



NEW HAMPSHIRE
HOUSING

GREENER HOMES INITIATIVE

October 31, 2024



AGENDA

- **Welcome**
 - Rob Dapice, Executive Director/CEO, NH Housing
- **Why Greener Homes?**
 - Jack Ruderman, NH Housing
- **Overview of Federal and State Clean Energy Incentive Programs**
 - Jack Ruderman, NH Housing
- **Benchmarking and Energy Audits**
 - Chase Pennoyer, President, Resilient Buildings Group
- **Case Studies**
 - Matt Menning, Principal and Head of Operations, Elm Grove Properties
- **Q & A**

WHY GREENER HOMES?

- High energy costs
- Climate change
- Air quality
- Building comfort
- Opportunity:
 - Unprecedented funding for clean energy incentives via IRA - \$400 billion and state programs
 - Range of clean energy technologies to get the job done
 - Air source heat pumps, spray foam insulation, air sealing, solar power systems, etc.

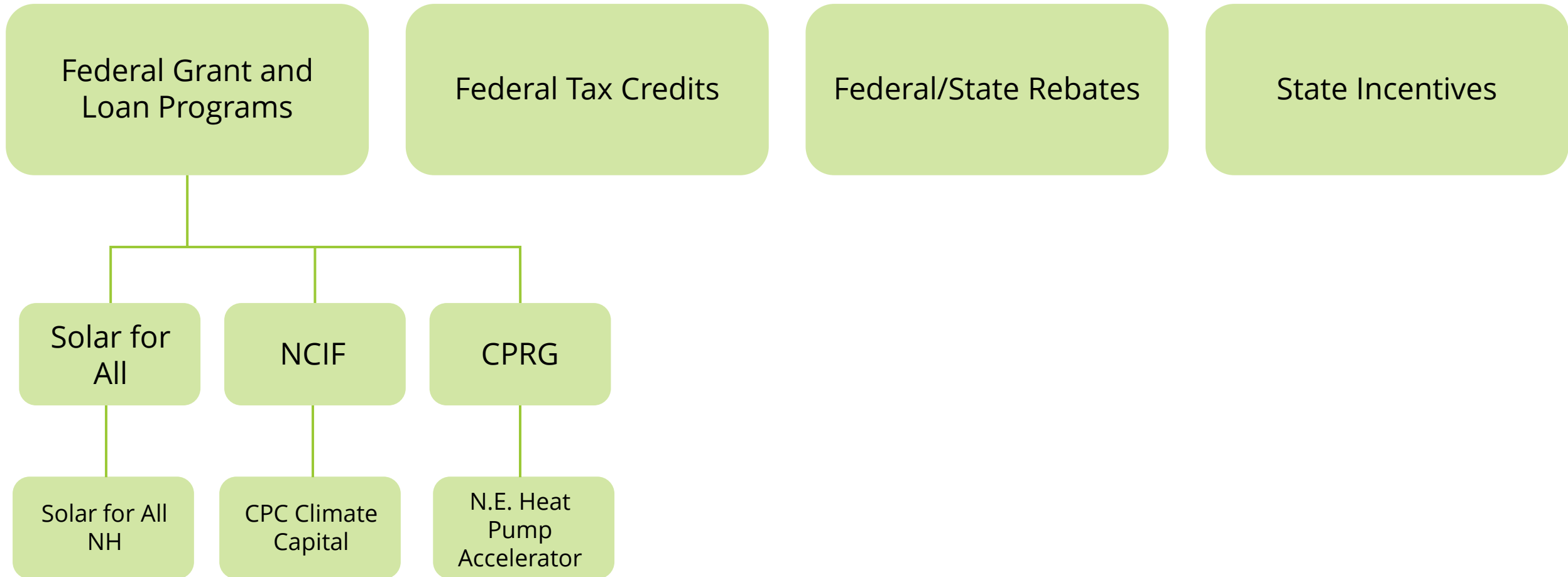
VISION

Transform the fleet of multifamily buildings we finance into high performing, energy efficient buildings using clean energy technologies that reduce energy costs while also reducing emissions of greenhouse gases and other harmful pollutants.

HOW THE PROGRAM WORKS

- Vast array of federal, state, and utility-sponsored incentive programs
- NH Housing is a clearinghouse for these programs
 - Information to access to rebates, grants, loans, tax credits
- NH Housing will also provide direct incentives for solar power systems via Solar for All Program

MAP OF CLEAN ENERGY INCENTIVES



MAP OF CLEAN ENERGY INCENTIVES

Federal Grant and
Loan Programs

Federal Tax Credits

Federal/State Rebates

State Incentives

IRS

§48
Investment
Tax Credit

§45 Energy
Efficient
Homes

MAP OF CLEAN ENERGY INCENTIVES

Federal Grant and
Loan Programs

Federal Tax Credits

Federal/State Rebates

State Incentives

U.S. DOE/NH
DOE

HEAR

HER

MAP OF CLEAN ENERGY INCENTIVES

Federal Grant and
Loan Programs

Federal Tax Credits

Federal/State Rebates

State Incentives

NHSaves

NHDOE
Solar Rebate
Program

NHDOE
LMI Solar
Grants

Energy Star
Homes

Home
Energy
Assistance

TABLE OF CLEAN ENERGY INCENTIVES

Federal Grant and Loan Programs			Federal Tax Credits		Federal/State Home Rebates	
Solar for All	Natl Clean Investment Fund (NCIF)	Climate Pollution Reduction Grants (CPRG)	Section 48: Renewable Energy Investment Tax Credit	Section 45L: Energy Efficient Home Credit	Home Electrification and Appliance Rebate Program (HEAR)	Home Efficiency Rebate Program (HER)
\$7 billion for loans or grants for solar electric systems to reduce energy costs for low-income households	\$14 billion for low interest loans for clean energy measures in MF housing and other sectors	\$5 billion for states, local governments, etc. for energy measures to reduce greenhouse gas emissions and other harmful air pollution	Federal Investment Tax Credit for solar, geothermal heating and cooling systems, and wind	Federal Tax Credit for high efficiency homes	\$4.5 billion Rebates for high efficiency appliances, electrical upgrades and weatherization measures for new construction & retrofits	\$4.3 billion Rebates for weatherization measures (retrofits only)
US EPA/NH DOE/NH Housing	US EPA/ Climate United Coalition ¹	EPA/NH DES	IRS	IRS	Funded by U.S. DOE Administered by NH DOE	Funded by U.S. DOE Administered by NH DOE
Grants and/or low interest loans for onsite solar electric systems, amounts TBD Grants and/or low interest loans for large-scale community solar arrays, amounts to TBD	Climate United: Low-interest loans for energy retrofits and new construction for greening multifamily housing. Primary goal is to reduce greenhouse gas emissions. New construction must be zero net emissions.	Rebates for air source heat pumps, ground source heat pumps, and heat pump water heaters. Amounts TBD.	30% Investment Tax Credit (ITC) 10% adder for projects in Low Income Communities OR, 20% adder for "Qualified Low-Income Buildings"	Credits of \$1,000 to \$5,000 per unit for new construction or retrofits meeting efficiency standards of Energy STAR New Construction or DOE's Zero Energy Ready Homes efficiency standards. Does not reduce eligible basis.	Rebates for heat pumps, electric stoves, ranges or ovens; heat pump water heaters, clothes dryers, electrical upgrades and weatherization measures. Up to \$14,000 per rental unit	Rebates of \$4,000 to \$8,000 depending on level of efficiency gains
NH awarded \$43.5 million. NH Housing to receive sub-award of \$23.2 million for multifamily properties financed by NH Housing, and PHA properties.	Climate United: \$6.97 billion \$2.4 billion subsidiary-program managed by CPC Climate Capital	NH DES and four other N. England states have been awarded \$450 million for the New England Heat Pump Accelerator program. NH allocation is \$37 million.	Programs currently open and tax credits are available through 2035. Adders are competitive and subject to program allocation caps (measured by megawatts of capacity).	Programs currently open and tax credits are available through 2032. There are no caps on program funding.	HEAR multifamily funding: \$14 million	HER multifamily funding: amount TBD

FEDERAL GRANT AND LOAN PROGRAMS

EPA's Solar for All Program

- \$7 billion for loans or grants for solar electric systems to reduce energy costs for low-income households
- \$43.5 million to NH Dept. of Energy; \$23.2 million subaward to NH Housing

NH Housing's Solar for All Program:

- ❑ On-site solar for MF properties we finance: we provide low interest loans for solar arrays, either rooftop or ground mounted, for existing buildings or for new construction
- ❑ On-site solar for public housing authorities: grants and/or low interest loans
- ❑ Community Solar: Incentives for solar developers to develop large-scale solar arrays (up to one megawatt) that will be virtually net metered to residents of participating MF properties.

FEDERAL GRANT AND LOAN PROGRAMS

NH Housing's Solar for All Program (cont.)

- All solar projects must result in reduced electricity costs (or comparable benefit) for low-income households in multifamily buildings
- Program to be administered by Multifamily Housing Division
- Projected start date – Q3 2025

FEDERAL GRANT AND LOAN PROGRAMS

EPA's National Clean Investment Fund (NCIF)

- Total funding: \$14 billion
- \$7 billion to Climate United Coalition
 - \$2.4 billion to CPC Climate Capital
- CPC to offer low interest loans for energy retrofits and new construction for MF housing
- Retrofits must result in highly efficient buildings (modeled savings)
- New construction must meet DOE's definition of Zero Emissions Building
- Program start date: TBD

FEDERAL GRANT AND LOAN PROGRAMS

EPA's Climate Pollution Reduction Grants (CPRG)

- ❑ \$5 billion for states and local governments to reduce greenhouse gas emissions
- ❑ \$450 million for the New England Heat Pump Accelerator Program
- ❑ \$40 million to NH DES for midstream incentives to wholesale distributors for air source heat pumps, ground source heat pumps, and heat pump water heaters
- ❑ Program start date: TBD

FEDERAL TAX CREDITS

Section 48 - Renewable Energy Investment Tax Credit

- 30% Investment Tax Credit (ITC) for solar, geothermal heating and cooling systems
- 10% adder for projects in low-income residential buildings; LIHTC buildings qualify
 - Or,
- 20% adder for Qualified Low-Income Buildings
 - Requires 50% of financial benefits go to building residents
- Both programs are competitive
- Tax credits currently available. End date is 2035.

FEDERAL TAX CREDITS

Section 45L Energy Efficient Home Credit

- Tax credits of \$1,000 to \$5,000 per unit for MF new construction or retrofits
- Buildings must meet EPA's Energy Star New Construction efficiency standards, or DOE's Zero Energy Ready Homes
- Tax credits do not reduce eligible basis
- Tax credits currently available
- End date is 2032

FEDERAL/STATE REBATE PROGRAMS

DOE's HOME Rebates Program

- NH DOE is receiving nearly \$70 million in funding to administer NH's program
- **HEAR:** Home Electrification and Appliance Rebate Program
 - Rebates for heat pumps, electric stoves, ranges, or ovens; heat pump water heaters and clothes dryers; electrical upgrades and weatherization measures
 - Rebate amounts TBD; up to \$14,000 per rental unit
 - Retrofits or new construction
- **HER:** Home Efficiency Rebate Program
 - Rebates for weatherization measures: retrofits only
 - Rebates of \$4,000 to \$8,000 depending on level of efficiency gains

STATE INCENTIVE PROGRAMS

NHSaves Efficiency Programs

□ Energy Star Homes

- Rebates of \$500 to \$1000 per unit for new construction or gut rehab projects
- Must make unit 15% – 30% more efficient than a standard, code-built home/unit
 - Drive Towards Energy Star
 - Energy Star 3.1
- Eligible measures: air-tight construction; effective insulation; high performance windows, energy star lighting and appliances, etc.

STATE INCENTIVE PROGRAMS

NHSaves Efficiency Programs (cont.)

□ Home Energy Assistance Program (HEA)

- Rebates of up to \$15,000 per unit for retrofits
- Covers 100% of installed costs for insulation, air sealing, high efficiency windows and doors, HVAC repairs or replacements, and other measures
- Community Action Agencies perform the work

STATE INCENTIVE PROGRAMS

NH Department of Energy – Renewable Energy Fund

- ❑ **C & I Solar Electric Rebate Program**
 - Rebate of up to 25% of system cost or \$10,000, whichever is less

- ❑ **Low-Moderate Income Solar Grant Program**
 - Competitive grant program for community solar projects – group net metered
 - RFP was issued earlier this week
 - Total funding of \$1.5 million
 - Grant awards of up to \$400,000
 - More funding available in future years via NH DOE Solar for All program