as described below) and tax equity commitments arranged by Sunrun. On February 23, 2018, NYGB and the lender group consented to extend the maturity of the CLF by two years in support of Sunrun’s consistent and growing deployment rate in NYS and nationally. NYGB’s continued participation in this consortium of capital providers broadens the availability of construction financing for distributed energy projects for homeowners across NYS.

SunTrust/ING Credit Facilities

On May 9, 2017, NYGB closed a \$15.0 million commitment to participate in an aggregation-to-term loan facility. The transaction was part of a \$202.0 million financing (the “**SunTrust/ING Credit Facilities**”) arranged by SunTrust and ING. The \$202.0 million SunTrust/ING Credit Facilities support a \$100.0 million equity partnership with National Grid plc, an international utility with a sizeable NYS presence.

Equipment Financing / Safe Harbor Facility

On February 5, 2020, NYGB closed a \$10.0 million commitment to participate in a transaction facilitating the purchase of (and directly secured by) solar materials (panels and inverters). This transaction was part of an \$84.0 million financing arrangement by Key and ING (the “**Safe Harbor Facility**” or “**SHF**”). This facility allows Sunrun to take advantage of the IRS’s safe harbor program with respect to the 2019 commercial investment tax credit (“**ITC**”), and ultimately, supports Sunrun’s continued growth in NYS and nationally and its continued ability to deliver attractive economics to residential homeowners.

SVB/Investec Credit Facilities

On August 13, 2020, NYGB closed a \$19.0 million commitment to participate in an aggregation-to-term loan facility. The transaction was part of a \$265.0 million financing (the “**SVB/Investec Credit Facilities**”) arranged by SVB and Investec.

These transactions provide Sunrun with term financing to further expand its business in NYS and elsewhere. Through increased scale, the aggregation-to-term transactions are expected post-aggregation to draw new investors and financial institutions into the marketplace, decreasing the cost of capital for solar developers and installers, and in turn, the cost of solar power equipment sold or leased to homeowners.

Overall Context

Sunrun sought NYGB’s participation in the CLF, SHF, Investec Credit Facilities, SunTrust/ING Credit Facilities, and SVB/Investec Credit Facilities to provide further liquidity to support Sunrun’s capital needs in growing its business. With both construction and longer-term financing in place, Sunrun is positioned to meet growing demand from homeowners and expand its ability to finance the installation of solar projects throughout NYS.

These complementary transactions will result in the aggregation of bundled pools of residential solar systems that will ultimately be refinanced through one or more longer-term take-out financings. Such refinancing may include a securitization – the sale of underlying cash flows resulting from residential leases or power purchase agreements (“**PPAs**”) to third party investors – providing additional avenues to develop and scale the emerging residential solar asset class, both for Sunrun and other market participants. Given that the bank market for such credit facilities remains limited, NYGB’s participation enables larger aggregation facilities than would otherwise be available, resulting in longer term takeout refinancing at a scale greater than might otherwise be achieved. Greater scale means greater investor interest, which will ultimately result in more attractive debt pricing that will benefit New Yorkers via more attractively priced contracts under which power is purchased.

This Transaction Profile is provided pursuant to the updated “NY Green Bank – Metrics, Reporting & Evaluation Plan, Version 3.0” (the “**Metrics Plan**”) developed in collaboration with the NYS Department of Public Service and filed with the NYS Public Service Commission (the “**Commission**”) on June 20, 2016.¹ This Transaction Profile contains specific information in connection with the Investec Credit Facilities (entered into on May 13, 2016), the ING/SunTrust Credit Facilities (entered into on May 9, 2017), CLF (entered into on June 16, 2016), the SHF (entered into on February 5, 2020), and the SVB/Investec facility (entered into on August 13, 2020) as required by the Metrics Plan.²

¹ Cases 13-M-0412 and 14-M-0094.

² See Section 4.0, page 8 and Schedule 3.

Form of NYGB Investment

NYGB Product	Product Sub-Type	Committed Capital
Warehousing/Aggregation	Senior Secured Revolver and Subordinated Term Loan	\$35.0 million
Warehousing/Aggregation	Senior Secured Aggregation-to-Term Loan	\$15.0 million
Warehousing/Aggregation	Senior Secured Aggregation-to-Term Loan	\$19.0 million
Asset Loan & Investment	Construction Financing Revolver	\$25.0 million
Warehousing/Aggregation	Equipment-Backed Revolver	\$10.0 million

Location(s) of Underlying Project(s)

Statewide.³ Sunrun's solar power generation systems will be offered to homeowners through PPA structures in regions across NYS.

Types of Organizations that are Transaction Participants

	Name	Participant Type
Clients	Investec	Global Corporate & Investment Bank
	SunTrust	Global Corporate & Investment Bank
	ING	Global Corporate & Investment Bank
	KeyBank	National Corporate & Investment Bank
	Silicon Valley Bank	National Corporate & Investment Bank
Key Counterparties	Sunrun	Solar Energy Project Developer
	National Grid	International Utility & Equity Co-Sponsor
Financiers (current)	Various tax equity providers and commercial banks	Global Corporate & Investment Banks, Commercial/Regional Banks
Financiers (future)	To be identified	Institutional Investors

Summary of Financing Market Objectives & Barriers Addressed

Beneficiary	Market Barrier	Financing Solution
Capital Market Participants	In clean energy markets, there is only a small (but growing) number of lenders actively financing residential solar projects.	NYGB participation in all four transactions facilitates the ability to achieve substantial transaction scale. This will enable much larger post-aggregation term financings, which may include securitizations, resulting in broader market penetration and enhanced liquidity, both key NYGB goals.
Solar Project Developers	Many solar developers face the challenge of securing sufficient financing to meet customer demand – hampering their ability to grow and achieve economies of scale.	NYGB's participation in the CLF, SHF, the Investec Facilities, the SunTrust/ING Facilities and the SVB/Investec Facilities will enable Sunrun to better meet residential demand in NYS. This type of financing can also be replicated with other developers seeking to secure similar capital access.
Homeowners	"Going solar" is not perceived by some homeowners as being practical or affordable, and some questions as to benefits to be realized remain.	NYGB participation in all five transactions will produce benefits for eligible homeowners seeking to utilize solar power, as homeowners will have greater ability to contract for solar, while simultaneously realizing immediate reductions on their energy bills. Greater scale and deeper and broader financing markets will lead to even more compelling offerings being made

³ Defined as projects located in four or more regions of the State.

	available to homeowners and more information available on benefits.
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Technologies Involved

Technology	Measures
Renewable Energy	Solar photovoltaic (“PV”) systems

Metrics & Evaluation Plan

Planned Energy & Environmental Metrics

NYGB’s minimum investment criteria specifically require that “transactions will have the potential for energy savings and/or clean energy generation that will contribute to greenhouse gas (“GHG”) reductions in support of New York’s energy policies”.⁴ In addition, the Metrics Plan requires that the following energy and environmental measures, applicable to this transaction, be reported⁵:

- Estimated gross lifetime and first-year clean energy generated (MWh);⁶
- Estimated gross clean energy generation installed capacity (MW); and
- Estimated gross lifetime and first-year GHG emission reductions (metric tons).

The estimated gross lifetime and first-year energy and environmental impacts of Sunrun’s development in NYS, facilitated by NYGB’s participation in the CLF, SHF, Investec Credit Facilities, SunTrust/ING Credit Facilities, and SVB/Investec Credit Facilities, are as follows:

Energy/Environmental Impact	Lifetime Low Estimate	Lifetime High Estimate	First-Year Low Estimate	First-Year High Estimate
Estimated gross clean energy generated (MWh)	2,827,557.00	3,331,902.88	113,082.28	133,276.12
Estimated gross clean energy generation installed capacity (MW) ⁷	102.00	121.20	N/A	
Estimated gross GHG emission reductions (metric tons)	1,469,932.59	1,727,165.02	58,797.30	69,046.60

Planned Market Characterization Baseline & Market Transformation Potential

The Metrics Plan requires that market evaluation occur when a critical mass of NYGB financing and investment arrangements are in place. Market evaluation activities commenced in 2018 on sectors that NYGB has supported since inception, consistent with the requirement for such assessments approximately three to five years following initial NYGB capital deployments. NYSERDA collected baseline data for the solar sector in 2019 and will update the data to include indicators specific to this transaction. NYSERDA will use baseline data collected for indicators as a comparison point against which to assess market progress in later studies. Progress indicators are defined below for the short, medium and long terms.

NYGB expects that program and/or future market evaluation will demonstrate progress across short-term indicators; including:

- Size (i.e., generation capacity and expected dollar value) and location of projects financed by the Facility;

⁴ Case 13-M-0412, “Order Establishing New York Green Bank and Providing Initial Capitalization” issued and effective December 19, 2013 of the Commission, Ordering Clause 6 at pages 24 – 25.

⁵ See Metrics Plan, Section 2.0, pages 2 – 6.

⁶ First year gross energy generation refers to the first year of estimated gross energy generation once a measure is installed and as such generation will not necessarily correspond to the first year of the investment term. The majority of NYGB’s investments have a two to three-year development cycle in which projects are originated, installed and placed into commercial operation.

⁷ Built clean energy generation capacity at full deployment of funds is the same for first-year and lifetime duration.

- Aggregate expected energy generation for projects financed by the Facility; and
- The number of projects that finalize construction financing arrangements.

NYGB expects that program tracking and/or future market evaluation will demonstrate progress across medium- and long-term indicators; including:

- Increased market volume of residential solar PV projects;
- Increased general understanding of renewable energy benefits by financial community;
- Increased awareness and use of residential solar PV loan performance data by financing entities;
- Increased awareness and use of project/technology performance data by financing entities;
- Demonstration of competitive risk-return profiles for residential solar PV investments;
- Decreased project costs;
- Increased volume of secondary market financing of distributed solar assets; and
- Presence and number of new lending participants.

Proposed Method of Outcome/Impact Evaluation (by NYSERDA) & Timeframe

Market evaluation will address the short, medium and long-term indicators identified above. Methods will include analysis of program data along with interviews and surveys of market participants (homeowners, financial community) to track information including but not limited to: participation rates, project scale information, interest in solar financing (generally and with regard to residential specifically), and influence of NYGB's participation on financial markets. As noted, baseline data was collected on key indicators in the first phase evaluation during 2018 – 2019. Subsequent studies will assess progress against baseline levels for residential solar PV. The specific timing of these efforts may be revised based on experience or other factors as the investment evolves.

Impact evaluation will be based on the size of the systems installed and the projected clean energy generation.

As with all NYGB investments, Sunrun projects that receive incentive or funding from other entities (e.g., utility, other NYSERDA program) will, in accordance with the Metrics Plan, be tracked in order to minimize any double-counting activity on a consolidated basis. As set out in the Metrics Plan, evaluation sampling approaches will also be used as a mechanism to estimate overlap and minimize double counting. Attempts will also be made to coordinate market and impact evaluation activities for these projects that receive support from multiple sources in order to maximize the efficiency of data collection and avoid participant survey fatigue.

Supporting the NYS Clean Energy Market Recovery Following the COVID-19 Crisis

Paycheck Protection Program

*On March 27, 2020, the U.S. Congress enacted the Coronavirus Aid, Relief, and Economic Security Act (the “**CARES Act**”), which provides economic relief to small businesses and others that have been impacted by the COVID-19 pandemic. Among other things, the CARES Act expands the Section 7(a) loan program administered by the Small Business Administration (“**SBA**”) by establishing the Paycheck Protection Program (“**PPP**”). Under the PPP, the SBA is authorized to guarantee loans from banks and certain non-bank lenders to small businesses and other eligible borrowers.*

*After the PPP was established, NY Green Bank (“**NYGB**”), a division of the New York State Energy Research and Development Authority (“**NYSERDA**”), earmarked \$50 million in capital, applied to the SBA, and was approved as a PPP lender to provide PPP loans to small businesses and other eligible borrowers in the clean energy industry of New York State (“**NYS**” or the “**State**”).*

Transaction Description

In early April 2020, NYGB issued a survey to obtain feedback from stakeholders about the COVID-19 crisis and its effect on their businesses. NYGB received over 140 responses, including over 80 responses from clean energy project developers and operators. Developers expressed concern over missing construction and financing milestones and, to a lesser degree, permitting and interconnection milestones. Over two-thirds of developers anticipated new financing needs, including bridge loans and construction-to-term loans.

NYGB’s mission includes filling clean energy financing gaps for economically viable projects and business models where private capital is unavailable. The COVID-19 crisis has exacerbated financing market gaps; less capital is expected to be available for many clean energy projects and business models, resulting in even greater dependence by market participants on NYGB financing than before the COVID-19 crisis.

As of the date of this transaction profile, NYGB has funded three PPP loans to individual borrowers that, in addition to meeting all SBA criteria, also represented that their PPP loans will potentially reduce greenhouse gas (“**GHG**”) emissions, consistent with NYGB’s key investment criteria. These loans provide financing to clean energy businesses in need.

This Transaction Profile is provided pursuant to the “NY Green Bank – Metrics, Reporting & Evaluation Plan, Version 3.0” (the “**Metrics Plan**”) developed in collaboration with the NYS Department of Public Service and filed with the New York Public Service Commission (the “**Commission**”) on June 20, 2016.¹

¹ Case 13-M-0412.

Form of NYGB Investment

NYGB Product	Product Sub-Type	Aggregate Allocated Capital
Asset Loan & Investment	Term Loan	Up to \$50.0 Million

Location(s) of Underlying Project(s)

Statewide.² The PPP Borrowers to date include businesses and contractors that participate in Home Performance with Energy Star and EmPower programs in NYS, support the deployment of electric vehicles and support the installation of energy efficiency measures in New Yorkers' homes.

Types of Client & Counterparty Organizations that are Transaction Participants

Name	Participant Type
BPTC, LLC.	Contractor, Participant in Home Performance with Energy Star and EmPower Programs
White Oak Power, LLC	Consulting & Advisory: Electric Vehicles, Residential Energy Audits including Low Income Housing
Pivot US Energy Services, Inc.	Consulting & Advisory: Energy Efficiency

Summary of Financing Market Objectives & Barriers Addressed

Beneficiary	Market Barrier	Financing Solution
PPP Borrowers	NYGB surveyed the market and found a lack of financial market access for smaller clean energy market participants. Although other banks are also offering PPP loans, they have prioritized loans to counterparties with which they have previously-established relationships. Many small clean energy market participants do not have existing banking relationships with these institutions.	NYGB's participation in the PPP Program allows those smaller companies advancing clean energy initiatives an opportunity to access PPP loans made available through the CARES Act.

Technologies Involved

Each applicant was evaluated for its potential to reduce GHG emissions. This broad approach allows for any eligible technology to qualify for a NYGB PPP loan. Please see the "Participant Types" above for an understanding of the technologies included in the NYGB PPP loans to date.

Metrics & Evaluation Plan

Planned Energy & Environmental Metrics

NYGB's minimum investment criteria require that NYGB-supported transactions have the potential for energy savings and/or clean energy generation that will contribute to GHG reductions in support of the State's energy policies.³ In addition, the Metrics Plan requires that certain energy and environmental measures, applicable to these transactions, be reported.⁴ However, since the PPP loans supported by this program do not directly support projects and the PPP program was administered by NYGB to respond to an explicit market need during a public health crisis NYGB will not

² Defined as projects located in four or more regions of the State.

³ Case 13-M-0412, "Order Establishing New York Green Bank and Providing Initial Capitalization" issued and effective December 19, 2013 of the Commission, Ordering Clause 6 at pages 24 – 25.

⁴ See Metrics Plan, Section 2.0, pages 2 - 6.

track project performance on an ongoing basis.

Planned Market Characterization Baseline & Market Transformation Potential

The Metrics Plan requires that market evaluation occur when a critical mass of NYGB financing and investment arrangements are put in place. Market evaluation activities commenced in 2018 on sectors that NYGB has supported since inception, consistent with the requirement for such assessments approximately three to five years following initial NYGB capital deployments.⁵ NYSERDA collected baseline data for the solar sector in 2019 and will update the data to include indicators specific to new transactions.

⁵ See Metrics Plan, Section 3.3 at page 7.