

HCR Multifamily Finance

Incorporation of Clean Energy Incentives for High Performance Projects Demonstration Phase 1B: Existing Building Rehabilitation Applications

Overview:

Phase 1B of HCR's Clean Energy Incentives for High Performance Projects (CEI) is open to new construction/adaptive reuse and existing building renovations. This document pertains to existing building renovations interested in applying. Please download the "CEI Demonstration Phase 1B Program Application" for more details on how to apply.

Up to **\$25,000/unit** in additional funding is available to a select number of **existing building renovation** projects who are interested in and committed to meeting HCR's Stretch Sustainability Goals for existing buildings, which can be described as steps towards a highly-efficient, all-electric buildings, (carbon neutral-ready). Projects with over 250 units may apply but will be subject to a per project maximum of 250 units (or \$6,250,000).

Background:

HCR is working to put current and future affordable housing projects on the path to meeting New York State's Climate Leadership and Community Protection Act ("Climate Act"), which mandates an 85% reduction in greenhouse gas emissions by 2050, compared to New York State's 1990 carbon emission levels. For buildings, this will mean dramatically improving building efficiency, especially with regard to building envelope performance and hot water consuming appliances and fixtures and replacing fossil fuel combusting equipment with efficient electric solutions.

To develop a market for this type of affordable housing construction and a model for streamlining access to financial and technical assistance resources from New York State, HCR, has partnered with NYSERDA to demonstrate an approach for incorporating clean energy funding and technical support for existing building renovations to take steps towards high-efficiency, all-electric. Up to \$25,000/unit in clean energy funding will be made available for select projects as a source in the project's Sources and Uses and enable projects to meet HCR's Stretch Sustainability Goals (fully defined below).

Funding Description:

The CEI funding available to existing building renovations during this demonstration phase will consist of up to \$25,000 per dwelling unit to achieve HCR's Stretch Sustainability Goals. Maximum project awards depend on the number of goals selected. HCR's Stretch Sustainability Goals for Existing Buildings are as follows:

Goal 1: Electrification of Heating – up to \$7,500/unit

Goal 2: Electrification of Domestic Hot Water – up to \$5,000/unit

Goal 3: Advanced Envelope and Ventilation – up to \$10,000/unit

Applicants must select at least one of the above goals above to be considered for CEI funding. Applicants may also select two or three goals from the list above. Maximum funding amounts commiserate with the goals selected. The following options are available for applications to choose from:

Description	Hard Cost Support	Soft Cost Support*	Total Incentive Amount
Select one goal from above	Up to \$10,000/unit	Up to \$2,500/unit or a project max of \$150,000	\$12,500/unit
Select two goals from above	Up to \$17,500/unit		\$20,000/unit
Select all goals from above	Up to \$22,500/unit		\$25,000/unit

**Soft cost support is only applied ONCE to the project; if a project is applying for two or three Goals, they would only receive \$2,500/unit in soft costs, or a per project maximum of \$150,000.*

At HCR’s sole discretion, up to **\$15 million may be made available for existing building renovations during Phase 1B**, and projects will be selected from both the 4% Bond Finance and 9% LIHTC programs per the eligibility criteria below. If selected for clean energy funding, 4% projects will be notified through a conditional award letter contingent upon final approval of project financing.

In addition to receiving clean energy funding to offset incremental costs associated with achieving the designed building performance, selected projects will receive support from a designated Technical Assistance Provider and HCR to assist with the enhanced design efforts, where necessary. After the award is made, the Technical Assistance Provider will guide the project’s development team and energy efficiency consultant through a design process to achieve the selected HCR Stretch Sustainability Goals.

Project Eligibility Criteria:

Projects will be selected based on the following criteria. If multiple projects qualify for clean energy funding, projects will be chosen based on HCR’s 4% selection process.

1. Projects are **existing building renovations (moderate or substantial) with 250 units or less (projects with over 250 units may apply but funding will be capped at 250 units)**
2. Projects are **existing building renovations (moderate or substantial)**

3. Projects must at least be currently designed 1) utilize fossil fuel on-site 2) to partial electrification, or 3) demonstrates a gap in financing to reach HCR's Stretch Sustainability Goals.
4. Prior to application for CEI funding, the base project **MUST** be planning to include **AT LEAST** one of the following into the scope of work:
 - a. Performing replacements of domestic hot water (DHW) and/or space heating boilers and distribution systems.
 - b. Performing Envelope work including one or more of the following:
 - i. Compliance with NYC Local Law 11 (NYC specific)
 - ii. Scheduled repair/façade work
 - iii. Window replacements
 - iv. Addition of insulation to the interior and/or exterior of the building
 - v. Roof replacement with added roof insulation
5. The applicant has demonstrated success incorporating energy efficiency and/or electrification into past projects. Projects will in part be evaluated to demonstrate that this funding is being used to appreciably improve the applicant's standard design processes and achieve cost reductions to deliver carbon neutral performance on future projects.
6. A project must be, or be capable of and intend to be, a **New York State electricity distribution customer of a participating utility company that pays into the System Benefits Charge (SBC)**. In order to demonstrate eligibility, applicants must submit a copy of an electricity utility bill from the project location.
7. The development team is able to **commit to the enhanced design** to achieve the HCR Stretch Sustainability Goals selected as defined in this solicitation.
8. **The development team will commit to partner with a designated Technical Assistance Provider**, who will assist in:
 - a. Enhanced design development and construction documentation with the current project design team.
 - b. Construction oversight.
 - c. Measurement and Verification for two years post lease up.
 - d. Benchmarking outlined in the regulatory agreement.
9. **The development team will commit to working closely with HCR's Office of Finance and Development, Design Unit and Sustainability Team** through design, construction, measurement and verification.

HCR's Stretch Sustainability Goals:

The goal of the clean energy funding program is to take a step towards carbon neutral-ready affordable housing. In existing buildings this means achieving a high-performance envelope to reduce the project's energy load and achieving either full or partial electrification of space heating, domestic hot water and cooking and drying appliances.

Projects must select at least one of the Stretch Sustainability goals below. Projects can select multiple goals, for a maximum award of **\$25,000/unit**. Applicants who select multiple goals and/or can achieve full electrification with a high-performance envelope within their base building and this application will be scored more favorably. **Existing buildings with electric**

baseboard or fuel-oil space heating systems MUST select Goal 1 to be considered for the program.

In addition to incentives for incremental hard costs to achieve the selected goals, all project awards may apply for up to **\$2,500/unit in soft cost design support, with a maximum total request of \$150,000 per project.**

Eligible Soft Cost Design Services: (Up to \$2,500/unit, not to exceed a maximum request of \$150,000 in total per project, based on demonstrated needs)

1. Integrated design work – describe in detail the process, timeline and team and funds requested (include scope of work proposals from contractors performing the work)
2. Create a “Path to full Electrification” for the project, including technology/scope needed, costs, and potential timeline of when anticipated technology would be available and implemented. Future electrification costs should be considered in a draft operating budget and sourced for future fund identification and provided as part of the CEI material.
3. Additional Engineering costs for Energy modeling, Engineering services related to electrification, and/or, other related services described by the project team within the application (include scope of work proposals from contractors performing the work)

Goal 1: Electrification of Heating – up to \$7,500/unit

Upgrade fossil-fuel (e.g. gas, oil, propane fired) or electric baseboard systems to high-efficiency heat pumps or ground source heat pumps for space heating and cooling.

- a. All associated electrical service and distribution upgrades are eligible for funding.
- b. Projects implementing this scope are expected to evaluate envelope improvements (as listed in #3) as well.

Projects planning to install heat pumps as a part of the base scope of work are not eligible to apply for Goal 1.

Goal 2: Electrification of Domestic Hot Water – up to \$5,000/unit

Replace/upgrade the existing fossil fuel domestic hot water heating system with a high-performance heat pump hot water heater (ASHP or WSHP).

- a. All associated electrical service upgrades are eligible for funding
- b. Improvements to enhance performance of the heat pump DHW system, such as pipe insulation and low-flow fixtures, are also eligible for funding.
- c. All associated plumbing and mechanical equipment are eligible expenses.

Goal 3: Advanced Envelope and Ventilation – up to \$10,000/unit

Projects pursuing this goal should be planning envelope improvements in their base scope of work. CEI funding is intended to cover the incremental costs to reach more advanced envelope and ventilation standards than originally planned.

HCR’s long-term goal is for all projects to achieve envelope performance equivalent to a passive house standard. Projects applying for goal three are encouraged to achieve as close to a passive-house building envelope as is feasible within the up to \$10,000/unit incentive amount provided. The Applicant will determine the scope of work to reach this target.

Scope items may include, but are not limited to:

- High performance windows
- Air sealing and/or air tightness improvements
- Interior/exterior insulation
- Reduction of thermal bridges
- Upgrades to ventilation systems

In order to be considered for Goal 3 funding, projects must achieve **AT LEAST** the following envelope performance, but are highly encouraged to reach beyond this baseline towards passive house standards.

Minimum Envelope Requirements:

Projects must meet specified area weighted U-value target based on climate zone and building typology. The area weighted U-value is a whole building value. The target considers the U-value of all above grade exposed building envelope components such as roof, windows, exterior walls, and exposed floors (e.g. above a garage) to calculate a weighted, whole building value. The Applicant will determine the scope of work to reach this target using similar scope items listed above.

Building Location	MF Building 1-3 Stories U-Value	MF Building 4+ Stories U-Value
Climate Zone 4 (A-C)	Target of ≤ 0.07	Target of ≤ 0.13
Climate Zone 5 (A-C)	Target of ≤ 0.06	Target of ≤ 0.10
Climate Zone 6 (A-B)	Target of ≤ 0.05	Target of ≤ 0.09

Projects should also meet the following minimum ventilation requirements in order to be considered for CEI funding.

Existing Ventilation	Required Measure	Operational Test Out Specifications
Central Exhaust System	Clean and seal the ductwork to 5 CFM50/ register + 5 CFM50/floor leakage and provide adjustable constant airflow regulator (CAR) to provide code-compliant	25 CFM continuous ventilation for each kitchen. • 20 CFM continuous ventilation for each bathroom.

	mechanical exhaust at each terminal.	
Unitized Exhaust System	Provide code-compliant mechanical exhaust of 25 CFM continuous or 100 CFM intermittent ventilation for each kitchen. • Provide code-compliant 20 CFM continuous or 50 CFM intermittent ventilation for each bathroom.	25 CFM continuous or 100 CFM intermittent ventilation for each kitchen. • 20 CFM continuous or 50 CFM intermittent ventilation for each bathroom.
Naturally Ventilated Bathrooms and Kitchens	If replacing windows, provide a unitized through-wall exhaust fan in each kitchen and bathroom to provide code-compliant mechanical ventilation. • If not replacing windows, no action required.	N/A

Additional Considerations for Building Envelope:

Projects will be scored more favorably according to how close they can get to the standards listed below (equivalent to passive house standards):

Heating	
Heating demand	[kWh(m ² a)] ≤ 15
Heating load	[W/m ²] ≤ 10

Airtightness	
Pressurization test result n50	[1/h] ≤ 0.6

Projects should include a detailed description of how they will ensure adequate ventilation of the building as airtightness increases. The installation of balanced ventilation systems like energy recovery ventilation (ERV) and heat recovery ventilation (HRV) systems should be explored.

BONUS for Scoring Purposes Only:

Projects who incorporate the following items into their application within the incentive amounts above will be scored more favorably by the scoring committee. Please add a description in your narrative if funds awarded will support these activities.

- a. Upgrade existing electrical service to accommodate future electrification upgrades, if it can be proven or ensured that such upgrades will be leveraged in the future.

- b. Replace existing gas stoves with induction ranges and dryers with heat pump models.
- c. Incorporate renewable resources, like solar thermal or geo-thermal technology, integrated with our proposed design scope
- d. Address resiliency within your project description and narrative

Exceptions and Exemptions of the Use of Funds:

The funds are designed to cover the cost difference between a property that complies with HCR Design Guidelines, including Appendix F requirements, and HCR's Stretch Sustainability Goals: highly-efficient, all-electric (carbon neutral –ready) buildings. The scope does not require the applicant to include ground source heat pumps, solar photovoltaics, embodied carbon reductions (from material selection or design improvements to reduce quantity of material), or other innovative technologies not specifically mentioned below. While those additional items are not required within in this scope, development teams are strongly to encouraged to include those considerations where they can be included in the project scope cost effectively.

Project selection to receive clean energy funds and/or technical support through this demonstration will satisfy the HCR Mandatory Energy Efficiency Strategy required as outlined in Appendix F of the HCR Design Guidelines. Applications should not change their original path for compliance with the HCR Mandatory Energy Efficiency Strategy until clean energy funds are awarded.

Projects selected for clean energy funding and technical support through this demonstration will be prohibited from receiving financial support from some other clean energy programs that support highly efficient, all-electric (carbon neutral-ready) housing. If projects have already applied to a NYSERDA program, such as MPP, AMEEP, and RetrofitNY, acceptance of the demonstration funding shall be considered to supersede that previous funding allocation, and HCR, NYSERDA and the awardee shall work together to cancel the NYSERDA MPP, AMEEP, and Retrofit NY awards and remove its funds from the capital stack post award notification.

The Owner team is encouraged to comply with the NYS Clean Heat Program Requirements and apply for and receive all applicable Clean Heat Incentives. If Clean Heat Incentives are procured, these incentives should be recognized within the construction cost estimate.

Other programs, such as but potentially not limited to, the following programs shall be considered to be acceptable to use in conjunction with this award: Real Time Energy Management Program (RTEM), Charge Ready NY, and NY Sun. Projects may also be eligible to receive federal or state tax credits for some aspects of their project. HCR encourages project teams to research and apply for these supplemental funding programs.

How to Apply:

To be considered for funding:

1. Submit your financing application for your “base” project that meets the eligibility criteria. Original “base” project proposals should not be amended to address clean energy funding program goals.

2. Complete the CEI Demonstration Phase 1B Program Application and submit alongside the project's 4% Financing Application
3. Submit a memo completed either by the owner or by the project's selected green/energy consultant that describes the project's approach to achieving HCR's stretch goals – not to exceed 5 pages.
4. Submit a signed contract with a licensed or certified professional who is able to certify or confirm and verify to the standards outlined in the compliance section of this scope.
5. Submit verification that the project is subject to the Systems Benefits Charge (described above in "Project Eligibility Criteria.")
6. Submit scope of work proposals to support the project's soft cost funds request.