



BUILDING  
DECARBONIZATION  
COALITION

---

# Joint Vision for a Decarbonized Marketplace

## **Introduction**

Policymakers in jurisdictions across the U.S. have committed to reducing and eventually eliminating greenhouse gas emissions from the built environment. The undersigned organizations—manufacturers of space heating, water heating, and air conditioning equipment, as well as home appliances—share that aspiration. We are united in a commitment to offer our insights and experience to policymakers as they craft and execute pragmatic policies to decarbonize buildings. We believe that, done well, building decarbonization can lead to greater energy savings, greenhouse gas emission reductions, increased quality of life, and investment in our local communities.

Aggressive heat pump deployment is necessary to achieve our shared decarbonization goals. Well-designed state policies and regulations are critically important to the successful deployment of heat pump technologies at scale. Clear regulations with built-in flexibility, coupled with realistic implementation timelines and supported by easy-to-use incentive programs, will provide manufacturers with the business certainty they need to continue to bring a broad range of commercially desirable electrification technologies to market. This, in turn, will help to ensure the viability and long-term success of the building decarbonization transition.

## Market Development

The marketplace for heat pumps will require substantial growth and development if state and local greenhouse gas reduction goals are to be met. Federal and industry data on heat pump market penetration reveals:

- Fewer than 50% of homes use a heat pump for space heating in every state, and in more than half of the states, fewer than 10% of homes use one.
- Heat pump water heaters only account for 1-2% of all units sold nationally each year.
- Nationwide, less than 20% of commercial and institutional floor area is served by a heat pump.

Funding from the Inflation Reduction Act (IRA) will provide a strong foundation for states as they update their building decarbonization policies and programs. But the IRA is not a silver bullet. States must continue to take an active role. Building the heat pump marketplace will require an investment of time and resources in a range of policy and program areas, including, but not limited to:

1

---

**Consumer education campaigns** designed to make heat pumps easy to understand and desirable for the full range of communities and constituencies, including **one-stop-shop incentive program navigation resources** for consumers and small businesses.

2

---

**Expanded workforce development programs** and partnerships to recruit and train a new generation of tradespeople, retain existing technicians, and reduce the soft costs of the transition for all contractors.

3

---

**Holistic energy system transition planning** at public utility commissions, designed to chart a path forward for the electric grid and the natural gas system as Americans electrify their homes, businesses, and vehicles.

4

---

Dedicated, long-term, adequate **funding for electrical service upgrades, weatherization, and health hazard remediation** to remove the cost barriers to decarbonization for certain buildings.

5

---

Stable, well-funded, and easy to navigate incentive programs targeting **multiple links in the supply chain**, i.e. wholesalers, contractors, and consumers.

## Policy Opportunities

The undersigned companies each execute a sophisticated product development and manufacturing operation which is designed to respond to consumer demand. The value of manufacturers' considerable investment in electrification product lines will be at risk if consumer demand fails to materialize. States can create a positive business environment by making pragmatic, enforceable decarbonization commitments and adopting long-term plans with clear benchmarks, supported with stable funding. Factors to consider when undertaking these plans and commitments include:

- **Regulatory backstop.** Regulation is essential. The marketplace will not scale without clear regulatory requirements—not just incentives. Regulations must be simple and transparent enough to send an unmistakable signal to the marketplace, but they must avoid arbitrarily stifling the technological innovations that will help to set the hardest-to-decarbonize installations on a path to net-zero by 2050.
- **New construction.** Installing heat pumps in new construction is generally easier than doing so in an existing building. Encouraging or requiring all-electric new construction can help to cost-effectively grow the marketplace for efficient electric space heating and water heating products in the immediate term.
- **Replacements on failure.** State decision makers should consider adopting policies and programs that encourage climate-appropriate heat pumps as replacements for existing equipment. Replacing air conditioners and electric resistance water heaters with heat pumps upon equipment failure could more than double air-source heat pump uptake and multiply heat pump water heater installations by a factor of 20 or more before 2030. Encouraging the replacement of fossil fuel-fired space and water heating equipment with heat pumps upon failure could increase market penetration even more dramatically.  
  
Because nearly all equipment replacements occur in emergency situations, it will be important to design programs such that building owners are encouraged to preemptively replace equipment that is near the end of its useful life. More investment in barrier mitigation—e.g., electrical service upgrades—would enable early-replacement programs and make the decision to electrify easier for consumers. It will also be necessary to ensure that program incentives can be used in fuel switching situations.
- **Electric ratemaking.** Building owners are less likely to electrify if doing so will increase their energy bills. Decarbonization must proceed in a way that is fair, equitable, and consumer-friendly, and reforms to electric ratemaking could help consumers and the marketplace ease into the transition. In evaluating potential reforms, it will be essential to strike a balance between the need to send a price signal that encourages energy efficiency, the desire not to penalize those who do electrify, and the imperative not to add to the energy burden of those who can least afford a price increase.
- **Diversity of touch points.** Program administrators will achieve greater impact and compounding benefits by designing incentives to target multiple sales channels and points in the value chain, including point-of-sale rebates, mid-stream incentives, and others. Increased engagement with supply chain actors should also include efforts to educate distributors, retailers, and contractors about states' long-term decarbonization plans, which could help to increase comfort with the transition among these customer-facing organizations.

## Making Heat Pumps Accessible

It is critically important that communities across the income spectrum share in the quality of life improvements and energy savings that building decarbonization can bring. Certain households are less likely to be able to access and benefit from highly efficient appliances and systems, either because the up-front cost is too high or because they do not own their home. It will be necessary to provide meaningful assistance to these consumers and communities if states expect to achieve heat pump market penetration targets.

User-friendliness is an indispensable characteristic of successful incentive programs, benefiting consumers, manufacturers, distributors, retailers, and contractors alike. Yet program simplicity is doubly important for low- and moderate-income households, who often face burdensome documentation requirements to prove their eligibility for higher incentives. Program administrators should especially prioritize user-friendliness in the context of their income-eligible offerings. In addition, for these and all households, state and utility administrators can amplify bill savings by offering wrap-around programs that combine weatherization upgrades with heat pumps in one offering.

## Conclusion

We look forward to continuing to work with state and federal government entities and our partners in the supply chain to ensure that decarbonization of the nation's building stock proceeds in a fashion that is safe, smooth, durable, consumer-friendly, environmentally responsible, and economically beneficial.

*Agreed to in coalition on November 9, 2023*

## Energy System Planning

We acknowledge the potential stress on energy systems – for example, added peak demand on the electric grid – that could arise from widespread, full electrification of buildings and transportation. As such, we ask states to consider launching holistic, statewide planning processes that account for and address both electric and fossil fuel system impacts. We believe that an unmanaged transition could hinder energy system reliability, stifle innovation, add unnecessarily to the cost of decarbonization, and lead to negative consumer perceptions of electrification.

Similarly, we affirm the potential for cost, efficiency, pollution, and equity benefits from decarbonizing buildings at scale, on a neighborhood-by-neighborhood basis. Electrifying whole neighborhoods at once through a centrally-managed, statewide process could allow the marketplace to harness economies of scale and keep consumer costs reasonable through the transition. Flexibility in the treatment of fuel backup or hybrid heating arrangements may be necessary as part of a managed transition, as a temporary step on a path to a net-zero energy system.

The undersigned companies are committed to working with state and utility leadership to explore the best pathways to achieving building electrification at scale.

