Clean Energy Communities Impact Evaluation: Program Years 2019-2023

Appendix

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NYSERDA Contract#: 151668 August 2025

NYSERDA Record of Revision

Document Title
Clean Energy Communities Impact Evaluation Program Years 2019-2023 Appendix August 2025

Revision Date	Description of Changes	Revision on Page(s)
August 2025	Original Issue	Original Issue

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Appendix A: Research Objectives

Table A-1 presents the research objective, research question, and research method guiding the impact evaluation.

Table A-1. Research Objectives

Objective	Research Question	Method
What are the verified unit savings for the three HIAs of interest?	Perform verification of per unit savings for selected HIAs	Review of program data, desk reviews, and interviews of communities and contractors working on those projects within communities where needed

Appendix B: Descriptions of High Impact Actions

Table B-1 describes the three HIAs that were the focus of this impact evaluation for program years 2019—2023.

Table B-1. Descriptions of High Impact Actions

High Impact Action	Brief Description
Benchmarking – Advanced Reporting	Benchmarking is a policy that a local government adopts that requires the annual reporting of energy used in municipal buildings. Measuring and sharing data on building energy use will help identify opportunities to cut energy waste. Advanced Reporting includes the additional requirement of making available no less than 24-months of energy use information to NYSERDA through EPA's Portfolio Manager.
Clean Energy Upgrades	Municipalities achieve at least a ten percent reduction in the greenhouse gas emissions from one or more municipal buildings, that are at least 1,000 square feet in size, through energy efficiency upgrades or sourcing renewable energy.
Clean Heating and Cooling Demo	Municipalities replace a municipal building's primary heating and cooling system with a ground- or air-source heat pump and include an educational kiosk, display, or materials intended to educate municipal staff and the public about beneficial electrification. Buildings must be 1,000 square feet or larger and open to the public all year.

Appendix C: Sample Characteristics

Table C-1 through Table C-3 contain breakdowns of community characteristics among the population of communities completing an HIA and the communities in the evaluation sample. The percentages under the Population represent the distribution of completed HIAs by community size and region. The percentages under the Sample present the representation of a community group or region within the evaluation sample.

Table C-1. Population and Sample Characteristics Breakdown for Benchmarking – Advanced Reporting

Characteristics	Population				Sample			
	Communities		Population		Communities		Population	
	N	%	N	%	n	%	n	%
Total	178	100%	5,210,476	100%	43	24%	1,217,132	23%
Size								
Large Community	14	8%	4,034,724	77%	7	50%	953,789	24%
Small Community	164	92%	1,175,752	23%	36	22%	263,343	22%
Region								
Capital Region	31	17%	782,415	15%	7	23%	597,852	76%
Central New York	32	18%	241,492	5%	10	31%	121,782	50%
Finger Lakes	26	15%	301,415	6%	1	4%	9,040	3%
Long Island	6	3%	1,810,107	35%	1	17%	33,506	2%
Mid-Hudson	27	15%	520,947	10%	8	30%	322,332	62%
Mohawk Valley	9	5%	267,081	5%	1	11%	2,110	1%
North Country	13	7%	63,278	1%	5	38%	18,660	29%
Southern Tier	23	13%	135,815	3%	6	26%	35,061	26%
Western New York	11	6%	1,087,926	21%	4	36%	76,789	7%
New York City[a]	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

a New York City did not complete the Benchmarking – Advanced Reporting HIA.

Table C-2. Population and Sample Characteristics Breakdown for Clean Energy Upgrades

Characteristics	Population				Sample			
	Communities		Population		Communities		Population	
	N	%	N	%	n	%	n	%
Total	66	100%	1,877,185	100%	35	53%	1,530,315	82%
Size								
Large Community	6	9%	1,485,542	79%	3	50%	1,302,133	88%
Small Community	60	91%	391,643	21%	32	53%	228,182	58%
Region								
Capital Region	13	20%	119,639	6%	8	62%	25,756	22%
Central New York	15	23%	91,969	5%	7	47%	32,051	35%
Finger Lakes	7	11%	74,238	4%	2	29%	53,748	72%
Long Island[a]	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A
Mid-Hudson	7	11%	253,045	13%	5	71%	242,445	96%
Mohawk Valley	2	3%	50,930	3%	1	50%	711	1%
North Country	6	9%	66,329	4%	3	50%	8,161	12%
Southern Tier	8	12%	237,720	13%	3	38%	216,746	91%
Western New York	8	12%	983,315	52%	6	75%	950,697	97%
New York City[a]	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

a No community in Long Island or New York City completed the Clean Energy Upgrade HIA.

Table C-3. Population and Sample Characteristics Breakdown for Cool Heating and Cooling Demo

Characteristics	Population				Sample			
	Communities		Population		Communities		Population	
	N	%	N	%	n	%	n	%
Total	25	100%	1,171,073	100%	15	60%	1,043,154	89%
Size								
Large Community	3	12%	1,018,411	87%	2	67%	961,621	94%
Small Community	22	88%	152,662	13%	13	59%	81,533	53%
Region								
Capital Region	7	28%	12,576	1%	5	71%	8,695	69%
Central New York	3	12%	36,742	3%	1	33%	2,365	6%
Finger Lakes	1	4%	42,581	4%	1	100%	42,581	100%
Long Island	2	8%	56,845	5%	1	50%	55	0%
Mid-Hudson	5	20%	74,176	6%	4	80%	63,301	85%
Mohawk Valley	1	4%	1,807	0%	0	0%	0	0%
North Country	3	12%	9,239	1%	1	33%	5,406	59%
Southern Tier	1	4%	1,711	0%	1	100%	1,711	100%
Western New York	2	8%	935,396	80%	1	50%	919,040	98%
New York City[a]	N/A	N/A	N/A	N/A	N/A	N/A	N/A	N/A

a New York City completed the Cool Heating and Cooling Demo HIA, but was excluded from the evaluation team's population and sample due to its outlier population, which would have had an outsized influence on the final weighted results.

Appendix D: Sample Expansion Methods

The methods for expanding the evaluation results of the sample to the population of communities are described in this section.

For the Clean Energy Upgrades and Clean Heating and Cooling Demo HIAs, the resulting savings for each sampled community were normalized to that community's population using Equation 1 as a first step.

Equation 1. Normalization of savings for a given metric and community

$$Per\ Capita\ Savings_{community} = Energy\ Savings\ Metric \div Population$$

The $Energy\ Savings\ Metric$ (also referred to simply as $Savings$) represents one of ten metrics utilized in the CEC program to assess project performance, including electricity efficiency, natural gas, fuel oil, propane, renewable generation (in MW and MWh), diesel fuel, beneficial electrification, and MTCO2e savings. The $Population$ term is the number of residents as reported in the 2010 Census for a given community. Therefore, the $Per\ Capita\ Savings_{community}$ represents the energy savings per resident for a given community and metric.

Equation 2 through Equation 3 represent the calculations used to develop the final reported population-level savings. Equation 2 calculates the weighted average per capita savings for an HIA across both strata.

Equation 2. Per capita savings for the HIA

$$Per\ Capita\ Savings_{HIA} = \sum_{i=strata}^{2} (Savings_i \div Population_i) \div Population_{HIA}$$

Where i represents the large and small community strata and the $Population_{HIA}$ represents the total population of all communities completing the HIA within the evaluation period from 2019 through 2023.

Equation 3 calculates the total verified savings for a stratum. To calculate the total verified savings for an HIA, repeat Equation 3 for both strata and add the resulting values.

Equation 3. Total verified savings for a stratum

$$Total\ Savings_{stratum} = \sum \left(Savings_{community} \times Population\right)_{stratum} \div Population_{stratum}$$

For the Benchmarking – Advanced Reporting HIA additional steps were taken to account for the floor area of buildings that fell outside of the evaluation team's sample. The following equations illustrate the calculations used to develop the final reported population-level savings.

Equation 4 calculates the weighted average stratum-level savings based on the sampled floor area, $Sampled\ Area_{community}$, that received the fuel of interest. For example, if a building received only electricity, then its floor area would be included in electricity efficiency savings calculations but not natural gas savings calculations.

Equation 4. Weighted-average savings per sampled community-floor area

$$WtAvg\ Savings_{stratum} = \sum \left(Savings_{community} \times Sampled\ Area_{community}\right)_{stratum} \div Sample\ Area_{stratum}$$

An ***Area Factor***, expressed in Equation 5, was developed to account for the unsampled floor area of buildings within a stratum, with the embedded assumption that the rate of savings observed in the sample would remain consistent throughout the remaining unsampled floor area. The $Total\ Area$ similarly represents the total floor area of all buildings within a stratum that received the fuel of interest.

Equation 5. Area factor

$$\boldsymbol{Area\ Factor} = \sum (\boldsymbol{Total\ Area})_{\boldsymbol{stratum}} \div \sum (\boldsymbol{Sampled\ Area})_{\boldsymbol{stratum}}$$

Equation 6 derives the per capita savings for the HIA. The $Building\ Area$ term is introduced to normalize results to the total floor area of all buildings, agnostic of fuel use, within each sampled community. This is necessary because the distribution of floor areas receiving any one specific fuel is unknown for the population. Two final terms, $AvgBuilding\ Area_{stratum}$ and $AvgPopulation_{stratum}$ are factored in to quantify the final per capita savings.

Equation 6. Total verified savings for a stratum

$$Per\ Capita\ Savings_{HIA} = \sum_{i=stratum}^{2} (WtAvg\ Savings_{stratum} \times \boldsymbol{Area\ Factor} \div Building\ Area_{stratum} \times AvgBuilding\ Area_{stratum} \div AvgPopulation_{stratum})$$

To calculate the annual impact of the Benchmarking – Advanced Reporting HIA, the per capita savings can be multiplied against the total population of all communities completing the HIA during the evaluation period from 2019 through 2023

Appendix E: Interview Guides

This Appendix contains the interview guides used with communities that completed the Clean Heating and Cooling Demo HIA and the Clean Energy Upgrades HIA.

1.1 Clean Heating and Cooling Demo Interview Guide

1.1.1 Instrument Introduction

We would like to start by saying thank you for taking time out of your busy schedules to talk about the Clean Heating and Cooling Demo project that your community completed as part of the Clean Energy Community program offered by NYSERDA. This interview should take no more than 30 minutes to complete. We will begin by asking a few basic questions on the project to confirm our understanding before diving a bit deeper into the scope of the improvements.

We anticipate needing to request additional detailed documentation following this interview, such as mechanical drawings and equipment specification cut sheets.

The information you provide will help NYSERDA understand the impact of the Clean Energy Communities program. We assure you that your answers to our questions will be kept confidential to the extent permitted by law.

To facilitate our work, we would like to record this interview. Is that acceptable? [PAUSE FOR CONFIRMATION]

1.1.2 Screening [ASK ALL]

First, I want to confirm the information that we were provided by NYSERDA on your Clean Heating and Cooling Demo project.

S1. Your municipality completed a Clean Heating and Cooling Demo project at one or more of your municipal buildings in [MONTH YEAR]. Is that correct? [IF UNCLEAR. This should have involved replacing a fossil fuel fired heating equipment with a heat pump.]
   a. If yes → Ask S2
   b. If no → <PROBE> Confirm their interpretation of the question. If they confirm they have not completed a Clean Heating and Cooling Demo, thank them for their time and terminate interview.
   c. If don't know → do you know who the actual person to contact is? (once you get the contact, thank them for their time and terminate the interview)

S2. The municipal building(s) that was/were a part of the Clean Heating and Cooling Demo project are each at least 1,000 ft^2 in floor area. Is that correct?
    a. If yes → Ask S3
    b. If no → Confirm which building(s) does not meet the 1,000 ft^2 threshold.
        i. If at least one building does is ≥1,000 ft^2 → Inform the interviewee that the remainder of this interview will focus on the building(s) that do meet the 1,000 ft^2 threshold. → Ask S3.
        ii. If all buildings are <1,000 ft^2, terminate interview.

S3. The Clean Heating and Cooling Demo project was completed on or after January 1, 2019. Is that correct?
    a. If yes → Ask S4
    b. If no → Confirm the date of completion is before January 1, 2019. Thank them for their time and terminate interview.

1.1.3 High-Level Data Collection [ASK ALL]

My next questions are focused on collecting high-level information on the Clean Heating and Cooling Demo project(s). Some of the information may be redundant with what was shared above, and we will try and avoid duplicating questions.

Q1. Can you please describe the buildings that were part of the Clean Heating and Cooling Demo project?
    a. <PROBE> Number of municipal buildings affected.
    b. <PROBE> Building usage, e.g., office space, community center, facility maintenance.
    c. <PROBE> Floor area of each building

Q2. Can you please describe the energy improvements taken as part of the Clean Heating and Cooling Demo project?
    a. <PROBE> Type of HVAC installed, e.g., ASHP or GSHP
    b. <PROBE> Location of improvements with respect to buildings, e.g., building A received X improvement
    c. <PROBE> GSHP System Networking, e.g., 1 GSHP serving multiple buildings

Q3. Was solar water heating installed as part of this project?
    a. <PROBE> Location of improvements with respect to buildings, e.g., building A received X improvement

Q4. Can you provide the start and end date, Month-Year is sufficient, for the implementation of the project in each building?
    a. <PROBE> Was the building closed, or operations otherwise impacted, during implementation?

1.1.4 Detailed Data Collection

1.1.4.1 HVAC

Q5. Can you please describe the pre-existing HVAC equipment in each building that was replaced by the installed equipment?

a. <PROBE> Type of equipment, e.g., chiller, furnace, rooftop unit
b. <PROBE> Heating fuel, e.g., natural gas, oil, electric
c. <PROBE> Capacity, e.g., heating (Btu) and cooling (Btu or ton)
d. <PROBE> Efficiency, e.g., SEER, EER, COP, HSPF
e. <PROBE> Operating condition of the equipment prior to replacement, e.g., functioning, broken

Q6. Are manufacturer specification data sheets (aka: spec sheets, cut sheets) available for the pre-existing equipment that you might share with us?

Q7. Can you please describe the installed HVAC equipment in each building?

a. <PROBE> Type of equipment, e.g., chiller, heat pump
b. <PROBE> Heating fuel, e.g., natural gas, electric
c. <PROBE> Capacity, e.g., heating (Btu) and cooling (Btu or ton)
d. <PROBE> Efficiency, e.g., SEER, EER, COP, HSPF

Q8. Are you able to provide manufacturer specification data sheets on the installed equipment?

1.1.4.2 Solar Water Heating (IF APPLICABLE)

Q9. Can you please describe the pre-existing water heating equipment in each building that was replaced by the installed solar water heating equipment?

a. <PROBE> Type of equipment, e.g., storage tank, tankless, combination boiler-DHW
b. <PROBE> Heating fuel, e.g., natural gas, oil, electric
c. <PROBE> Gallon capacity
d. <PROBE> Efficiency, e.g., uniform energy factor, thermal efficiency
e. <PROBE> Operating condition of the equipment prior to replacement, e.g., functioning, broken

Q10. Can you please describe the installed water heating equipment in each building?

a. <PROBE> Type of equipment, e.g., heat pump, solar heating
b. <PROBE> Heating fuel, e.g., natural gas, electric
c. <PROBE> Gallon capacity
d. <PROBE> Efficiency, e.g., uniform energy factor, thermal efficiency

Q11. How is hot water used in each building where an improvement was made?

a. <PROBE> Spaces, e.g., bathrooms, locker rooms, kitchens
b. <PROBE> Special functions, e.g., indoor/outdoor pools, community centers

Q12. Are you able to provide manufacturer specification data sheets on the pre-existing and/or installed equipment?

1.1.5 Closing

Thank you for taking the time to meet with us. We very much appreciate your insights.

Lastly, the market survey team is also conducting interviews with communities. Would you be open to speaking with them as well in a second interview?

a. If yes → Great, thank you again for being willing to participate. I will let them know and put them in contact with you.
b. If no → No worries, and thank you for your time. I will let them know.

1.2 Clean Energy Upgrades Interview Guide

1.2.1 Instrument Introduction

We would like to start by saying thank you for taking time out of your busy schedules to talk about the Clean Energy Upgrade project that your community completed as part of the Clean Energy Community program offered by NYSERDA. This interview should take anywhere from 30 minutes to an hour to complete. We will begin by asking a few basic questions on the project to confirm our understanding before diving a bit deeper into the scope of the improvements.

We anticipate needing to request additional detailed documentation following this interview, such as mechanical drawings, equipment specification cut sheets, and energy performance analyses completed as part of the CEC packet.

The information you provide will help NYSERDA understand the impact of the Clean Energy Communities program. We assure you that your answers to our questions will be kept confidential to the extent permitted by law.

To facilitate our work, we would like to record this interview. Is that acceptable? [PAUSE FOR CONFIRMATION]

1.2.2 Screening [ASK ALL]

First, I want to confirm the information that we were provided by NYSERDA on your Clean Energy Upgrade project.

S4. Your municipality completed a Clean Energy Upgrade project at one or more of your municipal buildings in [MONTH YEAR]. Is that correct? [IF UNCLEAR. This may have involved an energy efficiency improvement or a renewable energy investment.]
    a. If yes → Ask S2

b. If no → <PROBE> Confirm their interpretation of the question. If they confirm they have not completed a Clean Energy Upgrade, thank them for their time and terminate interview.

S5. The municipal building(s) that was/were a part of the Clean Energy Upgrade project are each at least 1,000 ft^2 in floor area. Is that correct?
   a. If yes → Ask S3
   b. If no → Confirm which building(s) does not meet the 1,000 ft^2 threshold.
      i. If at least one building does is ≥1,000 ft^2 → Inform the interviewee that the remainder of this interview will focus on the building(s) that do meet the 1,000 ft^2 threshold. → Ask S3.
      ii. If all buildings are <1,000 ft^2, terminate interview.

S6. The Clean Energy Upgrade project was completed on or after January 1, 2019. Is that correct?
   a. If yes → Ask S4
   b. If no → Confirm the date of completion is before January 1, 2019. thank them for their time and terminate interview.

S7. The Clean Energy Upgrade project resulted in a 10% reduction of GHG emission from the baseline. Is that correct?
   a. If yes → Ask Q1
   b. If no → <PROBE> How does the interviewee know the project did not result in a 10% reduction in GHG.
      i. If the interviewee is unsure if it achieved a 10% reduction, or casts doubt on their claim → Ask Q1.
      ii. If the interviewee is certain, thank them for their time and terminate interview.

1.2.3 High-Level Data Collection [ASK ALL]

My next questions are focused on collecting high-level information on the clean energy upgrade project(s). Some of the information may be redundant with what was shared above, and we will try and avoid duplicating questions.

Q13. Can you please describe the buildings that were part of the clean energy upgrades project?
   a. <PROBE> Number of municipal buildings affected.
   b. <PROBE> Building usage, e.g., office space, community center, facility maintenance.
   c. <PROBE> Floor area of each building
   d. <PROBE>

Q14. Can you please describe the energy improvements taken as part of the clean energy upgrade project?
   a. <PROBE> Types of improvements, e.g., HVAC, Water Heating, Lighting, Envelope, Renewable Energy Generation, or Renewable Energy Certificates (RECs)
   b. <PROBE> Location of improvements with respect to buildings, e.g., building A received X improvement

Q15. Can you provide the start and end date, Month-Year is sufficient, for the implementation of the project in each building?
    a. <PROBE> Was the building closed, or operations otherwise impacted, during implementation?

Q16. Since completion of the clean energy upgrade project, have any further energy improvements been completed at the buildings, including installation of on-site renewable generation, connection to a community geothermal network, or retirement of RECs? **If yes →** what were they?
    a. <PROBE> Lighting, HVAC, Envelope

Q17. Since completion of the clean energy upgrade project, have any other significant changes been made to the building(s)?
    a. <PROBE> Changes in use or occupancy
    b. <PROBE> Expansions or renovations
    c. <PROBE> Closures

Q18. Do any of the municipal buildings part of the Clean Energy Upgrade project share an electric or natural gas utility meter with another building, regardless of whether the other building was a part of the project?

1.2.4 Detailed Data Collection

The following questions will be more of a deep dive into the specifics of the improvements made as part of the clean energy upgrades project.

1.2.4.1 HVAC

Q19. Can you please describe the pre-existing HVAC equipment in each building that was replaced by the installed equipment?
    a. <PROBE> Type of equipment, e.g., chiller, furnace, rooftop unit
    b. <PROBE> Heating fuel, e.g., natural gas, oil, electric
    c. <PROBE> Capacity, e.g., heating (Btu) and cooling (Btu or ton)
    d. <PROBE> Efficiency, e.g., SEER, EER, COP, HSPF
    e. <PROBE> Operating condition of the equipment prior to replacement, e.g., functioning, broken

Q20. Can you please describe the installed HVAC equipment in each building?
    a. <PROBE> Type of equipment, e.g., chiller, heat pump
    b. <PROBE> Heating fuel, e.g., natural gas, electric
    c. <PROBE> Capacity, e.g., heating (Btu) and cooling (Btu or ton)
    d. <PROBE> Efficiency, e.g., SEER, EER, COP, HSPF

Q21. Are you able to provide manufacturer specification data sheets on the installed equipment?

Q22. Is the HVAC system connected to a building automation system (BAS)?
Q23. Was the BAS installed prior to the project?
    a. <PROBE> If the BAS was pre-existing
        i. Were any changes made to the schedule or setpoints during or since the project?
            1. If yes,

a. When were those changes made?
b. Were these changes part of the clean energy upgrade project?

2. If no, move on to next <PROBE>

b. <PROBE> If the BAS is new,
   i. When was it installed?
   ii. Was it part of the clean energy upgrade project?

1.2.4.2 Lighting

Q24. Can you please describe the pre-existing lighting fixtures in each building that were replaced by the installed equipment?
   a. <PROBE> Type of lamps/fixtures, e.g., fluorescent tubes, CFLs, moguls
   b. <PROBE> Wattages of lamps/fixtures.
   c. <PROBE> Location of lamps/fixtures, e.g., hallways, bathrooms, offices, recreation rooms

Q25. Can you please describe the installed lighting fixtures in each building?
   a. <PROBE> Types of lamps/fixtures, e.g., LED tubes, LED panels
   b. <PROBE> Wattages of lamps/fixtures.

Q26. Do you have a lighting schedule that includes the lighting types, their wattages, quantities, and location for the replaced and/or installed fixtures? **If yes** → will you share the schedule with us?

Q27. Are you able to provide manufacturer specification data sheets on the installed equipment?

1.2.4.3 Hot Water

Q28. Can you please describe the pre-existing water heating equipment in each building that was replaced by the installed equipment?
   a. <PROBE> Type of equipment, e.g., storage tank, tankless, combination boiler-DHW
   b. <PROBE> Heating fuel, e.g., natural gas, oil, electric
   c. <PROBE> Gallon capacity
   d. <PROBE> Efficiency, e.g., uniform energy factor, thermal efficiency
   e. <PROBE> Operating condition of the equipment prior to replacement, e.g., functioning, broken

Q29. Can you please describe the installed water heating equipment in each building?
   a. <PROBE> Type of equipment, e.g., heat pump, solar heating
   b. <PROBE> Heating fuel, e.g., natural gas, electric
   c. <PROBE> Gallon capacity
   d. <PROBE> Efficiency, e.g., uniform energy factor, thermal efficiency

Q30. How is hot water used in each building where an improvement was made?
   a. <PROBE> Spaces, e.g., bathrooms, locker rooms, kitchens
   b. <PROBE> Special functions, e.g., indoor/outdoor pools, community centers

Q31. Are you able to provide manufacturer specification data sheets on the installed equipment?

1.2.4.4 Building Shell

Q32. Can you please describe the building shell improvements that were made as part of the project?

a. <PROBE> Insulation locations, e.g., exterior walls, basement walls, rim joists, attics
b. <PROBE> Insulation R-value
c. <PROBE> Air sealing locations, e.g., doors, windows, loading bays, air ducts
d. <PROBE> Air Sealing infiltration reduction, e.g., CFM50, ACH
e. <PROBE> Infiltration reduction verification, e.g., blower door test

Q33. Can you please describe the pre-existing conditions?

a. <PROBE> Insulation R-value
b. <PROBE> Air Sealing infiltration rates, e.g., CFM50, ACH
c. <PROBE> Infiltration baseline verification, e.g., blower door test

Q34. Are you willing to provide blower door test results of the infiltration rates for the pre- and post-improvement condition for each building?

1.2.4.5 Renewable Energy

Q35. Can you please describe the renewable energy improvements or investments taken as part of the clean energy upgrade?

a. <PROBE> Type of qualifying actions, e.g., solar, community distributed generation (CDG), wind, geothermal, premium-efficiency wood pellets, anaerobic digester gas, or RECs
b. <PROBE> Displaced fuel, e.g., solar displacing grid electricity, geothermal displacing natural gas

Q36. We will need to follow up with a request for information on these systems. In general, we will be seeking manufacturer specification data sheets, purchase agreements, or proof of retirement. Do you have those to share?

1.2.5 CEC Documents [ASK IF MISSING FROM NYSERDA]

The following questions are focused on the documentation that was required by NYSERDA when submitting to the CEC program.

Q37. Do you have the original submission packet?

a. If yes → Would you be willing to provide us with that packet?
    i. If yes → We will include this in our follow-up data request.
    ii. If no → We are particularly interested in the impact calculations associated with the project, which might include an ASHRAE Energy Audit, engineering energy calculation, or energy model. Would you be willing to share any of those files?

b. If no → As part of your CEC submission, the following documents may have been included. We are interested in collecting as many of these as you have available.
    i. ENERGY STAR Portfolio Manager benchmarking report (includes 12-36 months of pre-installation energy use)
    ii. ASHRAE Energy Audit
    iii. Pre- and post-engineering study

iv. NYESRDA's Clean Energy Upgrades Calculator

1.2.6 Closing

Thank you for taking the time to meet with us. We very much appreciate your insights.

Lastly, the market survey team is also conducting interviews with communities. Would you be open to speaking with them as well in a second interview?

c. If yes → Great, thank you again for being willing to participate. I will let them know and put them in contact with you.

If no → No worries, and thank you for your time. I will let them know.