











Cover Photo: Michael Browning

ABOUT CLIMATE XCHANGE

31 Saint James Avenue, Fl. 6, Boston MA 02116 Climate-XChange.org | 617.624.0919

Climate XChange is a 501(c)3 non-profit, non-partisan organization with a mission to achieve a durable, just transition away from polluting fossil fuels in the United States. With a three-pronged strategy of direct advocacy, research, and communications, we work to advance climate policy at the state level. We also host the State Climate Policy Network, which brings together changemakers, to learn from each other and increase the ambition, equity and durability of state and local climate policy. Learn more at climate-xchange.org.

ABOUT FAIRMOUNT-INDIGO CDC COLLABORATIVE

594 Columbia Road, Suite #302, Dorchester, MA 02125 fairmountcollaborative.org | 617-825-4200,

The Fairmount-Indigo CDC Collaborative is a community development corporation whose members include Dorchester Bay EDC, Codman Square NDC, and Southwest Boston CDC. We serve the predominantly low- and moderate-income neighborhoods along the Fairmount Commuter Rail Line from Hyde Park to North Dorchester in Boston. We have strong track records in building thriving and diverse neighborhoods – creating new affordable and mixed-income housing, economic development opportunities, and avenues to foster resident and youth leadership. Together, we are helping to bring more reliable and affordable public transit options and new investments in housing, commercial development, and open space to benefit the residents living within the Fairmount Corridor.

LEAD AUTHORS

Ava Gallo | Research Fellow, Climate XChange

Jonah Kurman-Faber | Research Director, Climate XChange

Saba Ijadi | Climate Justice Coordinator, Fairmount-Indigo CDC Collaborative

Sarah Xu | State Climate Policy Network Fellow, Climate XChange

REPORT DESIGN

Amanda Griffiths Pontillo | Creative Director, Climate XChange

CONTRIBUTORS

Karl Celis | Graduate Student, University of Massachusetts Boston

Nina Schlegel | Global Center for Climate Justice

 $\textbf{\textbf{Joe Kriesberg}} \mid \textbf{Massachusetts Association of Community Development Corporations}$

Andrew Seeder | Conservation Law Foundation

Dave Christopolis | Hilltown Community Development Corporation

Anna Leslie | Allston-Brighton Health Collaborative

Sarita Hudson | Public Health Institute of Western Massachusetts

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Executive Summary

It is imperative that during this time of coinciding public health and climate crises, the voices of frontline organizations in Massachusetts are centered in designing solutions. Communities thrive when they are able to use their expertise to envision and shape the outcomes that best fit local priorities. When it comes to investment programs, they are most effective when rooted in the lived experience of communities.

Climate XChange embarked on this research project to highlight the priorities of frontline organizations across Massachusetts for how to best allocate government investments spurred by this moment of economic, social, and climate crises. This study is complementary to a technical report authored by Climate XChange, entitled, "Investing in a Better Massachusetts: An Analysis of Job Creation and Community Benefits from Green Investments," which models the potential jobs, health, and energy cost benefits from dozens of green investments across the Commonwealth. The numbers and lived experiences tell a clear story of what kinds of projects would best serve communities in Massachusetts.

Government spending has dominated the political conversation since the beginning of the pandemic; however, it is critical that these projects do not repeat the failures of their predecessors. Black and Brown Americans have long been excluded from the benefits of stimulus spending since the New Deal, and more recently through the American Recovery and Reinvestment Act of 2009. These instances of isolation from benefits have had lasting repercussions on communities of color, creating roadblocks for communities to thrive. Additionally, frontline communities in Massachusetts have been disproportionately impacted by the effects of the pandemic, in part due to their increased exposure to environmental hazards.

With this context in mind, Climate XChange partnered with Fairmount-Indigo CDC Collaborative and spoke to a broad set of individuals from organizations working with frontline communities about their priorities for investment spending. Individuals came from across the Commonwealth from urban, suburban, and rural areas and represented community organizations, community development corporations (CDCs), labor unions, and two-year colleges.

In these conversations, community leaders stressed the urgency of meeting the immediate needs of residents, which have been exacerbated

by the pandemic, including: rent and mortgage payments, food insecurity, and loss of employment. Interviewees underscored the need to reduce the current stress and suffering within communities from the most harmful effects of the pandemic before moving to more long-term investments. At the same time, frontline communities will suffer the most from the long-term impacts of the climate crisis. Therefore, it is also vital to make bold, proactive policy choices to both reduce greenhouse gas emissions as well as address the immediate needs of communities in Massachusetts heavily impacted by the pandemic. Investments need to accomplish both concurrently.

Interviewees also emphasized values that should resonate with any public investment program. These included:

- · Centering the needs and voices of frontline communities,
- Not repeating historical inequities within systems,
- Increasing social mobility,
- · Building on existing successful programs, and
- · Fostering community leadership and empowerment.

These ideals carried through three areas of investment: housing, job creation, and infrastructure. This research also illuminates how to exemplify these values through the process and design of investment packages in order to uplift all residents equitably.

In the wake of immense tragedy and inequity, decision-makers have an opportunity to use historic investments to help all communities in Massachusetts thrive. However, it is vital that the decisions made reflect the urgency of the problems experienced by frontline communities. If this time is squandered and not used to its full potential, generations will continue to suffer from the outcomes of historical discrimination, which are only exacerbated and compounded by cascading crises in the present day. It is imperative that investment projects are designed to acknowledge structural barriers and work towards a more healthy and equitable future for all.

Values that should resonate with any public investment program include:

> **Centering the needs** and voices of frontline communities

Not repeating historical inequities within systems

Increasing social mobility

Building on existing successful programs

Fostering community leadership and empowerment

Values were applied over four investment areas:

Job Creation

Housing

Infrastructure

Design and Process





In this moment of overlapping health and climate crises in Massachusetts, it is vital that the needs and strengths of those who are on the frontlines are central in efforts to address these issues. Climate XChange and Fairmount-Indigo CDC Collaborative embarked on a research project to highlight perspectives from frontline community organizations1 on the design and implementation of government investment programs. Communities thrive when they are able to use their expertise to envision the solutions that best fit local priorities,2 and investment programs also function most effectively when rooted in the lived experience of communities.3

Rooted in these ideals, Climate XChange and Fairmount-Indigo CDC Collaborative engaged in conversations with frontline community leaders across the state from January to March 2021. These discussions sought to understand the challenges they see in their communities, comprehend their long-term vision for solutions, gather their priorities for how investments should be spent, and identify ways to make the benefits

of investments accessible to all. The researchers talked with individuals from organizations working in communities of color and lowincome communities, labor unions, women-led organizations, local colleges, and organizations representing communities affected by sea level rise.

In these conversations, community leaders stressed the urgency of meeting the immediate needs of residents, which have been exacerbated by the pandemic, including: rent and mortgage payments, food insecurity, and loss of employment. Interviewees underscored the need to reduce the current stress and suffering within communities from the most harmful effects of the pandemic before moving to more long-term investments. However, frontline communities will suffer the most from the long-term impacts of climate change. It is vital to take bold, proactive actions to both reduce greenhouse gas emissions as well as address the immediate needs of communities in Massachusetts heavily impacted by the pandemic. Investments need to accomplish both concurrently.

^{1 |} The term "Frontline communities" is defined in this report as communities that are disproportionately impacted by the effects of the pandemic and climate change and often left out of decision-making processes.

^{2 |} Pyles, Loretta, et al. "Citizen Participation in Disaster Recovery Projects and Programmes in Rural Communities: a Comparison of the Haiti Earthquake and Hurricane Katrina." Disasters, vol. 42, no. 3, 2017, pp. 498-518., doi:10.1111/ disa.12260.

^{3 |} Jaskulowska, Joanna. "Public Participation After Natural Disaster - Case Study Of Christchurch Earthquake Response." Zarzadzanie Publiczne.47 (2019): 225-45. ProQuest. Web. 8 Dec. 2020







Five values emerged from the conversations, which are central to any and all investments:

- Centering the needs and voices of frontline communities,
- Not repeating historical inequities within systems,
- · Increasing social mobility,
- Building on existing successful programs, and
- Fostering community leadership and empowerment.

These values should be reflected in every investment package; however, community leaders noted specific applications within three major investment categories: job creation, housing, and infrastructure. This research also illuminates how to exemplify these values through the process and design of investment packages in order to uplift all residents equitably. These programs and policies are reflected in the chart on the following page.

The solutions and recommendations for government investments provided by community leaders in this report illustrate the unique challenges faced by the communities they serve, but also exemplify the larger obstacles frontline communities face when grappling with compounding crises. Legislators have an opportunity to recognize and comprehend these cascading impacts on a deeper level and incorporate them into the design of investment packages, so that all Massachusetts residents, especially those on the frontlines, can be lifted up by their benefits.

Centering the



THE EFFECTS OF THE PANDEMIC AND ENVIRONMENTAL INJUSTICE IN MASSACHUSETTS

The findings of this report are contextualized by the compounding crises faced by Massachusetts residents. The COVID-19 pandemic has had dramatic economic, social, and public health impacts across the United States, and Massachusetts has not been immune to these effects. At the height of the pandemic, the state had the highest unemployment rate in the country,4 and the Congressional Budget Office estimates it will take a decade to fully recover.5 Even as unemployment levels have receded over the summer months, they still remain at levels 250 percent higher than pre-pandemic,6 and Black, Latinx, and Asian residents still face higher levels of unemployment than their white counterparts.7 Additionally, food insecurity levels have skyrocketed in the state. Feeding America cites Massachusetts as the state with the highest increase of food insecurity rates due to the pandemic with an increase of 59% since 2018.8

The severe health effects of the pandemic have also hit communities of color harder than other communities due to their disproportionate exposure to environmental burdens. A study completed by Harvard T. H. Chan School of Public Health reported that even a small increase in long-term exposure to fine particulate-matter pollution (PM2.5) leads to a large increase in the COVID-19 death rate. In Massachusetts, concentrations of PM2.5 are highest for Black and Latinx residents due to the historical shift of environmental burdens (such as the placement of major highways and thoroughfares) into communities of color, affecting air quality and asthma rates to the present day. 10

- 4 | "Assessing the Economic Damage of the COVID Crisis Four Months In." Boston Indicators, 12 Aug. 2020, www. bostonindicators.org/reports/report-website-pages/covid_indicators-x2/2020/august/economic-impact-brief.
- 5 | "Re: Comparison of CBO's May 2020 Interim Projections of Gross Domestic Product and Its January 2020 Baseline Projections." Congressional Budget Office, 1 June 2020, https://www.cbo.gov/system/files/2020-06/56376-GDP.pdf
- **6** | Bureau of Labor Statistics, "Local Area Unemployment Statistics." May 6, 2021. https://data.bls.gov/timeseries/LASST25000000000003?amp%253bdata_tool=XGtable&output_view=data&include_graphs=true
- 7 | "Assessing the Economic Damage of the COVID Crisis Four Months In." Boston Indicators, 12 Aug. 2020, www. bostonindicators.org/reports/report-website-pages/covid_indicators-x2/2020/august/economic-impact-brief.
- 8 | Hake, Monica, et al. "The Impact of the Coronavirus on Food Insecurity in 2020." Feeding America, October 2020, https://www.feedingamerica.org/sites/default/files/2020-10/Brief_Local%20Impact_10.2020_0.pdf Accessed 7 December 2020.
- 9 | Wu, X., Nethery, R. C., Sabath, M. B., Braun, D. and Dominici, F., 2020. Air pollution and COVID-19 mortality in the United States: Strengths and limitations of an ecological regression analysis. Science advances, 6(45), p.eabd4049. 10 | Pinto de Moura, Maria Cecelia, et al. Union of Concerned Scientists, 2019, Inequitable Exposure to Air Pollution from Vehicles in Massachusetts. https://www.ucsusa.org/sites/default/files/2020-05/inequitable-exposure-to-vehicle-pollution-ma.pdf



STIMULUS SPENDING

As a result of the economic strife exacerbated by the pandemic, stimulus packages have dominated the political conversation since the beginning of the pandemic. Federal, state, and local officials have debated the efficacy and efficiency of different strategies to get money in the hands of Americans. In March 2021, President Biden announced his "once in a generation" American Jobs Plan, pledging to invest trillions of dollars into rebuilding our country's crumbling infrastructure, create 19 million jobs,11 and begin the transition to a green economy.12

However, stimulus spending in the United States has a history of race, gender, and class exclusion. Although many Americans benefitted greatly from the social and economic programs of the New Deal in the 1930s, Black and Brown Americans did not receive those same benefits due to intentional exclusion from Social Security, lack of protection from the National Labor Relations Act, and discrimination from the Home Owners

Loan Corporation and the Federal Housing Administration.13 The American Recovery and Reinvestment Act of 2009 also failed to consider the structural barriers of Black and Latinx Americans during the 2008 recession, thus creating a stimulus package that did not lift all Americans up equitably.14

In order to increase the physical, social, economic, and mental well-being of all people, it is vital to consider the structural barriers that have prevented certain communities from accessing the benefits of investments in the past. In design and implementation, legislators need to think through how to make investments accessible to everyone while relying on the intimate community knowledge fostered by local organizations. To address this challenge, Climate XChange and Fairmount-Indigo CDC Collaborative conducted a series of interviews with frontline community leaders to understand how government investments can best support their communities.

11 | Kessler, Glenn. "Analysis | Biden's Pitch That the Economy 'Will Create 19 Million Jobs' If Infrastructure Is Passed." The Washington Post, WP Company, 6 Apr. 2021, www.washingtonpost.com/politics/2021/04/06/bidens-pitch-thateconomy-will-create-19-million-jobs-if-infrastructure-is-passed/.

12 | "FACT SHEET: The American Jobs Plan." The White House, The United States Government, 31 Mar. 2021, www. whitehouse.gov/briefing-room/statements-releases/2021/03/31/fact-sheet-the-american-jobs-plan/.

13 | Rolley, Otis. "The New Deal Made America's Racial Inequality Worse. We Can't Make the Same Mistake With Covid-19 Economic Crisis." The Rockefeller Foundation, 19 June 2020, www.rockefellerfoundation.org/blog/the-newdeal-made-americas-racial-inequality-worse-we-cant-make-the-same-mistake-with-covid-19-economic-crisis/.

14 | Gray, Vance, et al. "American Recovery and Reinvestment Act of 2009: A Political Analysis of Its Impact on Black and Latino Unemployment in the United States." Race, Gender & Class, vol. 22, no. 3-4, 2015, pp. 107-135. JSTOR, www. jstor.org/stable/26505352. Accessed 26 Mar. 2021.



INTERVIEWS

For interview outreach and implementation, members of both Climate XChange and Fairmount-Indigo CDC Collaborative leveraged their personal knowledge and connections as nonprofits in Massachusetts to reach community organizations. Researchers were mindful of geographical and issue area diversity as outreach for interviews took place. However, this sample of organizations stems from convenience and personal connection rather than a representation of community organizations at large, particularly in the workforce sector. Therefore, the themes drawn in this piece are not representative of frontline communities as whole, but rather only reflective of the interviews with community organizations, community development corporations (CDCs), labor unions, and two-year colleges.

A landscape analysis was conducted of organizations in Massachusetts to gather a representative, though not exhaustive, list of organizations representing frontline communities. Several organizations were initially contacted from the list. An individual from each organization was contacted via email for a 30-minute interview. After initial interviews were conducted, researchers used a snowball technique to recruit additional participants by asking interviewees to recommend contacts for inclusion in the study. Interviewees signed a consent form prior to their interview to give permission to record their conversation and include their responses in this report. Each individual's time was compensated with a \$50 stipend, which could be accepted by the respondent as a personal payment, donated to the organization they represent, or declined.

Each interview consisted of a brief summary of the project and a standard set of eight openended questions with opportunities for follow up. Researchers asked interviewees about the issues facing their community, how they believe investments should be spent to support their community, and how investments can be made accessible for all people.15 Interviews were recorded for transcription and analysis purposes. Overall, 28 interviews were conducted over the course of two months with 29 interviewees. Interviews ranged from 15-45 minutes.

Researchers analyzed the transcripts through DeDoose, a research analysis software commonly used for qualitative and mixed methods research.

A code book was assembled that reflected common themes seen throughout the interview process. Researchers examined each interview and coded each statement of the interview to its corresponding theme(s) in the codebook.¹⁶ Each transcript was analyzed by two researchers, with the first coder analyzing an untouched transcript, and the second coder reviewing a transcript that had already been coded. This process was utilized to systematically draw out common themes and reduce researcher bias in coding priorities.

SURVEYS

A supplemental data collection method included a digital survey to rank various green investments in order of importance to the community of the respondent. The investments resembled a list of programs modeled for their jobs, health, and other community benefits in a companion quantitative report, as a way to draw connections between the priorities of frontline organizations and the measured impacts of said priorities. Each respondent was asked to rank each climate project for its level of importance to their community with the options: Very Important (4), Somewhat Important (3), Neutral (2), and Not a Priority (1). Every interviewee was asked to fill out the climate projects ranking form. Twenty-two out of 29 interviewees filled out the form, a response rate of 76 percent.

Additionally, to gather a broader data set, the form was sent out through email to Massachusetts residents in Climate XChange's State Climate Policy Network (SCPN), a list of 1,158 email addresses. There were 81 respondents from 55 communities across the Commonwealth, a response rate of seven percent. Two respondents were randomly selected to receive a \$50 giftcard to the local business of their choice.

The following sections elucidate the findings from the interview and survey responses, organized into the three major categories of jobs, housing, and infrastructure. There is a fourth section on how to exemplify these values through the design and process of investment packages in order to uplift all residents equitably. Each section contains specific recommendations for that category organized by each of the five aforementioned value areas.

15 | A full list of interview questions can be found in the Appendix.

16 | A full list of codes used in this study can be found in the Appendix.

Community Partner Profiles

ACTION FOR EQUITY

As a coalition of community-based and social justice organizations, Action for Equity works for all people to have quality housing, good jobs and job access, environmental quality, and transportation access, among other things as steps to reach the society they want. They are fighting for an equitable society where power is held by all, regardless of race, class and gender, as well as sexual orientation, age, faith, geography, or physical ability; where the disparities resulting from a history of embedded structural racism are not just gone, but people are made whole; where the benefits of our collective endeavors in government, community building, development, and progress in general are felt by all. They are fighting for a society in which the oppression of many is not used to benefit the few, and where neither race nor anything else is used as a dividing line.

ALLSTON BRIGHTON HEALTH COLLABORATIVE

The Allston Brighton Health Collaborative (ABHC) is a collaboration of organizations devoted to working together to promote and improve the health and wellbeing of the communities of Allston and Brighton. Their strategies for impact are aligned with the Department of Public Health to focus on key social determinants of health areas: Transportation through policy and advocacy, Food Access through programming, Mental Wellness through capacity building, Resource Connection and Clinical/Community Linkages through network strengthening. ABHC is the only cross-sector network of its kind in Boston focused on the social determinants of health and health-related social needs. It's a burgeoning model of backbone, collective impact.

ALLSTON-BRIGHTON COMMUNITY DEVELOPMENT CORPORATION

Allston-Brighton CDC builds a stronger, more stable community by representing and supporting the interests, engagement, and leadership of Allston-Brighton's diverse communities, institutions, individuals, and families of all incomes. Rapidly rising housing costs disproportionately affect the neighborhood's most vulnerable residents, creating housing instability and displacement of low- and moderate-income individuals from critical community assets like public transportation, jobs, health care, their families, and more. ABCDC strives to create a vibrant neighborhood where people of many incomes, races, and genders can live and work.

ALTERNATIVES FOR COMMUNITY AND ENVIRONMENT

Alternatives for Community & Environment (ACE) is a neighborhood based, environmental justice and transitoriented development nonprofit. They organize Roxbury residents and work with community organizers locally, statewide and nationally to build platforms and offer resources that address systemic injustice. They work directly within the frontline communities that are most impacted, bringing critical solutions that include advocacy, organizing, legal and regulatory campaigns. ACE is the first environmental justice nonprofit organization in Massachusetts and has defended the rights of Roxbury residents for over 25 years.

BENJAMIN FRANKLIN INSTITUTE OF TECHNOLOGY

Benjamin Franklin Institute of Technology (BFIT)'s is an affordable, urban, private, nonprofit college serving the Boston region. Their mission is to foster student success and career readiness in technology fields.

CAPE ANN CLIMATE COALITION

The Cape Ann Climate Coalition (CACC) is a group of volunteers who have organized to take action in response to the climate crisis. As residents of Cape Ann, they see and feel the effects of climate change due to a warming climate and rising sea levels. These concerns motivate their members who come with a wide range of experiences, ideas, and skills that reflect the richness of the diversity on Cape Ann. Knowing that they need collaborative efforts towards solutions is the glue that binds them together.

CAPE COD COMMERCIAL FISHERMEN'S ALLIANCE

The Cape Cod Commercial Fishermen's Alliance is fishermen, community members, public officials, and scientists working together to build creative strategies, advocate for improved marine policies, protect the ocean ecosystem, and ensure the viability and future of Cape Cod's fisheries.

COMMUNITY OF INTERNS AND RESIDENTS (CIR) SERVICE EMPLOYEES INTERNATIONAL UNION (SEIU)

The Committee of Interns and Residents (CIR) is the largest housestaff union in the United States. They are a local of Service Employees International Union (SEIU), representing over 17,000 resident physicians and fellows who are dedicated to improving residency training and education, advancing patient care, and expanding healthcare access for their communities. They empower our nation's interns, residents, and fellows to fight for excellence for their patients, their training, and their healthcare system through organizing, collective bargaining and advocacy.

CODMAN SQUARE NDC

Codman Square NDC's mission is to build a cohesive and resilient community in Codman Square and South Dorchester, develop affordable housing and commercial spaces that are safe and sustainable, and promote economic stability for low- and moderate-income residents of all ages. CSNDC serves a two square mile area of Dorchester that is bounded by Columbia Road and Geneva Avenue to the north, Gallivan Boulevard and Morton Street to the south. Blue Hill Avenue to the west, and Dorchester Avenue to the east. Throughout their history, they have concentrated on physical development in their service area, but in the face of growing concerns about gentrification and displacement – and now the unrest caused by long standing racial disparities and injustices which are presenting in disproportionate COVID-19 health impacts, economic insecurities and police brutality - they have become increasingly focused on social, economic, political and racial inequities in their neighborhood.

COMMUNITY ACTION WORKS

Community Action Works believes that environmental threats are big, but the power of well-organized community groups is bigger. That's why they work side by side with everyday people to confront those who are polluting and harming the health of their communities. They partner with the people who are most impacted by environmental problems — which are Black, Indigenous, People of Color and poor communities — training them with the know-how anyone would need to make change in their own backyard. Because when you and your neighbors know how to make change, you can build the power to transform your world.

DUDLEY STREET NEIGHBORHOOD INITIATIVE (DSNI)

DSNI was formed by Dudley residents seeking to reclaim a neighborhood that had been ravaged by disinvestment, arson fires, and dumping. When many had given up, DSNI organized neighbors to create a comprehensive plan and a shared vision for a new, vibrant urban village. To secure development without displacement, DSNI gained eminent domain authority, purchased vacant land, and protected affordability. This process led to family stability and the creation of a community land trust. Today, the once garbage-strewn lots have been rebuilt with quality affordable houses, parks, playgrounds, gardens, community facilities, and new businesses. Through service on DSNI's Board, residents lead an effort that includes all neighborhood stakeholders in a democratically-elected, community process. Together, DSNI has created greater civic participation, economic opportunity, community connections, and opportunities for youth. They have built community across their diversity of language, race, ethnicity, and age. They have invested in their young people and the youth in turn have invested in the community.

EMERALD CITIES COLLABORATIVE

Emerald Cities Collaborative (ECC) is a national nonprofit network of organizations working together to advance a sustainable environment while creating high-road — sustainable, just and inclusive — economies with opportunities for all. ECC develops energy, green infrastructure, and other sustainable development projects that not only contribute to the resilience of our metropolitan regions, but also ensure an equity stake for low-income communities of color in the green economy. This includes developing the economic infrastructure for family-supporting wages and career paths for residents of such communities, as well as contracting opportunities for women, minority and other disadvantaged businesses.

FRANKLIN COUNTY CDC

Headquartered in Greenfield, Massachusetts, the Franklin County Community Development Corporation (FCCDC) is a community economic development non profit organization providing comprehensive business development education, access to capital, commercial office and manufacturing space plus home of the Western Massachusetts Food Processing Center. The FCCDC was formed in 1979 to maximize community control over their future economic destiny. At that time, a number of manufacturing companies in the area were closing and moving elsewhere. The FCCDC has changed over the years as the needs of the community have changed. Yet their programs and activities are still geared toward stimulating a robust economy and expanding opportunities for low- and moderate-income residents.

GREENROOTS

GreenRoots works to achieve environmental justice and greater quality of life through collective action, unity, education and youth leadership across neighborhoods and communities. GreenRoots is a community-based organization dedicated to improving and enhancing the urban environment and public health in Chelsea and surrounding communities. They do so through deep community engagement and empowerment, youth leadership and implementation of innovative projects and campaigns.

GROUNDWORK LAWRENCE

Groundwork Lawrence (GWL) has been making change happen since its beginnings in 1999. Through its environmental and open space improvements, healthy food access programs, youth education, employment initiatives, community programming and events, GWL creates the building blocks of a healthy community, and empowers residents to improve their quality of life.

HILLTOWN CDC

Hilltown Community Development is a private non-profit organization in rural western Massachusetts working to support rural development and prosperity in the region by improving housing, strengthening social services, leveraging funding, and stimulating the local economy.

LAWRENCE COMMUNITYWORKS

Lawrence CommunityWorks (LCW) is a community development corporation that weaves together community planning, organizing, and asset-building efforts with highquality affordable housing and commercial development to create vibrant neighborhoods and empowered residents. By facilitating conversations and action on community priorities, LCW engages partners and a network of youth and adult residents in opportunities to move themselves and the city of Lawrence forward.

MASSACHUSETTS ASSOCIATION OF CDCS

MACDC is a membership organization that seeks to build and sustain a high performing and adaptive community development sector that is supported by private and public investment and sound public policies. They advance racial and economic equity by creating healthy communities where everyone lives in housing they can afford, benefits from economic opportunities and can fully participate in the civic life of their community.

MOBIUS COMMUNITY BUILDERS, INC

Mobius Community Builders's mission is to enlighten, enhance, and improve the quality of life and stability in marginalized communities by developing affordable housing. They believe that community development is essential, and they are committed to building communities that thrive.

NEIGHBOR TO NEIGHBOR

Neighbor to Neighbor represents the "new majority:" people of color, immigrants, women, and the working class, on a path to liberation. Their statewide membership is organizing to put people and the planet before profit. They counter the fear that causes injustice by building power to transform the institutions that govern our lives. In an era of income inequality, environmental degradation, and racism, their chapters are building the power to confront this triple crisis in Massachusetts. They fill the ballot box with their votes. They fill the streets with their voices. They seed the new alternatives that put power and decision-making in the hands of those directly affected. They are certain that a better world is possible and that they are the ones to build it.

NEIGHBORHOOD OF AFFORDABLE HOUSING

NOAH, a community development corporation, promotes equity, community cohesion, environmental justice, and economic resiliency. They increase access to affordable housing, create social and economic opportunities, and empower residents to be leaders of change.

THE NEWMARKET BUSINESS ASSOCIATION

The Newmarket Business Association, a chartered, non-profit organization founded in 1977, is committed to: the continued growth of business in the Newmarket area, promoting business to business interaction, communicating the interests of other members to City and State officials and working with those officials to create a better business climate, and working as the primary advocate and voice of its membership for the betterment of the Newmarket District.

PUBLIC HEALTH INSTITUTE OF WESTERN MASSACHUSETTS

PHIWM provides skills, expertise, and experience to create successful public health campaigns and sustainable system changes to improve health and well-being in Western MA. They build on community assets and build community capacity to positively impact social determinants of health by engaging and partnering collaboratively with communities and leading data to action strategies to champion and advocate for a public policy agenda. Ensuring health equity and challenging institutional racism are core values integrated into all of their services. PHIWM's specialty is to work with and on behalf of communities that experience health disparities. Its efforts highlight and address structures and institutions that cause these disparities, including the destructive racial hierarchy in our society. Together with community partners and residents, PHIWM designs, tests, and implements solutions and policies that result in more equitable access to resources that impact community health.

REVITALIZE CDC

Founded in 1992, Revitalize CDC performs critical repairs, modifications and rehabilitation on the homes and non-profit facilities of low-income families with children, the elderly, military veterans and people with disabilities. They leverage the investments of donors, grantors and volunteers to make significant home repairs that stabilize neighborhoods, strengthen the tax base, and allow elderly homeowners to "age in place."

ROXBURY COMMUNITY COLLEGE

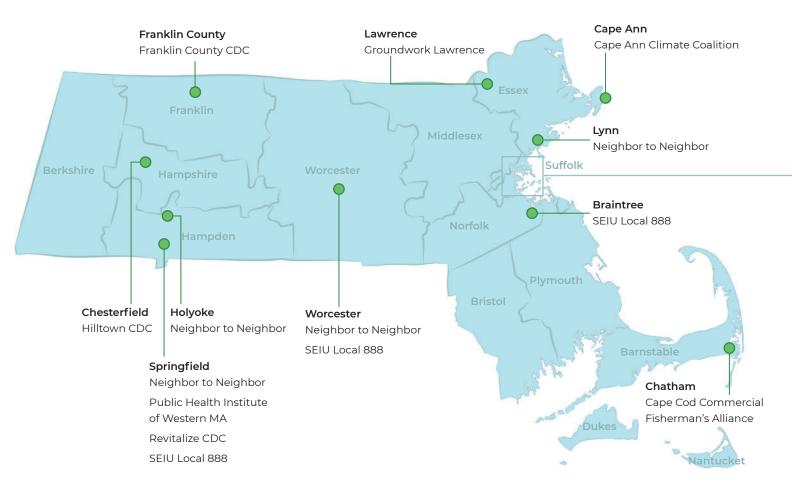
Roxbury Community College is a co-educational public institution of higher education offering Associate Degrees and certificate programs. RCC's primary objective is to provide residents of the Commonwealth, specifically those individuals living in the greater Boston area, "optimum opportunity for access to a college education consistent with their interests and aptitudes and to reduce to a minimum economic, social, psychological and academic barriers to educational opportunity." The college's goals are the result of ideas generated by and from the college community and reflect a response to the needs of the larger Roxbury community.

SERVICE EMPLOYEES INTERNATIONAL UNION (SEIU) 32BJ

SEIU 32BJ represents 18,000 property services workers in Massachusetts, Rhode Island and New Hampshire, including janitors, security officers, maintenance and custodial workers, and window cleaners. Their members clean, maintain and provide security for buildings in the region's leading industries. The New England district has become a leader in immigrant justice, economic justice, racial justice and other community organizing initiatives that impact their members across the region.

SERVICE EMPLOYEES INTERNATIONAL UNION (SEIU) LOCAL 509

SEIU Local 509 represents nearly 20,000 human service workers and educators throughout Massachusetts. They provide a variety of social services to elders, at-risk children and people with mental illnesses or developmental disabilities — as well as educational services in both public and private sector settings. From mental health clinicians and social workers to early childhood educators and university lecturers, Local 509 members are united in their mission to raise living standards for working families while improving the quality and affordability of the services they provide.

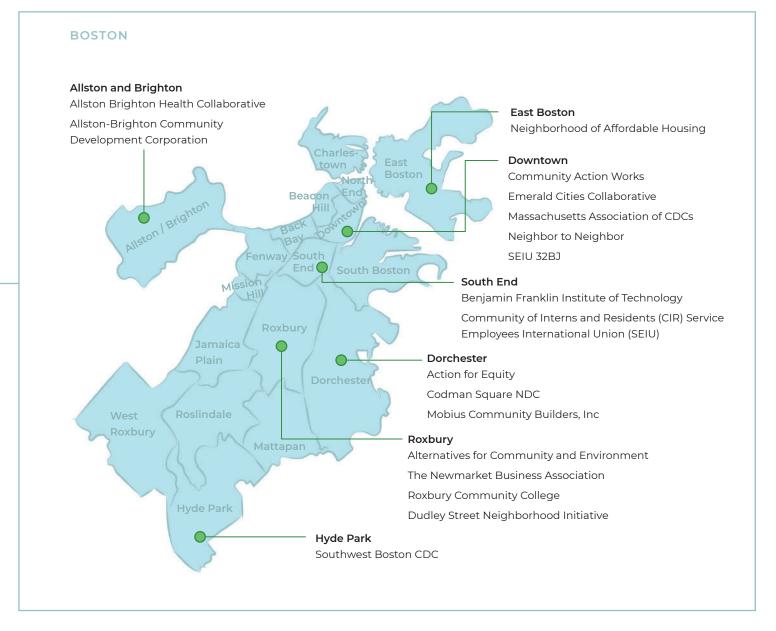


SERVICE EMPLOYEES INTERNATIONAL UNION (SEIU) LOCAL 888

Founded in 2003, SEIU Local 888 unites more than 8,500 public service workers. Their members provide vital support and services in cities and towns throughout the Commonwealth. Local 888 believes in the dignity and worth of the services their members provide. Local 888 is dedicated to improving the lives of their members, their families and the communities they serve.

SOUTHWEST BOSTON CDC

Southwest Boston Community Development Corporation works with partners to build and sustain a thriving, economically diverse community in Hyde Park and Roslindale. They work to prevent displacement, particularly of low and moderate income families and elderly residents, create and preserve affordable housing, strengthen the commercial base of the neighborhoods, ensure access to good transit, protect conservation land and waterways and promote climate resiliency. They are committed to working with local leaders whose voices are not otherwise heard. They are committed to creating more equitable neighborhoods.



Job Creation, Training, & Wealth Building

All 29 interviewees identified job creation and training as solutions to inequality and a critical outcome of investments in Massachusetts. However, they were careful to point out that job creation alone will not meet the needs of recovery from the pandemic or the climate crisis; new jobs must be accompanied by training programs that are readily accessible and cater to diverse ages and educational backgrounds. Further, programs that create jobs must be accompanied by enforceable hiring and training policies that center frontline communities and those that have been historically underserved. The jobs created must also lead to improved opportunity for social mobility and homeownership. As with other categories, interviewees emphasized that investments will be best spent if reducing greenhouse gas emissions is just one of many beneficial outcomes.

CENTERING THE NEEDS AND VOICES OF FRONTLINE COMMUNITIES

The connection between meaningful, wellpaying jobs and anti-displacement should be developed and emphasized by programs funded by investment dollars. For example, in order to meet its emissions reductions goals, Massachusetts will need to significantly lower energy use from buildings, which accounted for 58 percent of the state's annual energy use in 2018.¹⁷ Reducing energy use will require a workforce that is trained in green building retrofitting, green construction, green infrastructure, and green building systems management. This can create opportunities for frontline community members to have careers working on and in buildings that are in close proximity, enhancing their ability to remain in place and potentially increase homeownership. Targeted training and career opportunities should be provided for frontline communities as a city or town constructs new buildings and retrofits old ones.

"I would love to see more investment in job training opportunities in things like helping people access trades, training, access to jobs, investment in programs like ours, [and] connections to career opportunities."

Marisa Lopez, Newmarket Business Association, Jobs Initiative

Interviewees also noted that local hiring policies stabilize communities and combat displacement. The goal of such policies and programs is to allow communities and individuals to build wealth and invest in their community and environment. Nine interviewees from all geographic areas, population densities, and representing all interviewee organizations except two-year colleges, noted the importance of instituting local hiring provisions to any investment package.

One interviewee noted that people returning from incarceration may require soft-skills training concurrently or before entering a job training program. An emphasis on a just transition emerged throughout the interviews. In particular, interviewees indicated that green investments should provide opportunities for the retraining of older adults and those who had worked in fossil fuel industries.

From a pandemic recovery standpoint, one interviewee said that local farms in rural Massachusetts need financial assistance to bounce back after a difficult year. Along with direct financial assistance, investments should work to increase food security and improve food access by increasing access to local agricultural processing infrastructure. Investments in rural Massachusetts should not be limited to renewable energy; sustainable food systems are just as important. Increasing rural Massachusetts' access to renewable energy and sustainable transportation should be coupled with programs that support and expand local farming. Increasing food security will not only enhance climate resilience, but also improve health outcomes and reduce greenhouse gas emissions associated with food production and delivery.

17 | Energy Information Administration, State Energy Data System (SEDS), 2018. Accessed 6 May, 2021. https://www.eia.gov/state/data.php?sid=MA#ConsumptionExpenditures

NOT REPEATING HISTORICAL INEQUITIES IN SYSTEMS

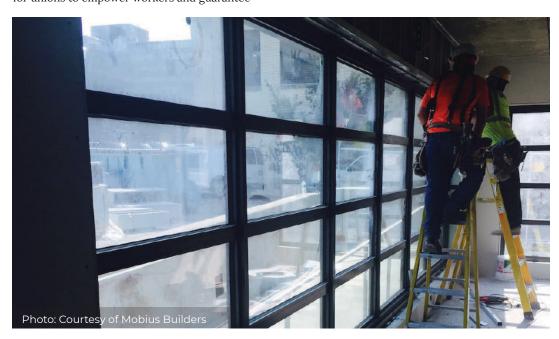
"[With the] concept [of] rebuilding society, let's take this opportunity to do it right, and reduce inequality and transition off fossil fuel."

Jon Grossman, Union Staff Person

Interviewees said that job programs created by green investments must focus on inclusion of frontline communities. Groups interviewees specifically mentioned included people of color, rural communities, formerly incarcerated people, older adults, immigrants, and people earning low incomes. For example, interviewees noted that job training programs should be accessible via public transportation and that childcare should be provided for trainees.

When speaking about union jobs, some interviewees were positive about the potential for unions to empower workers and guarantee

good wages. However, others pointed out the past and present racist practices of unions in Massachusetts which could potentially exclude people of color from union jobs. In a recent illustrative example, the Boston Employment Commission found a high lack of compliance with the Boston Residents Jobs Policy, which requires 40 percent of worker hours go to people of color for public jobs. Four interviewees who work for unions noted that unions are increasingly diverse and indicated that their unions are well aware of the historical inequities that should be addressed and are actively working to do so. 20



- $\textbf{18} \mid \text{Watson, Travis. A brief history of racism in union construction. Black and Brown Construction. August, 2020. \\ \text{https://static1.squarespace.com/static/58177e236a496367e363b56a/t/5f3c9b058a32d215774cab96/}$
- 19 | Mullings, Morgan C. Building trades unions won't disclose racial data. The Bay State Banner. July, 2020. https://www.baystatebanner.com/2020/07/16/building-trades-unions-wont-disclose-racial-data/
- 20 | Newman, Kalina. Greater Boston Labor Council Makes History with Latest Election. AFL-CIO. January, 2020. https://aflcio.org/2020/1/13/greater-boston-labor-council-makes-history-latest-election

INCREASING SOCIAL MOBILITY

"We're specifically targeting STEM opportunities. It's not enough, I think, for our community to just have jobs, they need careers with family-sustaining wages, that have the opportunity to get advancements in those jobs. And those are the jobs I think our community really needs."

Mike Pollio, Dudley Street Neighborhood Initiative

Interviewees were clear about the qualities they were looking for in new job opportunities created through investment programs. Opportunity for advancement, family-sustaining wages, and low barriers to entry were highlighted as vital qualities in job creation. Worker empowerment and the ability to unionize were also identified as an important component of any job program. The standards set by the unions of the Commonwealth, in terms of pay, quality of jobs, working conditions, and power of the laborer, should be maintained for union and non-union jobs created by investments. Interviewees wanted to keep these positives and continue the work of ending racist practices. In short, green jobs should not just be jobs, but careers that are available to frontline communities that increase their social mobility. Ten interviewees from all geographies, population densities, and representing all types of organizations stressed that the jobs created should advance social mobility.

In tandem with implementing green investments, municipalities and the Commonwealth should make it easier for small businesses and contracting firms to bid on contracts for climate projects. Programs that provide access to capital and reduce the size of contracts are two strategies to accomplish this goal. Contracts for green investments can be parsed down into smaller projects in order to encourage small, local businesses to fulfill them. Implementing investments in this way will promote local businesses, employ local people, and build wealth in communities vulnerable to climate impacts. These efforts can be coupled with policies that guarantee that people of color-owned contractors receive an equitable proportion of contracts funded by investments.



BUILDING ON EXISTING SUCCESSFUL PROGRAMS

"The work that needs to be done is helping fund and create training programs and scholarships for those programs so that we can get people in the mid-skill jobs that don't require a college degree but that pay well and they provide a pathway into a growing industry."

Greg King, Roxbury Community College

Investments in green infrastructure, especially renewable energy resources, should be done in tandem with community training to build on the skills of local workers who may have lost jobs in manufacturing and other industries. Fourteen interviewees noted that access to green jobs training would bring significant benefits to their communities. Job losses for many of the communities engaged are not only the result of the COVID-19 pandemic, but of long-term job loss in the manufacturing and infrastructure industries. The United States lost 5.5 million manufacturing jobs between 2000 and 2017, including over 150,000 in Massachusetts.^{21,22} However, these jobs will not return through investment in infrastructure alone; green jobs training and investments in existing training programs are equally important.

The majority of interviewees identified job training through local two-year colleges and technical schools as essential components to consider when investing in green jobs. Creating more courses, apprenticeship programs, and certifications would allow young and early-career professionals to work on projects and jumpstart their careers in the growing field of green jobs. Additionally,

several interviewees identified training for job transition and green certifications as a growing need. Roxbury Community College, Benjamin Franklin Institute of Technology, and Madison Park High School were identified as places that already have existing programming that can be expanded or where new courses can be taught.

New opportunities and pathways for green jobs training could help Massachusetts transition away from fossil fuels equitably. By opening up job pathways, especially for frontline communities, Massachusetts could also work to close historical gaps in wealth inequality. Columbia University's Center on Poverty and Social Policy found that current federal interventions to the COVID-19 recession have not yet effectively reduced wealth inequality, especially in low-income communities of color, as job losses in recessions disproportionately impact these communities and investments often serve as income transfers away from them.²³ Therefore, targeted job development in these communities could provide long-term support and transition Massachusetts to an equitable and renewable energy future.

^{21 |} Hernandez, Richard. The fall of employment in the manufacturing sector. Monthly Labor Review. August 2018. https://www.bls.gov/opub/mlr/2018/beyond-bls/the-fall-of-employment-in-the-manufacturing-sector.htm

^{22 |} Federal Reserve Bank of St. Louis, "State and Metro Area Employment, Hours, and Earnings." Accessed 6 May 2021. https://fred.stlouisfed.org/series/SMU2500000300000001A

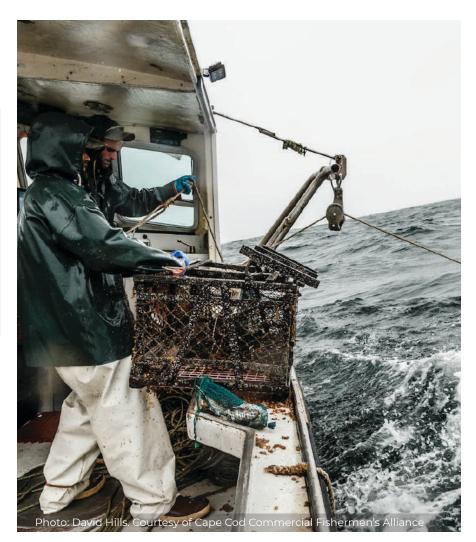
^{23 |} Parolin, Zachary, et al. 8th ed., vol. 4, Center on Poverty and Social Policy at Columbia University, 2020, The CARES Act and Poverty in the COVID-19 Crisis.

COMMUNITY LEADERSHIP AND EMPOWERMENT

"My long-term vision is aligned with our mission, which is having this community be one where residents have enough time and energy and awareness to advocate for themselves on a consistent basis."

David Queeley, Codman Square Neighborhood Development Corporation

Two interviewees said that investment programs should empower workers to advocate for better wages and working conditions. Four interviewees noted the power of unions for achieving this, while one interviewee said that worker cooperatives are an effective way to empower workers. One interviewee highlighted that green careers should enable residents to reinvest in their communities. Jobs created by investments should encourage this reinvestment, fight displacement, and be supported by policies that empower workers with collective bargaining rights and decision making power.









CENTERING THE NEEDS AND VOICES OF FRONTLINE COMMUNITIES

HOUSING AFFORDABILITY AND QUALITY

The housing crisis and cost of living are central themes of social and environmental justice in Massachusetts. A full 93 percent of interviewees representing CDCs, two-year colleges, community organizations, and union and trade groups discussed housing a total of 671 times in their interviews, which is second only to the topic of jobs. During COVID-19, the home has evolved beyond shelter into a place of work and education, revealing the displacement, overcrowding, and deterioration of the state's housing market for low-income communities and communities of color.

When family income cannot keep pace with a neighborhood's rising rent and property values, low-income families are at risk of being displaced from the community.

Displacement can take multiple forms:

- **Direct displacement** occurs when a family can no longer afford rent or mortgage payments and is forced to move. This can happen forcefully through direct eviction and extreme rent increases, or through "soft evictions" where landlords harass or otherwise deteriorate the shelters of tenants to force them to leave.²⁴
- Exclusionary displacement occurs when new low-income residents cannot afford to move into a community due to increased rent and property values. This can also be the result of discriminatory practices such as barring tenants with housing vouchers.²⁵
- Cultural displacement occurs as new, wealthier residents move in, along with new shops and services that change the cultural character of the community, which can leave remaining residents with a sense of dislocation from the neighborhood.

In all, 18 interviewees (62 percent) discussed housing affordability and 17 interviewees (59 percent) discussed the burden of utility and energy costs. A household is considered "costburdened" when more than 30 percent of income is used for housing. In every region of the state, approximately one third of households are costburdened. In New England, a greater percentage of low income households are "energy burdened" than in all other regions of the United States. Boston has the fourth highest percentage of low-income households that are energy burdened compared to all major metropolitan areas. Boston has the fourth highest percentage of low-income households that are energy burdened compared to all major metropolitan areas.

Housing insecurity, displacement, and low-quality housing are key compounding stressors on health and social mobility. In 28 instances, interviewees emphasized housing as a public health issue. Globally, household air pollution kills 3.8 million people annually, and old dilapidated buildings and fossil fuel-based appliances are strong contributors to poor indoor air quality. Children living in a home with a gas stove, for example, have a 42 percent higher risk of having current asthma, and a 32 percent higher risk of having lifetime asthma.

Housing security is also a vital factor in mental health and upward mobility. For example, if a family is housing insecure, forced to move multiple times per year, and confined to substandard crowded spaces, those conditions can have damaging effects on the mental and physical health of families. Interventions that stabilize the housing conditions of the family have been found to measurably improve the mental and physical health of adults and children. This applies to other economic stressors such as energy insecurity, which is linked to worse health outcomes for Boston families in poverty.

"Housing is and remains a struggle — if you don't have a job you can't pay for and buy your necessities. So you're struggling to pay the rent... if you come to deal with housing insecurity, it's a very unstable environment."

Community
Development
Corporation
Representative

24 | Typical landlords tactics for soft eviction include cutting off utilities, removing parking abilities, ignoring maintenance requests, or otherwise allowing unsafe and uncomfortable conditions to persist such as mold, pests, lead paint, rotting floors, and airborne pollutants. See https://www.urbandisplacement.org/pushedout for more information on direct displacement.

25 | The Uprooted Project also lists changes in land use or zoning as a cause of exclusionary displacement, such as eliminating units for households without children. "Tools for Texas Communities." The Uprooted Project, sites.utexas. edu/gentrificationproject/understanding-gentrification-and-displacement/.

26 | Cost burden is defined as paying more than 30% of income for housing. "Many Households Burdened by Housing Costs in 2019." Joint Center for Housing Studies, 2020, https://tinyurl.com/4cakanwh

27 | Drehobl, Ariel, et al. American Council for an Energy-Efficient Economy, 2020, How High Are Household Energy Burdens?: An Assessment of National and Metropolitan Energy Burden across the United States. (page 14)

28 | Drehobl, Ariel, et al. American Council for an Energy-Efficient Economy, 2020, How High Are Household Energy Burdens?: An Assessment of National and Metropolitan Energy Burden across the United States. (Page 8)

29 | " Household Air Pollution." World Health Organization, World Health Organization, 17 June 2020, www.who.int/airpollution/household/en/.

30 | Lin, Weiwei, et al. "Meta-Analysis of the Effects of Indoor Nitrogen Dioxide and Gas Cooking on Asthma and Wheeze in Children." International Journal of Epidemiology, vol. 42, no. 6, 2013, pp. 1724–1737., doi:10.1093/ije/dyt150.
31 | Bovell-Ammon, Allison, et al. "Housing Intervention For Medically Complex Families Associated With Improved Family Health: Pilot Randomized Trial." Health Affairs, vol. 39, no. 4, 2020, pp. 613–621., doi:10.1377/hlthaff.2019.01569.
32 | Hernández, Diana. "Understanding 'Energy Insecurity' and Why It Matters to Health." Social Science & Medicine, vol. 167, Oct. 2016, pp. 1–10., doi:10.1016/j.socscimed.2016.08.029.

NOT REPEATING HISTORICAL INEQUITIES IN SYSTEMS

There is a long history of racism, exclusion, and inequity in the American housing market that persists today. Current residential segregation by race, ethnicity, and income is a result of discriminatory practices by federal, state, and local governments, as well as the private housing industry. These institutional barriers to an equitable housing market are still in place, and include discrimination in the housing, mortgage, and insurance markets; exclusionary zoning; government policies affecting the location of and access to subsidized housing; disparities in private and public investments; and the displacement of residents due to the cumulative inequities that created today's income and wealth disparities.³³

Government investments are not immune from these structural inequities, and risk perpetuating them if not designed to grapple with the reality of inequality and its root causes. Our research highlights three common housing justice barriers to overcome in a green investment plan: (1) gentrification, (2) upfront capital access, and (3) older housing stock.

GENTRIFICATION

Displacement, urban flight, and gentrification are major challenges to frontline communities, particularly in and around urban regions of the state. Families are forced to live farther out from sources of employment, which in turn requires commuting or seeking inefficient forms of public transportation. One public health organization interviewed found that it is more difficult for their patients to access their community clinic, as they are priced into remote areas without reliable public transportation access.

"I refuse to give up. I really don't want us to resign ourselves to accepting that the only way to keep housing affordable is to make sure it is of lousy quality."

Joe Kriesburg, Massachusetts Association of Community Development Corporations (MACDC)

Nine interviewees, primarily representing CDCs and community organizations from urban communities, mentioned displacement. In particular, several interviewees emphasized that displacement within the community does not necessarily price families *out* of the area, but often rather prices families *into* overcrowded arrangements within sub-standard units. Multiple interviewees stressed that families are doubling or tripling up into dilapidated housing, which goes unseen in homelessness statistics.³⁴

Multiple interviewees recommended a proactive community-municipality-state partnership to ensure that new investments into housing help address the needs of actual community residents. Interviewees perceived green investment as a promising tool to soften the housing market challenges listed above — as people have more options about where to live affordably, gateway cities and urban neighborhoods become more accessible and inviting places to live.

^{33 |} Melnik, Mark, and Abby Raisz. "Greater Boston Housing Report Card: Race, Equity & Housing in the Time of COVID-19." The Boston Foundation, 14 July 2020, www.tbf.org/news-and-insights/reports/2020/july/greater-boston-housing-report-card-2020-race-equity-covid.

^{34 |} The 41st Annual Homeless Census finds that Boston had fewer total homeless individuals and families in 2021 compared to 2020, but a greater number of individuals without shelter. Source: City of Boston, "41st Annual Homeless Census." April 27, 2021. https://d279m997dpfwgl.cloudfront.net/wp/2021/04/2021-Census-Memo1.pdf

UPFRONT CAPITAL AS A BARRIER

"What Mass Save offers is not enough. People can't afford to electrify their oil heaters, let alone their gas heaters, or perform other retrofits, even with the level of subsidies that are being offered."

Pat Alvarez, Southwest Boston CDC

Despite the community benefits of investing in green and deeply affordable housing, there are still serious capital constraints that can prevent families and communities from participating in and benefiting from the green transition. Greener developments, retrofits, and solar arrays are expensive and can require substantial upfront funds to finance. This is a key barrier in the housing sector, where many long-term financial decisions, such as building home equity rather than renting property, performing deep retrofits and energy efficiency improvements, or installing a solar array on the home, pay themselves back over time, but still require too much upfront capital for low-income families to take full advantage.

Mass Save and other financial interventions that reduce upfront costs were cited by the interviewees as valuable tools to combat unequal access to upfront capital. However, existing levels of subsidy are not sufficient for low-income families. Tenants have trouble accessing the program, as they lack the legal authority to make such energy efficiency or retrofit modifications to the property that would reduce energy bills. If a landlord uses a state program such as Mass Save to improve the property, they may be inclined to raise rent on tenants.



THE BARRIERS OF OLDER HOUSING

"One of the biggest problems with getting housing stabilized, and particularly in frontline communities... the houses themselves need an influx of thousands of dollars to be compliant so they can even have access to Mass Save. It's old housing, these things have to be upgraded in order to make that possible."

Community Organization Representative

Our interviewees also find that the older housing stock in their community is challenging to fix. One third of all housing units in Massachusetts were built before 1940, and 60 percent were built before 1970.³⁵ Multiple interviewees identified through their work that communities of color in the state live in older housing stock than white communities.³⁶

Before retrofits can even be considered, a home must have a requisite state of repair that may cost thousands of dollars to meet. Historically, policy makers prefer to spend stimulus money quickly on projects that are ready to be implemented on day one. If investment-funded retrofits do not consider the barriers of older housing, particularly in communities of color, then the program is at risk of inequitably favoring retrofit-ready homes in higher-income communities.

Older housing stock also presents health challenges, such as asbestos and lead exposure, for local residents. A full rehabilitation of these properties should not only address their energy issues, but also other health and safety issues. However, this is difficult to navigate, as the regulations, programs, eligibility requirements, and timing considerations for lead and asbestos

abatement are different from that of energy efficiency and retrofit programs.

Multiple interviewees emphasized the need for new resources for organizations and households in communities of color to not only afford upgrades, but also navigate the upfront challenges of older dilapidated housing stock. One interviewee stated that HVAC companies don't always understand how to achieve peak efficiency in older housing, and as a result families pay for upgrades yet don't see the energy savings they anticipated.

The quality and age of housing can impact access to other green investment programs. One interviewee explained that before a community can even imagine having a microgrid, housing and buildings need the electrical infrastructure to support it. When buildings are too old, and filled with renters, the landlord is not incentivized to pay for electrical upgrades and can prevent microgrid initiatives from taking place. The renter-landlord dynamic is exacerbated with vulnerable populations such as Medicaid patients, undocumented families, and low income residents who may avoid discussing repair or efficiency opportunities with landlords in fear of being displaced by the landlord.

^{35 |} U.S. Census Bureau, American Community Survey 2019. https://tinyurl.com/kd7c6jnn 36 | Korman, Henry, and Bonnie Heudorfer. Metropolitan Area Planning Council, 2014, Fair Housing and Equity

³⁶ Korman, Henry, and Bonnie Heudorfer. Metropolitan Area Planning Council, 2014, Fair Housing and Equity Assessment for Metropolitan Boston.

INCREASING SOCIAL MOBILITY

HOMEOWNERSHIP

"Affordable homeownership would be a huge thing to focus stimulus funds on. I mean, figuring out ways, both for rental but really on homeownership ways to provide people with the ability to build longer term equity and wealth. I think that is what's going to take people out of this."

Spencer Buchholz, Lawrence Community Works

While increasing family income helps families cover their current needs, increasing family wealth or financial equity allows them to build for the long-term by investing in education, creating businesses, covering sudden expenses, such as medical emergencies or job loss, and building durable social mobility.

A 2015 study by Duke University finds that the per capita median net-worth in the Greater Boston region was about \$250,000 for white people, \$12,000 for Caribbean Black people, \$3,000 for Puerto Ricans, \$8 for non-immigrant African Americans, and \$0 for Dominicans. ³⁷ Homeownership and debt are driving factors for this disparity. One third of non-immigrant African Americans in the area own a home, compared to 80 percent of whites. Homeowners in communities of color are also more likely to have mortgage debt, student loans, and medical debt. ³⁸

Ten interviewees, a majority of whom represented CDCs or community organizations, emphasized the importance of home and property ownership, both as a contributor to the state's racial wealth gap and a key component of a long-term solution.

Homeownership was also cited as a key priority for investments and other interventions into the housing market. Renters are chronically disadvantaged in accessing government programs that reduce energy reliances, since it is difficult to make changes to a property that isn't owned by the resident. However, upfront capital and wealth inequality bars many families from purchasing property in areas close to employment and other essential services.

The community can experience policy tensions between the need to build wealth appreciation for the homeowner and the need to maintain long-term price controls for the community. Frontline community members who own property have much to gain when their surrounding area increases in property value, whereas local tenants bear the burden of increased rent costs. However, in all cases the presence of non-resident investors and speculators was cited as a detriment to the housing market for the frontline communities. Several interviewees emphasized the need for financial initiatives that lower the capital barriers for working families to access and compete in the homeowners market.

37 | Muñoz, Ana Patricia, et al. "The Color of Wealth in Boston." Federal Reserve Bank of Boston, Duke University, The New School, and the Federal Reserve Bank of Boston, 25 Mar. 2015, www.bostonfed.org/publications/one-time-pubs/color-of-wealth.aspx.

38 | Ibid.

BUILDING ON EXISTING SUCCESSFUL PROGRAMS

When asked how green investments could help the community navigate local challenges, interviewees pointed to three main solutions to housing: financial assistance, home energy improvements and/or retrofits, and deeply affordable transitoriented housing development.

FINANCIAL ASSISTANCE AND PROTECTION

Interviewees overwhelmingly recommended that money be directed towards both short-term and long-term housing financial alleviation. Interviewees listed measures such as rent relief, rent forgiveness, and expanding existing programs such as LIHEAP, to alleviate immediate bills and eviction risks. Massachusetts, despite the housing crisis, has outperformed other states in avoiding eviction during the pandemic due to heavy utilization of rental assistance programs such as the Rental Assistance for Families in Transition (RAFT), and the Massachusetts Rental Voucher Program (MRVP).

Many municipalities have established or are in the process of setting up temporary emergency rental assistance (ERA) programs as well, drawing from local re-purposed funds such as the Community Preservation Act (CPA), Affordable Housing Trust Funds, Community Development Block Grants, and more. The Greater Boston Housing Report Card, released annually by the MHP Center for Housing Data, finds that the eviction and foreclosure moratorium in 2020

"It's about stabilizing the rental market by giving the funding [...] what happens when a moratorium on eviction ends and suddenly I owe all of my rent? Is there a way to forgive that rent or get that taken care of the same as the utilities?"

Samantha Bilal, Public Health Institute of Western Massachusetts

prevented thousands of evictions in the shortterm.³⁹ Between October 2020 and March 2021, 85 percent fewer residential evictions were filed year-over-year.⁴⁰

For medium to long-term solutions, multiple interviewees listed financial instruments such as tax credits, new community land trusts and coownership programs, and other creative financing mechanisms to lower barriers to homeownership. One interviewee stressed that community-led finance programs such as land trusts can also be a vital anti-displacement measure to ensure that local families capture the property value benefits of developing new public transportation options in their community.

³⁹ | Hopper, Tom, and Callie Clark. Massachusetts Housing Partnership's (MHP) Center for Housing Data, 2020, Housing Stability COVID and Beyond.

⁴⁰ | "Press Release: Baker-Polito Administration Announces Federal Funding Through Eviction Diversion Initiative." Mass.gov, Office of Governor Charlie Baker and Lt. Governor Karyn Polito, 2 Apr. 2021, www.mass.gov/news/baker-polito-administration-announces-federal-funding-through-eviction-diversion-initiative.

RETROFITS AND ENERGY EFFICIENCY

"One of the biggest priorities for immediate green stimulus funding is retrofitting homes so that folks are not paying really high utility bills either for heat during the winter or cooling during the summer. I would fund energy resilience."

Environmental Justice Organization Representative

An overwhelming majority of interviewees view green upgrades to housing, which includes weatherization, energy efficiency, solar panels, water upgrades, and other retrofits, as win-win investments for the community. Retrofits and efficiency upgrades can be designed to soften cost burdens for low-income families living in older housing stock and rental properties, while simultaneously improving family health and quality of life and generating new technical career paths for local residents seeking employment. Green upgrades to housing were discussed by 21 interviewees (72 percent) a total of 308 times, which is the highest occurrence rate of any housing sub-topic analyzed.

Twenty-one out of 22 interviewee survey respondents (95 percent) rated the Mass Save program as a "somewhat high" or "very high" priority for the community they represent (seven and 14 interviewees, respectively). Overall, it was the second-most popular of 19

green investments on the survey. In 17 instances, interviewees cited retrofitting and weatherization as a key local job creator and career path, given the inexpensive training required and the universal demand for service. Multiple interviewees stressed the need to prioritize minority and women contracting firms in the local community when implementing housing upgrade programs.

The potential for reduced utility costs and improved health outcomes was of foremost interest for interviewees, particularly when home retrofits are combined with local sources of renewable electricity, such as rooftop solar and community microgrids. Multiple housing experts interviewed emphasized that retrofits and energy efficiency are still a low hanging fruit for the older distressed housing stock, which combined with rooftop solar has a break-even timeline of four to seven years or less. To the degree that local renewable projects decrease the cost of energy, residents can put that money saved towards other vital expenses.



DEVELOP MORE DEEPLY AFFORDABLE HOUSING

"A long-term vision for communities is [...] to have a place that they can both work and live in. Stabilizing housing is really about stabilizing the market to be a place for everyday people, rather than set up for realtors."

Community Organization Representative

Interviewees commonly indicated that investments be directed towards creating new deeply affordable housing developments in their communities, with special care given to the green standards of new units as well as the transit offerings and land use planning surrounding new units. All 22 interviewee survey respondents rated transit-oriented developments as a "somewhat high" or "very high" priority for the community they represent (10 and 12 interviewees, respectively). Overall, it was the third-most popular investment of 19 different programs on the survey.

In recent years, climate and housing groups in the state have found a natural alignment in seeking sustainable development patterns. The housing crisis was cited by interviewees as compounding transportation emissions by pushing families out of the city, who then need to drive or find inconvenient bus routes to get to work. This puts particular strain on communities of color, who are three times more likely than predominantly white communities to have commutes greater than one hour.⁴¹

Public housing and affordable housing programs, which one interviewee noted as "one of our existing bulwarks against gentrification and homelessness," haven't been sufficiently funded since before the Reagan administration, and the federal budget for housing assistance is on pace to fall to its lowest levels in 40 years by 2025.⁴²

Some interviewees stressed that any new buildings must be compatible with a zero-emissions future. Reducing emissions in the buildings sector is imperative to achieve net zero emissions by 2050.⁴³ Electrified, energy efficient buildings may be more expensive to build in the short-term, but are vastly cheaper to maintain over the building's lifetime. Beyond building new units, interviewees also stressed the need to tackle housing access by increasing homeownership and fostering equal access to the labor market, so that families have the spending power to afford more energy-efficient housing.

Low-income housing investments, green building codes, retrofits and energy efficiency programs, and creative homeownership finance can together help address the housing crisis and climate crisis concurrently. The interviewees stressed the need to leverage capital from all sources, including state, city, federal, and private, to adequately fund these solutions.

^{41 |} Williams, Victoria L. Boston Fair Housing Commission, 2010, Analysis of Impediments to Fair Housing Choice.
42 | Rice, Douglas. "Chart Book: Cuts in Federal Assistance Have Exacerbated Families' Struggles to Afford Housing."
Center on Budget and Policy Priorities, 12 Apr. 2016, www.cbpp.org/research/housing/chart-book-cuts-in-federal-assistance-have-exacerbated-families-struggles-to#section04.

^{43 | &}quot;An Act Creating a Next-Generation Roadmap for Massachusetts Climate Policy." 2021.https://malegislature.gov/Laws/SessionLaws/Acts/2021/Chapter8

COMMUNITY LEADERSHIP AND EMPOWERMENT

"When a community has been involved in the process, and has actually been able to really see their community grow, that there's a real investment, they see the value of where they live and hold it as beautiful. People want to live in a place where they feel valued."

Community Organization Representative

Equitable programs at the nexus of housing and climate require close partnership with the community. This extends beyond housing when communities are deciding what the future environment will look like. Development decisions cannot be made in a vacuum but rather have to incorporate what else makes communities livable and economically viable, such as green spaces, access to essential services, and transportation access.

This includes involving the local community in decisions that will affect where jobs and other upfront investment benefits will go. One interviewee stressed the need to offer technical assistance and resources for CDCs, as well as minority and women-owned developers and contractors so that the jobs created by housing investments go to the frontline community as a beneficiary.

Multiple CDCs and other nonprofits interviewed are already implementing successful local programs, such as community land trusts (CLTs), partnerships with affordable housing developers, and incubator projects using state funds such as Mass Save or MassCEC programs. The leading factor that limits the work of community organizations is not a lack of ideas, solutions, or skills, but a lack of resources compared to wealthier communities and organizations.

Multiple interviewees recommended a proactive community-municipality-state partnership to ensure that new investments address the housing needs of the residents, not just developers. Larger municipalities may have staff structure in place, such as a sustainability coordinator or development director, to facilitate such a partnership, however some CDCs interviewed had no such municipal staff in the communities they serve.



Infrastructure Photo: Aubrey Odom

Green infrastructure was an important element to the interviews. A wide variety of projects were brought up, including: energy efficiency, retrofitting, and wind and solar energy infrastructure. However, due to pandemic-related concerns around equity and access to quality work and education, transportation and broadband emerged as the most critical pieces of infrastructure. The COVID-19 pandemic compounded historical inequities such as unequal air quality burdens and lack of access to the internet. This section focuses on transportation and broadband related concerns highlighted by interviewees and survey respondents.

CENTERING THE NEEDS AND VOICES OF FRONTLINE COMMUNITIES

Investments in green infrastructure projects can create opportunities for communities to not only recover from, but to prosper despite the impacts of the COVID-19 pandemic. The pandemic has exacerbated existing community concerns such as unequal access to public transportation, public health inequities, and lack of access to essential infrastructure. Infrastructure projects can offer a wide variety of benefits for frontline organizations and communities.

Projects that tackle transportation and broadband should consider the equitable distribution of impacts to frontline communities. Centering frontline communities was especially evident in discussing accessibility to electric vehicles.

Single-family electric vehicles are a significant investment and are often inaccessible to low-income communities and communities of color. In California, electric vehicle rebates might serve as wealth transfers from low-income tax-paying communities to middle and high-income families that can afford electric vehicles.⁴⁴ The barrier to accessing electric vehicles due to high costs was identified by six interviewees representing communities across the state. Therefore, any

"Even though low-income people are going to be the last ones to get into the electric vehicle world, they will start getting the hand downs of those kinds of things and they'll need charging stations. We're talking about how to make those investments for the future even though they're kind of expensive."

Community Development
Corporation Representative

investment in electric vehicle infrastructure, such as charging stations, should also coincide with equity projects to increase frontline community access and support for a more equitable deployment of electric vehicles and other electrified transit.⁴⁵ Creating infrastructure to build capacity for and access to future electric vehicle use is necessary for a low-carbon future.

However, this does not mean that electric vehicle rebates and charging stations should not be included in future policy packages. Eight interviewees stressed the importance of electric vehicles as an infrastructure investment and a priority for Massachusetts to move towards less carbon-intensive transportation. Additionally, as three of interviewees suggest, equity concerns can be addressed through electric vehicle infrastructure implementation. The creation and maintenance of electric vehicle sharing programs could temporarily bridge this accessibility gap. Further engagement and input from frontline community and organization leaders will be important in addressing equity issues around the deployment of electric vehicles including but not limited to subsidy wealth transfers, accessibility, and supply chain impacts.

44 | Bryce, Robert. "California Assemblyman Says State's Push For Electric Vehicles Fuels 'Environmental Racism'." Forbes, Forbes Magazine, 24 Sept. 2020, www.forbes.com/sites/robertbryce/2020/09/24/california-assemblyman-says-states-push-for-electric-vehicles-fuels-environmental-racism/?sh=3fc4d3292b9a.

45 | Walton, Robert. "States, utilities must ensure equitable investment in electric vehicle infrastructure, new report warns." Utility Dive, 7 April 2021, https://www.aceee.org/white-paper/2021/04/siting-electric-vehicle-supply-equipment-evse-equity-mind.

NOT REPEATING HISTORICAL INEQUITIES IN SYSTEMS

"That's things like environmental racism, and communities of color getting redlined near highways [and] near waste sites."

Andy Hyatt, CIR SEIU

The electrification of public transportation is also a key issue for Massachusetts community organizations. Not only is transportation the biggest current source of greenhouse gas emissions in the state, but the use of non-electric public transportation raises air pollution and environmental justice issues. ⁴⁶ The burden of air pollution related to traffic and diesel-powered public transportation in Massachusetts remains inequitably distributed, with predominantly Black and Hispanic communities continuing to face higher rates of pollution and particulate matter. ⁴⁷

The survey of the interviewees found that both air quality monitoring and transit oriented development were among the top five priority projects for the communities they represented. These priority projects reflect historical inequities in public transportation and the disproportionate impacts that diesel powered transportation and traffic has had on frontline communities. Investments in electrified public transportation would help address these concerns.

Air quality concerns were mentioned as priority issues for 12 interviewees across Massachusetts and from community organizations, CDCs, and unions. Six of these interviewees further expressed their concerns about the correlation between poor air quality and high rates of asthma, especially in Springfield, Massachusetts. The respondents also raised concerns that asthma is indicative of long-term systemic issues that highlight not only the unequal air pollution burden, but also historic public health challenges for Black and Brown communities. A respondent also expressed concerns that high rates of asthma have also contributed to the impacts of the COVID-19 pandemic on the community.⁴⁸

By transitioning to electrified and expanded public transportation systems, Massachusetts could reduce its largest source of pollution while tackling historic air pollution inequities. This concern is highlighted by two interviewees who emphasized the need to move away from diesel-powered transportation due to their proximity to affordable housing units where vulnerable populations reside.

"I know of people who literally told me that in the summertime when their windows are open, you have to clean a layer of grime off the dining room table from the diesel fuel."

Pat Alverez, Southwest Boston CDC

⁴⁶ | "GHG Emissions and Mitigation Policies." Mass.gov, Executive Office of Energy and Environmental Affairs, www. mass.gov/info-details/ghg-emissions-and-mitigation-policies#greenhouse-gas-emissions-trends-.

⁴⁷ | Rosofsky, Anna, et al. "Temporal Trends in Air Pollution Exposure Inequality in Massachusetts." Environmental Research, vol. 161, 2018, pp. 76–86., doi:10.1016/j.envres.2017.10.028.

⁴⁸ | Riemer, Emily. "Asthma Added to List of COVID-19 Comorbidities for Vaccine Eligibility." WCVB, WCVB, 23 Feb. 2021, www.wcvb.com/article/asthma-massachusetts-coronavirus-comorbidities-covid-19-vaccines/35538913#.

INCREASING SOCIAL MOBILITY

Infrastructure has the potential to open up quality work and social mobility for frontline communities identified by our interviewees. Seven interviewees shared their observations on how the COVID-19 pandemic has further exposed infrastructure gaps in their communities.

INTERNET ACCESS

"[Access to basic needs] still remains the biggest issue. We have residents within our portfolio who are behind in rent, whose jobs have not come back, who have their children at home because the schools aren't open, who have poor internet service. The kids are often kicked off of whatever Zoom school they're in at that point. It's just a multitude of issues."

Caitlin Robillard, Allston-Brighton CDC

During the COVID-19 pandemic, access to quality internet services is essential for education and work. However, access to the internet is not equitable. In 2015, the Pew Research Center found that only 15 percent of middle and high school aged students nationwide had reliable access to quality internet services. The majority of the students that did not have access to the internet were from low-income communities of color. 49 Investments in broadband would help close the digital divide and provide access to quality education and work.

Interviewees representing community organizations, unions, and CDCs in our survey identified that their first infrastructure priority is building out broadband. In contrast, the survey respondents from Massachusetts residents

of the State Climate Policy Network did not identify broadband projects in their top five infrastructure projects. This suggests that frontline organizations, in comparison to other Massachusetts stakeholders, are more concerned with access to high-speed internet. The interviews suggest that the need for broadband is intrinsically tied with essential work and education needs that were augmented during the COVID-19 pandemic.

TRANSPORTATION

Reliable, affordable public transportation is also an essential infrastructure project for interviewees. The interviewees commonly raised concerns about infrastructure along with concerns about jobs and transportation. The frequency of these issues

"Access to quality, ethical, and equitable jobs is making sure people [are] getting paid a living wage and have access. [Transportation] really plays into access, being able to get to work, and access to work that's viable, and sustainable."

Community Organization Representative

being tied together suggests that communities are particularly concerned with infrastructure projects and its relation to transportation and quality work. Connecting low-income and communities of color to quality work is an avenue to increase social mobility.

Similarly to broadband internet, access to reliable and affordable transportation connects communities to their places of work. Eight interviewees across Massachusetts and representing two-year colleges, community organizations, unions, and CDCs all identified public transportation as crucial for essential activities and connecting communities to quality jobs.

49 | Auxier, Brooke, and Monica Anderson. "As Schools Close Due to the Coronavirus, Some U.S. Students Face a Digital 'Homework Gap'." Pew Research Center, Pew Research Center, 27 July 2020, www.pewresearch.org/fact-tank/2020/03/16/as-schools-close-due-to-the-coronavirus-some-u-s-students-face-a-digital-homework-gap/.

BUILDING ON EXISTING SUCCESSFUL PROGRAMS

TRANSPORTATION ACCESSIBILITY

"Putting an extensive amount of stimulus funding to the public transit system, [especially] around electrification, but also around just expanding the network [...] can help reinvigorate the economy and get people back into using the [public transportation] system."

Anna Leslie, Allston Brighton Health Collaborative

As outlined previously, a core infrastructure project that interviewees identified as a priority is the expansion of public transportation. To build out and expand public transportation would create long-term resilience for communities to access quality jobs and reduce the need for private vehicles. Expansion of transportation infrastructure and accessibility would also open up access to job training, childcare, education, and improve the overall quality of life.

Public transportation is a vital resource for low-income communities but affordability remains a barrier. In 2019, researchers at the

Massachusetts Institute of Technology (MIT) found that a reduction of public transportation costs by 50 percent in Boston increased low-income ridership by 30 percent, and that the majority of the reduced-price trips taken were connecting people to essential resources like healthcare. Improving the affordability of public transportation would maximize its benefits to frontline communities. Means-tested fares or free public transportation could further help the affordability and use of public transportation for frontline communities. The theme of public transportation expansion and affordability was identified by eight interviewees as essential for their communities across Massachusetts.



50 | Rosenblum, Jeffrey, et al. Massachusetts Institute of Technology, 2019, How Low-Income Transit Riders in Boston Respond to Discounted Fares: A Randomized Controlled Evaluation.

COMMUNITY LEADERSHIP AND EMPOWERMENT

"We don't want just gray walls around the neighborhood of the seacoast — you want active parks, you want recreation, you want access to the water, all the things that make us a beautiful, wonderful, culturally, internationally respected city."

Community Development Corporation Representative

A 2015 study found that the American Recovery and Reinvestment Act of 2009 did not create long lasting benefits to Black and Brown communities. It failed to address systemic barriers to wealth generation and was implemented in a race-neutral way that did not account for the high rates of unemployment in communities of color.⁵¹ These inequalities also persisted in green infrastructure investments that focused on creating mostly unskilled labor.⁵² The value of community

leadership is a theme throughout infrastructure investments that can support the existing vulnerable communities in Massachusetts. It can serve as a framework to understand the benefits of anti-displacement, job creation for local residents, and access to quality work through both internet access and public transportation. Massachusetts has the opportunity to avoid repeating these past mistakes by centering community leadership to generate long lasting change through infrastructure investments.



51 | Gray, Vance, et al. "American Recovery and Reinvestment Act of 2009: A Political Analysis of Its Impact on Black and Latino Unemployment in the United States." Race, Gender & Class, vol. 22, no. 3-4, 2015, pp. 107–135. JSTOR, www. jstor.org/stable/26505352. Accessed 7 Apr. 2021.

52 | Popp, David, et al. National Bureau of Economic Research, 2020, The Employment Impact of Green Fiscal Push: Evidence from the American Recovery Act.

Design & Process

It is vital that investment packages and programs harness community knowledge and are designed with the lived experience of all Americans in mind. This section details aspects of investments which limit access to frontline communities, as well as strategies for considering historical barriers and community assets in program design moving forward.

CENTERING THE NEEDS AND VOICES OF FRONTLINE COMMUNITIES

ACCESS TO FAMILY CARE

"Families with children, if they don't have money to pay for childcare, then they're not working, and then they have no money for food and everything else. Childcare is critical. Whether that's different ways to pay the people who then can pay the childcare or make childcare free but that would be huge."

John Waite, Franklin County CDC

The need for family care did not originate with the pandemic, but was exacerbated by closures mandated by the public health crisis. This problem unevenly affects women, who have already been more likely to leave the workforce, be laid off, or consider quitting to provide care for their children or other family members. Additionally, 93 percent of employees in the childcare field are women, and 45.3 percent are Black, Asian, or Latinx.

Among the interview participants, eight indicated that child or elder care was a concern for the members of their communities representing Western and Eastern Massachusetts, urban and rural populations, and community organizations, CDCs, and unions. In rural Western Massachusetts, limited or inconsistent transportation can also serve as another barrier to accessing child or adult care. 55 Various suggestions emerged from interviews including investing in child care vouchers and strategies to reopen

schools in a safe way. Investment packages that do not address the lack of family care will not equitably lift up women, particularly women of color, and thus will not have an equitable distribution of impacts.

LANGUAGE BARRIERS

"I think, number one for us, and [where] we've really tried to bridge the gap, are immigrants, people [for whom] English is not their first language. There's already a trust issue, even people that are residents, but don't speak English. There's also maybe not the most trust with some government institutions. So they come to DSNI because we've built that trust over generations."

Mike Pollio, Dudley Street Neighborhood Initiative

Nearly a quarter of Massachusetts residents speak a language other than English, which is higher than the national average of 21.9 percent. ⁵⁶ The top five other languages spoken in the Commonwealth are Spanish, Portuguese, Chinese, Haitian Creole, and Vietnamese. The diversity of language in the Commonwealth should be reflected in how information about investments is disseminated.

Eight interviewees from both Western and Eastern Massachusetts, who span community organizations, community development corporations, and unions mentioned language access as an important aspect to include in the information spread about investment programs.

Many noted the role of local organizations with community trust and knowledge in distributing information about how to access new and existing government programs. State and local governments can do more to increase access by translating documents into other popular languages in Massachusetts; however, there will always be gaps. Community organizations know first-hand the languages in their community and can help ensure the most isolated and vulnerable residents have fair access.

53 | Cassella, Megan, and Eleanor Mueller. "A Lack of Child Care Is Keeping Women on Unemployment Rolls." POLITICO, POLITICO, 25 June 2020, www.politico.com/news/2020/06/25/child-care-women-unemployment-339012.

54 | "Employed Persons by Detailed Occupation, Sex, Race, and Hispanic or Latino Ethnicity." U.S. Bureau of Labor Statistics, U.S. Bureau of Labor Statistics, 22 Jan. 2021, www.bls.gov/cps/cpsaat11.htm.

55 | Gould, Toby. Rural Commonwealth, 2018, Transportation in Massachusetts' Rural Core: What's Missing?, www. ruralcommonwealth.org/.

56 | "Massachusetts for Massachusetts." Data USA, datausa.io/profile/geo/massachusetts/demographics/languages.

NOT REPEATING HISTORICAL INEQUITIES IN SYSTEMS

PROVIDING TECHNICAL ASSISTANCE

Smaller, resource-constrained cities and nonprofit organizations struggle to leverage the benefits of government programs when the systems to access them are convoluted, and they do not have the capacity or the resources to navigate it. Twelve interviewees from most types of organizations, geographic location, and population density noted the difficulties faced by their organizations, municipalities, and residents in accessing funding and incentives at large.

One respondent from a community development corporation noted her desire to build deeply affordable housing that had solar panels and electric vehicle charging stations, but she came across "conflicting priorities" when her capacity and financial abilities were stretched by the complicated processes to access these technologies at an affordable rate.

Many respondents noted the potential benefits of dedicated personnel that could assist with grant applications for organizations and could help individuals navigate complicated processes to access incentives like Mass Save or the Low Income Home Energy Assistance Program (LIHEAP).

"I also agree that it shouldn't be a complex grant program that someone needs a grant writer to apply for. That's also important so that smaller organizations and smaller groups can access it and can apply and not feel overwhelmed and daunted by a complex application process."

Marisa Lopez, Newmarket Business Association, Jobs Initiative



INCREASING SOCIAL MOBILITY

ACCESS TO HIGHER EDUCATION

"Providing funding to community colleges is really important. That tends to be a gateway for Lawrentians to enroll in higher education, and then launch into a four-year degree. It's a very standard strategy of increasing educational attainment, and it's often viewed as a means to increase one's earnings over time. But, if they don't achieve their educational goals, then they're not going to be realizing that opportunity. And quite frankly, sometimes that mountain of debt scares a lot of young adults, which could delay achieving those goals."

Brad Buschur, Groundwork Lawrence

Higher education as a means to increase access to green jobs has been discussed throughout this report, but respondents also noted the importance of higher education as a means of achieving social mobility for their residents.

In Massachusetts, there is a strong correlation between low rates of bachelor's degree attainment and high rates of unemployment.⁵⁷ Twelve interviewees across every type of organization, geographic location, and population density noted the benefits of higher education in their communities. Bachelor's degree holders are half as likely to be unemployed as their peers who only have a high school degree, and they make \$1 million in additional earnings on average over their lifetime.⁵⁸

However, the barriers to entry for low-income people and people of color can be insurmountable, harming their overall trajectory for economic and social mobility. In 2010, approximately 82

percent of students from high-income families attended college in comparison to only 52 percent of students from low-income families. ⁵⁹ This disparity can be drawn back to financial inaccessibility and underfunded academic preparation for college applications.

Respondents cited many solutions to increase access to higher education through investments. One interviewee mentioned using investments to increase existing scholarship programs, including Pell Grants.⁶⁰ This strategy would increase affordability for higher education without requiring young people to assume a large amount of student debt. Another interviewee suggested increasing opportunities for high school students to take courses that are dually enrolled in a local two-year college. According to the Massachusetts Department for Higher Education, low-income students who took a dual enrollment course were almost 16 percent more likely than their peers who had never taken a dual enrollment course to enroll in college.61

- **57** | Massachusetts Department of Higher Education . "The Degree Gap: Honing In on College Access, Affordability & Completion in Massachusetts." The Vision Project / Massachusetts Department of Higher Education, June 2016, www.mass.edu/visionproject/degreegap/honing.asp.
- 58 | Edelson, David. "How Does a College Degree Improve Graduates' Employment and Earnings Potential?" Association of Public & Land-Grant Universities, 27 Feb. 2020, www.aplu.org/projects-and-initiatives/college-costs-tuition-and-financial-aid/publicuvalues/employment-earnings.html.
- **59** | National Bureau of Economic Research (NBER). n.d. "Current Population Survey (CPS) Data at the NBER." National Bureau of Economic Research, Cambridge, MA.
- 60 | Learn more about Pell Grants here: https://studentaid.gov/understand-aid/types/grants/pell
- **61** | Massachusetts Department of Higher Education . "The Degree Gap: Honing In on College Access, Affordability & Completion in Massachusetts." The Vision Project / Massachusetts Department of Higher Education, June 2016, www.mass.edu/visionproject/degreegap/honing.asp.

BUILDING ON SYSTEMS THAT ALREADY WORK

"I don't think that a lot of these investment pieces need to be reinvented. The wheel doesn't need to be reinvented and new committees don't need to come out of nowhere."

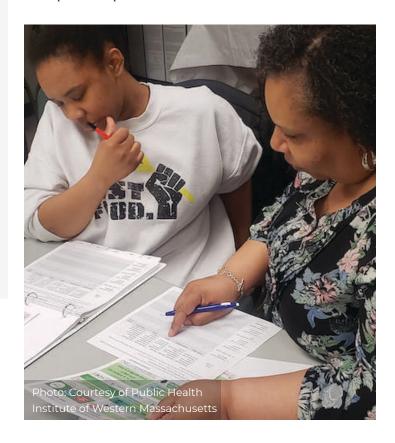
Environmental Justice Organization Representative

Many interviewees echoed this idea of not reinventing the wheel and instead expanding upon programs that have proven success rates amongst the communities they serve. Eighteen interviewees representing every type of organization, geographic location, and population density emphasized the point of allocating investments to programs that were already working well. Programs mentioned included:

- Mass SAVE
- Healthy Incentives Program (HIP)
- Supplemental Nutrition Assistance Program (SNAP)
- MassCEC Programs
- The Low Income Home Energy Assistance Program (LIHEAP)
- Commercial Driver's License Trainings
- Pell Grants and Other Scholarships
- Low Income Housing Tax Credits
- Young Fishermen's Development Act
- MassWorks Infrastructure Program
- Mass Growth Capital Corporation (MGCC)
 Small Business Technical Assistance
 Grant Program

In the survey of the interview respondents where each individual ranked the climate projects that were most important to their community, Mass Save was the highest-ranked project with 21 out of 22 respondents ranking it as very or somewhat important.

Respondents stressed repeatedly that it was often unnecessary and not effective to create new systems and processes to distribute the benefits of investments. They want to see the programs that their residents already benefit from improved and better resources on how to navigate services to provide the most direct positive impact.



COMMUNITY LEADERSHIP AND EMPOWERMENT

"I would also encourage engaging communities in the solution strategy that we're seeking to address, because they've already been resilient in surviving during the pandemic, so they also have the solutions to the plan that we might consider."

Samantha Bilal, Public Health Institute of Western Massachusetts

Interviewees stressed that their organizations know the needs and the strengths of their communities best and should play an active role in deciding how to allocate investment resources.

Local residents and organizations are generally first responders in times of crisis and are intimately familiar with the issues facing their communities before, during, and after a crisis hits. The COVID-19 pandemic is no exception. Many respondents noted the ways their organizations have creatively shifted beyond their missions to address the needs exacerbated by the pandemic and to emphasize the existing strengths of their communities. Twenty-two interviewees across every type of organization, geographic location, and population density agreed that community organizations should take a leading role in designing and implementing investment programs.

One prime example arose through an organization in Lawrence. In the beginning of the pandemic, they saw the urgent need of food access for its residents and the financial struggle of its local restaurants. They organized a program to pay local restaurants to cook meals for residents struggling with food insecurity. This program concurrently stabilized the restaurant economy in the area and supported those who were hungry by utilizing the unique assets of the Lawrence community.

Community organizations have a deeper understanding of their residents' needs and skill sets than any outside organization or level of government, and should design programs that fit those unique experiences. Investment programs should leverage this community expertise and trust to create programs that effectively solve compounding problems in neighborhoods.



62 | Jaskulowska, Joanna. "Public Participation After Natural Disaster – Case Study Of Christchurch Earthquake Response." Zarządzanie Publiczne.47 (2019): 225-45. ProQuest. Web. 8 Dec. 2020

Summary of Findings Photo: Erik Mclean

In this moment of political, economic, social, and environmental crises, decision-makers have an opportunity to learn from missteps in the past in order to uplift all Americans equitably. But the urgency of this moment cannot be overstated. If this time is squandered and not used to its full potential, generations will continue to suffer from the outcomes of historical discrimination, which are only exacerbated and compounded by the cascading crises of the present day. It is essential

that decision-makers seize this moment and dramatically invest in rebuilding our society to work for every community, not just the wealthy. Below are key recommendations drawn from each section of the report that represent the qualities and values that every investment package moving forward should exhibit. Interviewees stressed that the stakes are too high to repeat the same mistakes again.

INVESTMENTS MUST:

Job Creation	Include policies that require local hiring to the maximum extent possible
	Include policies that require a greater amount of minority hires
	Provide scholarships to two-year colleges for vocational training and certificate programs
	 Make it easier for small businesses and contracting firms to bid on government contracts, such as by parsing into smaller projects that local businesses can fulfill
	Guarantee that minority contractors receive an equitable proportion of contracts
	Foster community-municipality-state partnerships to ensure new investments in housing address the needs of the community, rather than just developers
	• Lower the capital barriers that prevent low-income families and renters from taking advantage of Mass Save and other homeowner services
	Prioritize older, dilapidated housing to reduce utility costs and indoor health hazards
Housing	• Expand financial assistance measures such as rent relief, rent forgiveness, tax credits, and LIHEAP in the short to medium-term
	Create new financial programs to increase homeownership access, such as community land trusts and co- ownership programs
	• Further expand Mass Save and increase the subsidies offered for low-income households to retrofit homes
	 Leverage a combination of city, state, and federal funding to accelerate the development of new, deeply affordable housing near transportation access
	Expand affordable public transportation routes to serve and connect frontline communities to places of work
	Install electric vehicle infrastructure throughout the Commonwealth
Infrastructure	• Address equity concerns by implementing electric vehicle ride share programs in frontline communities
	Expand broadband infrastructure to connect communities to quality jobs and education
	Expand infrastructure projects that increase demand for quality jobs in frontline communities
Design and Process	• Increase access to family care in order to allow all caregivers to benefit from job creation benefits
	 Make information about accessing the benefits of investments widely available in languages other than English and leverage community organizations to ensure broad and equitable access
	 Increase ease of access to investments by ensuring that methods for distributing funds are as easy as possible with designated personnel to assist with applications
	 Increase access to higher education to ensure that all Massachusetts residents have the opportunity to obtain quality careers created through new jobs programs
	Expand on programs that are already proven to be effective for frontline communities
	 Leverage community expertise and trust to create programs that best solve compounding problems in neighborhoods

Appendix 1 Consent Form sent to all interview participants

CLIMATE XCHANGE AND FAIRMOUNT-INDIGO CDC COLLABORATIVE

Name of Investigators: Ava Gallo, Karl Celis, Jonah Kurman-Faber, Saba Ijadi

INFORMED CONSENT TO PARTICIPATE IN A RESEARCH STUDY

We are inviting you to take part in a research study. This form will tell you about the study. You may ask any questions that you have. When you are ready to make a decision, you may tell the researcher if you want to participate or not. You do not have to participate if you do not want to. If you decide to participate, the researcher will ask you to sign this statement and will give you a copy to keep.

WHY AM I BEING ASKED TO PARTICIPATE IN A RESEARCH STUDY?

You are being asked to take part in a research study collecting the priorities of communities across the state of Massachusetts for federal/state stimulus funding, specifically for climate projects.

WHY IS THIS RESEARCH BEING DONE?

The purpose of this study is to center community stories and input in the green stimulus conversation.

WHAT WE WILL ASK YOU TO DO

If you agree to be in this study, we will conduct an interview with you. The interview will include questions about your community, the impacts it has faced due to the pandemic, the impacts it has faced due to climate change, and how stimulus funding can best help it thrive. The interview will take about 30 minutes to complete. With your permission, we would also like to record the interview via the Zoom platform. Upon request, you may participate in an interview without recording, provided the researchers can take notes.

COMPENSATION

You will receive a \$50 stipend for one interview. This compensation can be delivered as a donation to your organization or as personal compensation for your time.

The information you provide may be made public unless you request otherwise: The records in this study will be made public. Results will be disseminated through a final report and other outputs unless you request for us to keep your answers confidential- in which case pseudonyms and substitutions of place names will be made in order to keep your identity confidential. We will ask you to review information for accuracy prior to its dissemination when identifying information (name, organization name, etc.) are included, if you so desire.

TAKING PART IS VOLUNTARY

Taking part in this study is completely voluntary. You may skip any questions that you do not want to answer. If you decide not to take part or to skip some of the questions, it will not affect your current or future relationship with Climate XChange or Fairmount-Indigo CDC Collaborative. If you decide to take part, you are free to withdraw at any time.

Appendix 1

IF YOU HAVE QUESTIONS

The researchers conducting this study are Ava Gallo, Karl Celis, Jonah Kurman-Faber, and Saba Ijadi. Please feel free to ask any questions you have by contacting Ava Gallo at ava@climate-xchange.org.

You will be given a copy of this form to keep for your records.

I would like the opportunity to review any of the information I share that contains personal identifiers (name, organization, etc.) prior to distribution.
Yes No
If yes, your contact information so we can follow-up:
Email:
Phone:
In addition to agreeing to participate, I also consent to having the interview recorded via Zoom.
Yes No
In addition to agreeing to participate, I also consent to providing a photo that will potentially be disseminated with the research.
Yes No
STATEMENT OF CONSENT:
I have read the above information, and have received answers to any questions I asked. I consent to take part in the study.
Your Printed Name:
Date:
This consent form will be kept by the researcher for at least three years beyond the end of the study.

Appendix 2 Questions used in long-form interviews

OPENING DESCRIPTION

Communities of color and low-income communities are on the frontline of the pandemic and climate change, and it is more important than ever that their priorities are emphasized in allocation of stimulus funding. Climate XChange and Fairmount-Indigo CDC Collaborative have partnered on this research project to center community voices in the Build Back Better conversation in Massachusetts.

This project will serve as a companion piece to Climate XChange's technical research which seeks to make the case for a green stimulus by quantifying the public health and job creation associated with climate and community investment. Both the technical analysis and survey research will be published by the Spring of 2021.

Stimulus funding will be imminently allocated to Massachusetts and when it does it is instrumental that state legislators understand where and how to best allocate it. The information you provide in this interview along with our other interviewees will be compiled into a report for Massachusetts legislators to understand how their constituents are suffering due to the effects of the pandemic and climate change. With the quantitative research and your perspectives combined, these decisionmakers will have a clear sense of what projects need to be funded to truly support communities across the Commonwealth.

Your input is so important in this process, and we want to make sure that it is accurately represented to those making the decisions about where this funding will end up. Do you have any questions before we go into the interview questions?

OVERVIEW

- What are the immediate challenges facing your community?
- What is your long-term vision for your community?

STIMULUS

- How would stimulus funding best be spent to help your community recover from the pandemic?
- What climate projects should be the highest priority to receive immediate funding?
- What populations are at risk of being left out and need to be explicitly centered in stimulus spending?
- What would you do to make stimulus spending as accessible as possible?
- Are there industries or jobs with specific expertise that if funded would best support your community?
- · What qualities or provisions are you looking for in jobs that green stimulus creates in your community?

FOLLOW-UP

- How can our research best help your organizational priorities?
- Currently, we plan on writing a report as the main output for this research project. What other outputs from this research would best serve your organization?
- Do you have recommendations for other organizations or individuals for us to reach out to?

Appendix 3 Green Recovery Projects Prioritization Form

Please fill out this form to indicate what green recovery projects are most important to the community that you represent.

*	I	Req	uire	d	
		_			

1 | Email address *

2 | What is your name? *

3 | What organization/union are you affiliated with? *

4 | What community(ies) do you represent or live in? *

5 | How important is each project to your community? *

Mark only one per row.

	Very	Somewhat	Neutral	Not A Priority
Light Rail	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Electric Vehicles	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Low Carbon Buses and Trucks	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Transit-Oriented Development (TOD)	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Ferry Expansion and Electrification	\bigcirc	\bigcirc	\bigcirc	\bigcirc
High Speed Rail	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Broadband Connectivity	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Community Air Quality Monitors	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Building Energy Efficiency (Mass Save)	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Water Efficiency Programs	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Large Renewable Projects	0	\bigcirc	\bigcirc	\bigcirc
Battery Storage Projects	O	\bigcirc	\bigcirc	\bigcirc
Transmission Grid Updates	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Community Microgrids	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Clean Drinking Water Projects	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Water Management	\bigcirc		\bigcirc	\bigcirc
Ecosystem Restoration	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Urban Greening	\bigcirc	\bigcirc	\bigcirc	\bigcirc
Irrigation and Water Efficiency	\bigcirc	\bigcirc	\bigcirc	\bigcirc

6 | Are there any green projects important to your community not represented on this list? If so, please list.