

IMPACT REPORT UPDATE 2023

ACCELERATING EQUITABLE BUILDING ELECTRIFICATION BY ADVANCING INNOVATION IN CITIES

2018-2023

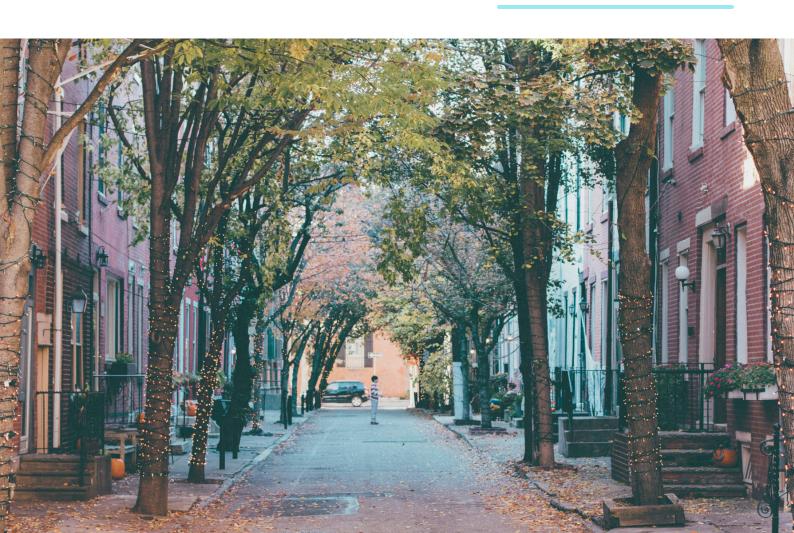


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OVERVIEW

Cities are powerful change agents. As the most nimble level of government, cities can launch innovative and equitable policy solutions that can inspire and serve as models for policymakers at all levels of government. The Inflation Reduction Act (IRA) and Infrastructure Investment and Jobs Act (IIJA) have opened the floodgates to unprecedented investment in building decarbonization, and cities are on the frontlines of implementation. BEI is uniquely positioned to help cities and communities develop the mechanisms necessary to direct those funds to historically marginalized communities, where they will have the greatest impact.

BEI equips cities and communities with the knowledge, skills, and resources they need to co-create ambitious and equitable strategies to accelerate building electrification. We drive change at scale by translating cutting-edge best practices from cities to spur state, regional, and national progress toward fossil fuel-free buildings. And we prioritize processes and outcomes that actively advance racial and social justice and avoid harm to historically marginalized communities.

BEI's impact continues to grow. When BEI launched in 2018, no U.S. city or state had seriously pursued building electrification. Today, nearly 100 cities and a dozen states are forging ahead with building electrification efforts, inspired by BEI's work with leading cities. BEI has helped change the national conversation, redefining what is possible and building critical momentum for progress at all levels of government.

Read about our prior accomplishments in BEI's 2018-2023 Impact Report.

EI'S VISION

BEI envisions a future where buildings are healthy, safe, resilient, and fossil fuel-free. As a result, our air will be cleaner, housing will be more affordable, and our communities will be healthier. The transition will create good local jobs for those who need them most and the benefits will be shared equitably among all.



SUMMARY OF PROGRESS

BETWEEN 2018-2023, BEI:



 Helped spur the launch of over 60 local, state, and regional building electrification programs, policies, and initiatives across 12 cities and seven states, affecting more than 60 million people. These included all-electric new construction codes, building performance standards, and community-driven retrofit programs that channel funding to frontline communities.



 Unlocked over \$100 million in direct investments from cities and their partners to drive the equitable transition to fossil fuelfree buildings.



 Influenced the design of nearly a dozen federal funding programs and identified critical IRA and IIJA opportunities for our cities that will help unlock billions in federal funding.



 Helped dozens of policymakers lead co-creation processes to build engagement, trust, and accountability with frontline communities and broad stakeholder coalitions.



Informed the work of hundreds of local governments across
the country by sharing innovations and successful strategies
through learning groups, cohorts, and online resources.



 Provided thought leadership to the field by authoring and sharing more than 40 original reports and resources on equitable building electrification.



Over the past five years, BEI has honed in on three critical strategies to advance the innovative edge of electrification in cities:

- Building electrification policies that drive upgrades in new and existing buildings,
- Community-driven retrofit programs that deliver funding and technical assistance to frontline communities, and
- **Utility transition planning** to advance a fully fair, long-term transition away from fossil fuel infrastructure.

At the same time, BEI has worked to scale up the most impactful strategies piloted in our leading cities, sharing our research, case studies, and best practices through state, regional, and national networks.

WHAT EQUITY MEANS TO US

- Inclusive planning and decisionmaking processes that center the voices of historically marginalized communities
- Outcomes that advance the needs and priorities of historically marginalized or negatively impacted communities
- Systems transformed to repair harm, rebalance power, and increase wellbeing now and for future generations

PARTNERS SAY...

"BEI and its staff have been visionaries for centering building electrification work in equity. It is by intent, not coincidence, that the cities BEI works with are the cities that adopt community- and equity-centered buildings policies."

- Sierra Martinez, Former Program Director, Energy Optimization for the Energy Foundation





Setting the Pace with Transformative Building Policies

BEI partner cities have been the nation's leaders in enacting policies that encourage or require both new and existing buildings to electrify. Policy requirements are necessary because voluntary action alone will not achieve ambitious climate targets.

BEI cities have enacted nearly a dozen new policy approaches that have gone on to inform state and regional policies – including building performance standards, appliance emissions standards, and replace-on-burnout requirements. See the following page for a list of policies enacted in BEI cities and jurisdictions.

CASE STUDY

Partnering with Labor to Develop a Reach Code in San Diego

BEI mobilized San Diego city staff to deeply engage labor in the development of an all-electric "reach code" policy for new construction. Understanding the regional influence of Sempra – the gas company that owns Southern California Gas and San Diego Gas & Electric – BEI designed a participatory research process and spearheaded a jobs impact analysis that allowed city staff to build strong partnerships with affected labor unions.

This process led all impacted unions to either support or remain neutral on the proposed reach code policy, despite initial resistance. Sempra later announced its <u>support for San Diego's efforts to transition away from gas</u>. The City paused its policy in 2023 after the 9th Circuit Court of Appeals ruled that federal law preempted the proposed reach code, but is working now to enact a new policy approach that will withstand legal challenge. Once it does, San Diego will become one of just a handful of Southern California cities with an all-electric new construction policy, demonstrating a powerful pathway for success grounded in partnership and transparency.

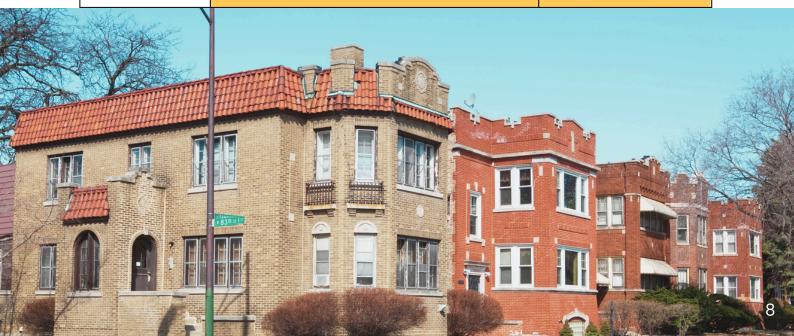
BUILDING POLICIES IN BEI CITIES

Berkeley	All-electric Required or Encouraged Code for New Construction and Major Renovations	Enacted 2019 Update in Progress
	Prescriptive Upgrades Required at the Time of Building Sale	In Progress
Boston	Building Performance Standard for All Buildings >20,000 sq. ft.	Enacted 2021
Boulder	Rental Efficiency Requirements for All Rental Properties	Enacted 2018
Burlington	Efficiency Requirements for All Rental Properties with Heating Loads >50K BTU/yr	Enacted 2020
	All-electric Encouraged Code for New Construction and Major Renovations	Enacted 2021 Updated 2023
	Carbon Fee for Fossil Fuel Use	Enacted 2021
	Electric Encouraged at System Replacement for All Large Commercial Buildings	Enacted 2023
Denver	Building Performance Standard for All Buildings >25,000 sq. ft.	Enacted 2021
	Electric Required at System Replacement for All Commercial & Multifamily Buildings	Enacted 2021
	Prescriptive Requirements for Small Buildings 5,000-25,000 sq. ft.	Enacted 2021
	All-electric Required Code for Multifamily and Commercial New Construction; All-electric Encouraged Code for Small Residential Buildings	Enacted 2023



BUILDING POLICIES IN BEI CITIES

Los Angeles	All-electric Required Code for New Construction and Major Renovations	Enacted 2022 Update in Progress
New York City	Building Performance Standard for All Buildings >25,000 sq. ft.	Enacted 2019
	All-electric Required Code for New Construction	Enacted 2021
Salt Lake City	All-electric Required Policy for Publicly- funded Redevelopment	Enacted 2021
San Francisco Bay Area	Appliance Emissions Standard at the Time of Replacement for All Gas Furnaces and Gas Water Heaters	Adopted 2023
San Diego	All-electric Encouraged Code for New Construction and Major Renovations	In Progress
San José	All-electric Encouraged Code for New Construction and Major Renovations	Enacted 2020 Updated 2023
Washington, D.C.	Building Performance Standard for All Buildings >25,000 sq. ft.	Enacted 2018
	All-electric Required Code for New Construction and Major Renovations	Enacted 2022



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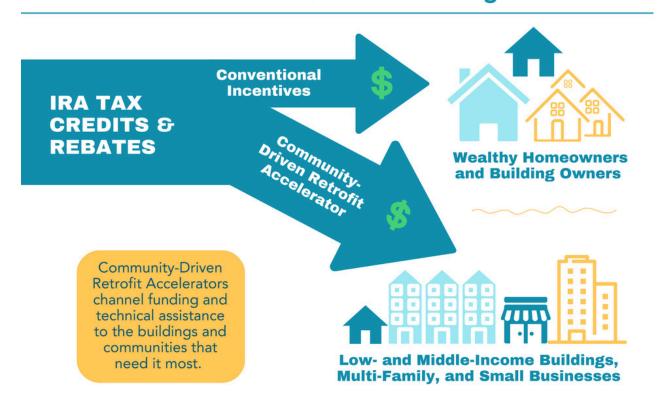
Launching Community-Driven Retrofit Programs and Channeling Investments into Frontline Communities

BEI cities are spearheading programs that help ensure low- and moderate-income households in frontline communities have the funding and technical assistance they need to transition off fossil fuels and address other housing quality needs. BEI and its cities are advancing the concept of **community-driven retrofit accelerators:** one-stop shops that provide property owners and households with free, unbiased, and expert guidance to complete retrofits.

These programs channel resources to frontline communities and help building owners and households find qualified local contractors, comply with city or state policies, stack funding sources, and complete deferred health and safety upgrades, like mold abatement or electric wiring upgrades.

BEI helps cities co-create these programs in partnership with representatives of frontline communities, so that the suite of services are customized to meet the community's needs and priorities.

Community-Driven Retrofit Accelerators Direct Funds to LMI Buildings



CASE STUDY

Supporting and Protecting Denver's Equity Priority Buildings

While developing the trailblazing <u>Energize Denver law</u> in 2021, Denver city staff heard loud and clear from stakeholders that under-resourced buildings could not comply with the law without dedicated support and strong protections for vulnerable residents. With BEI's expert guidance, Denver designed two programs funded by the <u>Climate Protection Fund</u> to achieve these goals: a \$41 million Building Electrification Incentive Program, which covers compliance costs for many under-resourced buildings, and a \$10 million Healthy Homes Program, which documents best practices for electrifying affordable housing, including how to address more holistic health, safety, and deferred maintenance needs.

BEI helped the City structure the programs to be iterative and responsive to community feedback. In 2023, BEI provided recommend-ations, underpinned by research, for deploying tenant protections through the programs. BEI's approach demonstrates that with targeted investments and well-designed programs, cities can implement ambitious building standards while also protecting vulnerable residents.

PARTNERS SAY...

"Gentrification and displacement are significant, top-of-mind issues in some of Denver's under-resourced communities, which happen to be some of the most culturally rich neighborhoods in the city. It is an issue that keeps me up at night. I am thus thankful and appreciate that BEI and Denver leadership are paying attention to the issue and strategizing how best to take displacement into account in the individual and collective work we do."

- Jorge Figueroa, Community Partnerships Administrator, Office of Climate Action, Sustainability, and Resiliency, City and County of Denver



CASE STUDY

National Partnership on Community-Driven Building Retrofit Programs

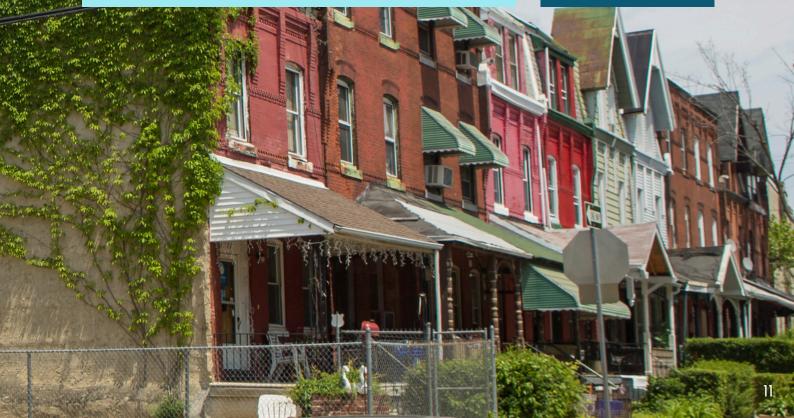
In 2023, BEI launched a national partnership focused on identifying and sharing best practices for building retrofit program design as a key strategy to ensure equitable and effective IRA implementation. In addition to BEI, this partnership includes Elevate, Emerald Cities Collaborative, the Greenlining Institute, Greenlink, Rising Sun Center for Opportunity, Evergreen Action, C40, and NRDC.

In January 2024, the partnership released Guidelines for Maximizing the Benefits of Federal Investments in Buildings to provide a starting point for policymakers designing programs with IRA and IIJA funding. The partnership also provided trainings on building retrofit program design for USDN's Climate Pollution Reduction Grant (CPRG) Assistance Project. In 2024, the partnership aims to launch federally-funded community-driven retrofit programs in at least five locations, shine a light on the best practices identified through these programs, and inspire a wider network of policymakers and advocates to advance community-driven retrofit programs across the country.

PARTNERS SAY.

"The BEI team [is] highly organized, engaged, and holds the values to work for an equitable climate future. We have relied on them to bring technical expertise on electrification to many Bay Area and California community education and engagement efforts."

- Neha Bazaj, former Senior Economic Inclusion Manager for the Bay Area, Emerald Cities Collaborative



03

Planning an Equitable Utility Transition

A successful and equitable transition away from fossil fuels will require both electric and gas utilities to undergo major transitions to support a highly electrified, clean energy future. This transition creates new growth opportunities for electric utilities, but poses a threat to gas utilities, which employ thousands of unionized gas workers.

Where cities have municipally-owned utilities or community choice energy programs, BEI works with local policymakers to develop transition plans that ensure energy reliability, protect low- and moderate-income customers, and create career pathways for workers. Where cities are served by investor-owned utilities, BEI works with cities and community groups to advocate for state policymakers to direct utilities to engage in long-term gas transition planning, conduct rate reform to protect low-income residents from rising energy bills, and enable gas utilities to invest in thermal energy networks powered by renewable energy such as geothermal – a promising opportunity for repurposed infrastructure and reskilled gas workers.

PARTNERS SAY..

"BEI provides much needed and valued project guidance and coordination, strategic thought leadership, expert research and analysis, and development and coordination of impactful partnerships with local labor unions and partners. We lean on and greatly value BEI's expertise and support. Their work is extremely impactful in ensuring a just and equitable clean energy transition in Philadelphia."

Nidhi Krishen, Senior Manager for Climate Mitigation,
 Office of Sustainability, City of Philadelphia



Forging an Equitable Transition for Philadelphia's Gas Utility Workers

The City of Philadelphia has engaged in efforts to explore options for its municipally-owned gas utility, Philadelphia Gas Works (PGW), which employs more than 1,600 local workers. The City of Philadelphia and PGW share a common goal: to protect the livelihoods of the dedicated utility and administrative workers at PGW who collectively hold decades of training, experience, and public service.





PHILADELPHIA BUILDING DECARBONIZATION WORKFORCE IMPACTS AND OPPORTUNITIES

COMPLETED OCTOBER 2023 UPDATED FEBRUARY 2024



BEI advised the City on the <u>PGW Business Diversification Study</u>, which identifies potential pathways for transitioning PGW away from gas. BEI then worked with the Economy League of Greater Philadelphia to assess the workforce implications of implementing potential decarbonization technologies in Philadelphia, resulting in the report: <u>Philadelphia Building Decarbonization Workforce Impacts and Opportunities</u>. The report finds that by deploying multiple fossil fuel-free technologies, including large-scale district geothermal networks, and collaborating closely with the existing workforce, the City can create new economic opportunities for PGW and career paths for its workers while addressing climate change.

By working closely with partners, including its gas workers union, Philadelphia can illuminate a path for gas utilities and workers that others around the country can follow.



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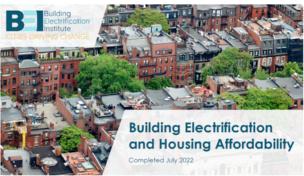
Thought Leadership for the Field

Throughout our national network of local, state, and federal policymakers and nonprofit partners, BEI is inspiring other partners by providing thoughtful analysis and highlighting the most promising and equitable solutions. We are elevating the powerful message that the shift away from fossil fuels in buildings is both inevitable and already underway, and there are many promising solutions that can help multi-solve issues of racial justice, economic inclusion, and housing affordability.

BEI has published over 40 original resources and reports that are available for download on our resources page at www.beicities.org/resources. Below are a few examples of BEI's practical, field-building analyses, frameworks, and reports rooted in our experience in leading cities. (Images are clickable links.)













PARTNERS SAY...

"BEI has done more to accelerate equitable building electrification in Berkeley than any other organization. Their analysis, support, and strategic intervention was critical in changing Berkeley's prevailing theory of change – away from one that centered on removing barriers and market transformation to a focus that centers equity and resilience for frontline communities."

- Billi Romain, former Manager of Office of Energy and Sustainability, City of Berkeley

BEI CITIES

Berkeley, CA Denver, CO San Diego, CA

Boston, MA Los Angeles, CA San Jose, CA

Boulder, CO New York City, NY Salt Lake City, UT

Burlington, VT Philadelphia, PA Washington, D.C.



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