





August 6, 2021

U.S. Department of Energy Energy Efficiency & Renewable Energy DE-FOA-0002540 Inclusive Innovation and Entrepreneurship in Climate Technology

SUBJECT:DE-FOA-0002540 Responses from the Connecticut Green Bank, Greater Bridgeport
Community Enterprises, and Operation Fuel – Category 3: Support for an Innovation
Ecosystem and Place-Based Innovation

To Whom it May Concern:

The Greater Bridgeport Community Enterprises ("GBCE"), Operation Fuel, and the Connecticut Green Bank ("Green Bank") (i.e., together the "Respondents"), appreciate the U.S. Department of Energy's ("DOE") efforts through the Office of Energy Efficiency and Renewable Energy ("EERE") and the Office of Economic Impact and Diversity ("ED") to diagnose and eliminate barriers to funding opportunities and other forms of assistance. As diverse leaders of organizations serving underserved communities throughout Connecticut, the Respondents support the Justice 40 Initiative by the DOE to ensure that everyone is afforded an opportunity to participate fully in its programs, opportunities, and resources. Through our responses to the questions within the Request for Information ("RFI"), the Respondents seek to help the DOE understand the structural barriers to entry to its funding opportunities and other forms of assistance in order to eliminate these barriers and make DOE-supported projects equitable and inclusive.

RESPONDENTS

Organization	Mission		
Adrienne Farrar Houël	The mission of the GBCE is to create jobs, by creating		
President and CEO	and expanding green businesses and provide training in		
Greater Bridgeport Community Enterprises	the growing green economy so families throughout the		
459 Iranistan Avenue	region can achieve economic self-sufficiency while		
Bridgeport, CT 06605	creating more sustainable communities.		
(203) 212-3858			
houel@greenteambpt.com	GBCE is poised for rapid growth and expansion through		
https://greenteambpt.com/	deepening collaborations with current partners. We		
	anticipate opening new green low-tech, labor-intensive		
	enterprises to create jobs for unemployed		
	disadvantaged residents. Our current and future		

	enterprises will all embody the "triple bottom line" of environmental sustainability: social good in hiring disadvantaged residents; economic development to address unemployment and poverty; to build the tax base for Bridgeport; and to revitalize the city's neighborhoods. Our current activity has created 20 jobs that put more than \$400,000 in salaries back into the local community.
Brenda Watson Executive Director Operation Fuel 75 Charter Oak Avenue Hartford, CT 06101 (860) 243-0656 <u>brenda@operationfuel.org</u> <u>https://operationfuel.org/</u>	 Operation Fuel is the country's oldest fuel fund, serving as a model across the United States. Our primary purpose is to provide year-round emergency energy assistance to every city and town in Connecticut, aided by our statewide network of local fuel banks. We are the primary source of energy and utilities assistance for low- to moderate-income households who are struggling financially and have exhausted other options. Operation Fuel fills the gap for our state's most vulnerable residents – children, senior citizens, working families, and people with chronic medical conditions. We help people keep their homes warm and their lights on, power cooking appliances and medical equipment, store food and medications at safe refrigerated temperatures, and have access running water for drinking, bathing, and laundry.
Bryan Garcia President and CEO Connecticut Green Bank 75 Charter Oak Avenue Hartford, CT 06106 (860) 257-2170 bryan.garcia@ctgreenbank.com https://www.ctgreenbank.com/	The Connecticut Green Bank is the nation's first green bank. Established by the Connecticut General Assembly in July 2011, as a quasi-public agency, the Green Bank supports the Governor's and Legislature's energy strategy to achieve cleaner, affordable, and more reliable sources of energy while creating jobs and supporting local economic development. The mission of the Green Bank is to confront climate change and provide all of society a healthier and more prosperous future by increasing and accelerating the flow of private capital into markets that energize the green economy. In an effort to reduce the energy burden on vulnerable communities, the Green Bank, in collaboration with the private sector, develops programs to make capital affordable and accessible to finance clean energy and environmental infrastructure improvements.

RESPONSES

Given the business nature of the Respondents described above, we felt Category 3: Support for an Innovation Ecosystem and Place-Based Innovation was the most appropriate area to provide feedback.

1. What can DOE do, directly or indirectly, to provide access to funding and support for entrepreneurs/innovators from groups historically underrepresented in STEM or from underserved communities, and underserved communities as a whole?

<u>Response</u>

As a United State Government ("USG") institution, the DOE's history has been one of investing in people and technology to support innovation in energy to solve problems – from building the atomic bomb through the Manhattan Project to protect democracy during World War II, to investing in the advancement and deployment of energy efficiency and renewable energy technologies to combat the war on climate change today. The DOE has invested resources of the USG in ways that are both imperative and enduring. Today, the Justice 40 Initiative is just as crucial, requiring a similar investment approach that is both intentional and long-term.

Directly, the DOE can invest in underserved communities by being willing to take risks (e.g., invest in more first-time applicants) and provide time (e.g., multi-year support for program administration) to allow these seeds of investment, with constant nurturing and support, to bear fruit and demonstrate long-term measurable impact. The DOE has a tendency to "nickel and dime" organizations, creating systemic damage by not providing underserved communities with the same amount of grace to solve problems as they would a federal lab. The DOE's Justice 40 Initiative should have clear priorities, communicating the opportunities that arise, including a better local and state approach exemplified by the U.S. Environmental Protection Agency ("EPA").¹

To support a just and inclusive innovation ecosystem, the DOE should directly:

- <u>Federal Procurement</u> use its vast ability to procure products and services to invest in minority-owned businesses, including in collaboration with state and local government;
- <u>Redirect (or Additional) Support for Programs</u> redirect (or create additional) resources being dedicated to national laboratories and "Ivy League" academic institutions towards increased investment in Historically Black Colleges and Universities ("HBCU") (e.g., community colleges in Connecticut) that provide educational opportunities for underserved communities; and
- Provide Tuition Assistance give financial support for training for certificate and college education programs to increase access to workforce development opportunities (e.g., tuition support for Home Energy Rating System ("HERS") training – \$3,000 per employee).

Indirectly, the leadership of the DOE can play an important role in facilitating and coordinating local and state efforts to advance the Justice 40 Initiative, including:

 <u>Develop Local Innovation Pipelines</u> – provide resources to HBCU's across the country and community colleges (e.g., Housatonic Community College, Gateway Community College)

¹ <u>https://www.epa.gov/statelocalenergy</u>

and state universities (e.g., Connecticut State Colleges and Universities) in Connecticut with a focus on encouraging STEM education, innovation, entrepreneurship, and talent-building for students from underserved communities;

- <u>Support Entrepreneurial Ecosystem</u> encourage the creation and ownership of minority businesses through the engagement of Black and Hispanic associations (e.g., The Black Business Alliance, Spanish American Merchants Association); and
- Private and Public Procurement encourage the procurement by industry (e.g., Greater New England Minority Supplier Development Council) and government (e.g., Connecticut Department of Administrative Services' ("DAS") Supplier Diversity Program, Connecticut Department of Energy and Environmental Protection's ("DEEP") technology procurements) to source various products and services from minority-owned businesses.

These are some of the things that the DOE can do directly or indirectly to provide access to funding and support for entrepreneurs and innovators from underserved communities.

2. Are you part of an organization that provides support entrepreneurs and innovators from groups historically underrepresented in STEM or from underserved communities?

Response

Each of the Respondents supports underserved communities in unique ways.

Greater Bridgeport Community Enterprises – Yes.

GBCE creates new green businesses and green jobs for unemployed, low-income area residents facing multiple barriers to employment. In 2013, Connecticut became the 1st state to pass comprehensive mattress stewardship legislation (i.e., <u>Public Act 13-42</u>). The law requires mattress manufacturers to establish a program to manage "end of life" mattresses generated in Connecticut. Mattresses and box springs become problematic once they reach the end of their useful life since they are bulky and hard to move, making their disposal expensive – often resulting in illegal dumping on curbs, vacant lots, and roadsides. GBCE focuses on recycling mattress materials – foam, cotton, wood, and steel springs – recovering 80-95% of the materials for reuse or recycling.

DEEP sought enterprises that could support the public policy and build a business around mattress recycling. After a long three-year search, only two (2) organizations stepped up. Entrepreneurship requires time, energy, and effort to create something from nothing. There are not many people with an entrepreneurial bend to get into new technology, and then investigate and access financial resources to enter the industry by forming a business. For entrepreneurs like Adrienne Farrar Houël, investors and funders must trust in someone like her to accomplish the work. Through support from foundations (e.g., Robert Wood Johnson Foundation), and assistance from industry experts (e.g., St. Vincent de Paul of Lane County, OR), entrepreneurs like her can be provided with support for such social impact ventures (e.g., investments in C-Corps and B-Corps, as well as 501(c)3 nonprofit organizations). In addition to funding and technical support, early-stage businesses such as the GBCE require legal support in order to avoid various pitfalls (e.g., partnership agreements) that can result in lost time, energy, and money.

As a 501(c)3 nonprofit organization, GBCE's goal is to provide 100 new jobs over the next 4-5 years by creating more new green business such as "Park City Green," its mattress recycling division, a waste stream diversion operation.

Operation Fuel – No.

As a 501(c)3 nonprofit organization, Operation Fuel provides year-round emergency energy assistance to every city and town in Connecticut, aided by a statewide network of local fuel banks. As the primary source of energy and utilities assistance (including water) for low- to moderate-income households struggling financially, Operation Fuel fills the gaps for underserved communities by helping keep their homes warm and their lights on, power cooking appliances and medical equipment, store food and medications at safe refrigerated temperatures, and have access to running water for drinking, bathing, and laundry.

If financial resources were made available by the DOE, the nonprofit organization would be capable of partnering with another organization(s), to expand existing workforce development programs that made sense with respect to the mission of Operation Fuel.

<u>Connecticut Green Bank</u> – No.

As a "green bank," the quasi-public organization provides families and businesses with easy and affordable access to capital to finance clean energy improvements on their properties. For example, a small business might want to reduce their energy costs by financing energy efficiency improvements on their property (e.g., efficient lighting, building management systems) through an on-bill mechanism like the Small Business Energy Advantage ("SBEA") program of Eversource Energy; or, a low- to moderate-income family might be interested in reducing their energy costs by signing a lease for solar PV and energy efficiency through the "Solar for All" program of PosiGen. The Green Bank provides access to capital to finance clean energy improvement projects, not entrepreneurs or innovators starting a new green business. The Green Bank provides access to capital more towards the latter infrastructure side of the spectrum as opposed to early-stage innovation.

3. What types of support do non-DOE/non-governmental organizations provide to entrepreneurs/innovators?

<u>Response</u>

The following is a list of the type of support provided to entrepreneurs/innovators that some non-DOE/non-governmental organizations provide in Connecticut (see Table 1):

Name	Туре	Link	
Connecticut Innovations	Loans and Investment	Click Here	
Connecticut DAS Supplier Diversity Program	Procurement	Click Here	
New England Minority Supplier Development Council	Procurement	Click Here	
CTNext	Mentoring; Networking	Click Here	
DECD Small Business Express Program	Loans and Investment	Click Here	
United Labor Agency	Apprenticeship	Click Here	

Table 1. Organizations in Connecticut Providing Support to Entrepreneur	s/Innovators
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University of Connecticut Supplier Diversity Program	Procurement	Click Here
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In Connecticut, there is typically small business support for the retail and construction industries. There is a need for more diversity in industry support (e.g., green innovation). Also, there is a need for more workforce development support for energy-related industries that are focused on reducing energy burden like heat pump and battery storage installers, and health and safety (e.g., asbestos, mold, and lead remediation) contractors. Within the 2022-2024 Conservation and Load Management Plan, there is a greater emphasis on workforce development. Providing support from the DOE for such efforts, with an emphasis on advancing underserved communities, would be welcome. Providing support for the EDCs to develop a clearinghouse of certified, vetted, and continuously managed contractors, again, with a focus on diversity in ownership and management, who can support reducing the energy burden on underserved communities, is vital to achieving Connecticut's equity objectives.

4. What organizations have been successful in the short-term and long-term support of entrepreneurs/innovators from groups historically underrepresented in STEM or from underserved communities? How have these organizations been successful?

<u>Response</u>

The following organizations or instruments have been successful in the short- and/or long-term support of entrepreneurs/innovators from underserved communities:

- John J. Driscoll United Labor Agency the United Labor Agency employs the AFL-CIO National Community Services model for the benefit of workers in Connecticut, including community mobilization, counseling, and employment. With the mission to assist union members and all workers handling problems and difficulties arising on and off-the-job by mobilizing and using the support of existing public agencies, as well as resources from the labor movement, the ULA administers programs like Building Pathways Connecticut, an apprenticeship readiness program designed to promote women, veterans, and minorities into the building trades.
- <u>Citi Impact Fund</u>² \$200 MM Impact Investment Fund focused on equity investments in "double bottom line" companies, with a priority towards investing in businesses led or owned by women and minority entrepreneurs to help combat the gender and ethnic gap that exists in the startup world.
- <u>Community Benefit Agreements</u> in general, during various corporate acquisitions or infrastructure projects, there are opportunities for private sector businesses to set aside financial resources to invest in underserved communities, including:
 - <u>M&T Bank acquisition of People's United Bank</u> the Buffalo, NY headquartered bank acquisition of the Bridgeport, CT headquartered bank will provide resources to support women and minority owned businesses through a community benefit agreement.

² <u>https://www.citigroup.com/citi/communities/citi-impact-fund.html</u>

Through federal policies such as the Community Reinvestment Act ("CRA"), regulated financial institutions should be encouraged to invest in clean energy innovation and entrepreneurship for underserved communities. The DOE, working with Treasury, could promote such public-private collaborations to enable more investment in underserved communities.

In the future, there is the possibility of aligning investment directed at underserved communities in Connecticut, with resources made available by the DOE, including:

Social Equity and Innovation Fund – On June 22, 2021, Connecticut Governor Ned Lamont signed into law Public Act 21-1 "An Act Concerning Responsible and Equitable Regulation of Adult-Use Cannabis". Beyond the law creating a comprehensive framework for a regulated marketplace for cannabis that prioritizes public health, public safety, criminal justice, and equity, the policy seeks to repair the damage caused by decades of failed cannabis criminalization policies. The policy creates a Social Equity Council that will launch programs through the Social Equity and Innovation Fund to provide business capital, technical assistance for business start-ups and operations, workforce education, and community investments – investments that are not limited to the cannabis market. Therefore, it is possible that such fund could allocate a portion of its funding to support entrepreneurs/innovators of green technology.

Leveraging state and federal resources, to attract and mobilize more private investment in underserved communities, has the potential to catalyze entrepreneurship and innovation across the country, advancing the priorities of the Justice 40 Initiative.

5. Are there specific organizations that have partnered with DOE to successfully provide support to innovators, particularly from groups historically underrepresented in STEM or from underserved communities in the past? Are there other organizations that are well positioned to enter into such a partnership now?

<u>Response</u>

The Respondents are not aware of specific organizations that have partnered with the DOE to successfully provide support to innovators from underserved communities in the past.

However, the Green Bank is aware of the Institute for Sustainable Communities ("ISC") serving as the National Coordinator for Solar Market Pathways at the DOE.³ ISC was the National Coordinator for the SunShot Initiative's Solar Market Pathways program that created a learning network that enabled communications, coordination, and shared learning across the other organizations (including the Northeast Solar Energy Market Coalition) in the program. ISC could serve in a similar role as a national coordinator for the DOE on the Justice 40 Initiative. As a 501(c)3 nonprofit organization, ISC is led by environmental justice leader Deeohn Ferris.⁴

6. In your experience, what have been the most effective programs for first-funding-in for entrepreneurs?

³ <u>https://www.energy.gov/eere/solar/project-profile-institute-sustainable-communities-solar-market-pathways</u>

⁴ <u>https://sustain.org/deeohn-ferris-to-lead-global-climate-change-institute/</u>

<u>Response</u>

Based on the experience of the Respondents, the most effective programs for first-funding in for entrepreneurs, including those with significant potential, include the following:

<u>Venture Capital</u> – for those for-profit entrepreneurs (i.e., not 501(c)3 nonprofit organizations) seeking early-stage funding to support their innovation, venture capital can be effective. As a way to build wealth, through equity, venture capital is a source of resources that is difficult to access, yet important for innovation. Debt (e.g., loans) is more difficult for entrepreneurs given their limited access to collateral.

In Connecticut, we have Connecticut Innovations⁵ leading the way on cleantech venture capital that could be a future partner with the DOE on investing in entrepreneurs in underserved communities.

Foundation Grants – for those non-profit entrepreneurs and innovators, seeking earlystage and ongoing funding to support innovation, resources for underserved communities could come through grants, program-related investments ("PRI"), or other financial instruments from foundations (e.g., Energy Foundation, Hampshire Foundation, JPB Foundation, Kresge Foundation, MacArthur Foundation, Robert Woods Johnson Foundation, Tremaine Foundation). The DOE should actively seek out partnerships with such foundations, including community-based foundations, to advance the Justice 40 Initiative, by leveraging resources from the USG to catalyze more investment from foundations.

In Connecticut, we have the Greater New Haven Community Foundation, Hampshire Foundation, Hartford Foundation for Public Giving, Tremaine Foundation, and others leading the way that could partner with the DOE to advance Justice 40 Initiative grantmaking in Connecticut.

 Innovation Pilots Framework – through the Equitable Modern Grid proceedings of the Public Utilities Regulatory Authority ("PURA") in Connecticut, Docket No. 17-12-03RE05 (Innovation Pilots), seeks to enable the deployment of high-value project solutions that might not be otherwise possible or expedient with the current regulatory environment through the Innovation Pilots Framework ("IPF").

DOE support of such state-level programs such as the IPF, where equity is a priority as it is in Connecticut, can enable more investment in early-stage entrepreneurs and innovators.

Technical School and College Programs – whether they are technical high schools advancing workforce development or HBCU, community college, or state university incubators, ensuring that every student has access to entrepreneurship, innovation, and STEM education programs is vitally important for underserved communities. Beyond the educational classroom aspects of these programs, many of them also include competitions to encourage entrepreneurship.

⁵ <u>www.ctinnovations.com</u>

DOE support of HBCU's across the country, technical schools, community colleges, and state universities in Connecticut for entrepreneurship, innovation, and STEM, would go a longways toward investing in the future of underserved communities.

It is important to note again, as was pointed out in response to the first question, that the DOE has historically invested resources of the USG in ways that are both imperative and enduring. Today, the Justice 40 Initiative is just as crucial, requiring a similar investment approach that is both intentional and long-term.

7. What types of services could non-governmental organizations provide to better position applicants for DOE funding?

<u>Response</u>

The following is a list of services that non-governmental organizations can provide to better position applicants <u>from underserved communities</u> to apply for DOE funding:

- <u>Technical Assistance</u> provide upfront local technical assistance (e.g., time, \$/person) to help identify grant opportunities and prepare proposals for submission.
- Facilitation and Coordination Assistance provide facilitation and coordination assistance among project partners to develop project scope, timeline, and deliverables for submission.
- <u>Process Improvements</u> use a two-step process weighted favorably towards Justice 40 Initiative investment and benefits to ensure that nonprofits in underserved communities aren't wasting time and effort on unsuccessful proposals by:
 - Assessing proposals before submission (e.g., concept papers) to weed out submitters; and
 - Seeking proposals from specific types of organizations (e.g., minority or women led organizations) through direct invitations to apply (i.e., after review of concept paper), noting that there is a better chance of approval versus being widely available.
- <u>Procurement</u> procure from Justice 40 Initiative qualified contractors.
- <u>Best Practices</u> provide examples of successful proposals that have been funded, especially those from organizations serving underserved communities.
- Lead by Example require state and local governments that receive federal funding to follow similar Justice 40 Initiative guidelines as the DOE is advancing (e.g., require certain things for underserved communities just as Davis Bacon does for labor).

It is vital that the DOE provide support services to underserved communities in order to better position them as applicants for funding.

8. If an organization were considering an initiative aimed at increasing diversity and representation in entrepreneurship, what actions might they consider? How can DOE support these organizations in their mission? What annual budget would be required? Please provide a brief explanation of potential activities at budget levels of up to \$50,000, \$50,000-150,000, \$150,000-250,000, and \$250,000-500,000.

<u>Response</u>

Speaking from experience, the Respondents would like to say that there is an unconscious bias against funding potential contractors, entrepreneurs, and innovators (i.e., applicants) from underserved communities because they might not have a strong net asset position on their balance sheet, a lot of cash in the bank, finance managers and accountants fulltime within their organizations, or other "on paper" resources that causes a false sense of distrust.⁶ These organizations are pushed to the back of the line and continue to be left underserved causing a failure to realize their true potential.

Having said that, if an organization were considering an initiative aimed at increasing diversity and representation in entrepreneurship, the following actions could be taken with DOE support for these organizations – see Table 2.

Actions	DOE Support	Up to \$50,000	\$50,000- \$150,000	\$150,000- 250,000	\$250,000- \$500,000	\$500,000+
Venture Capital	Funding, Due Diligence					Х
Foundation Grants	Funding					Х
Innovation Pilots	Funding, Mentoring					Х
Technical School	Funding, Mentoring				Х	
College Programs	Funding, Mentoring				Х	
Technical Assistance	Funding		Х			
Facilitation and Coordination	Funding			Х		
Process Improvements	Operations	Х				
Procurement	Operations	-				
Best Practices	Operations	-				
Lead by Example	Operations	_				

By setting aside DOE resources in the near- mid- and long-term to support the actions noted above, investment in innovators and entrepreneurs from underserved communities will increase over time. It is imperative that the DOE and Congressional leaders not only provide funding support, but also visit with smaller organizations assisting underserved communities through face-to-face visits, interviews with stakeholders, partners, and beneficiaries, to get to know them better, understand the impact they are making, and encourage them to do more. It is typical for the USG and Congressional leaders to visit sites that receive large federal contracts (e.g., Electric Boat and Pratt & Whitney in Connecticut), while ignoring smaller organizations that are delivering local impact to underserved communities. We need to do a better job reducing the perception of risk of investing

⁶ Unconscious bias against underserved communities is evidenced in financing for solar PV and energy efficiency as well. Green Banks have taken up the charge to demonstrate that underserved communities are good investments. "Performance of solar leasing for low- and middle-income customers in Connecticut" by Lawrence Berkeley National Labs (May 2021) – <u>click here</u>

in underserved communities by encouraging others to invest alongside the DOE and USG, in order to realize the full potential of our nation.

CONCLUSION

Without question, DOE funding for underserved communities will experience failures, just as other programs may have missed the mark on occasion. It is within the DOE's nature to invest in innovation, which is inherently risky (e.g., Solyndra), but incredibly rewarding (e.g., Tesla) for the advancement of technology and entrepreneurship. As noted, the DOE has invested resources of the USG in ways that are both imperative and enduring to the betterment of our nation. Today, the Justice 40 Initiative is just as crucial, requiring a similar investment approach that is intentional, long-term, and deserved of risk-taking for the sake of our country and the planet.

We stand ready as minority-led organizations from Connecticut to work with the DOE to advance its Justice 40 Initiatives to enable an inclusive and just entrepreneurial innovation ecosystem in climate and energy technologies in the Constitution State.

Sincerely,

/Brenda Watson/ Brenda Watson Executive Director Operation Fuel /Adrienne Farrar Houël/ Adrienne Farrar Houël President and CEO Greater Bridgeport Community Enterprises

/Bryan Garcia/ Bryan Garcia President and CEO Connecticut Green Bank

Cc: Department of Economic and Community Development Department of Energy and Environmental Protection Joint Committee of the Green Bank Board of Directors and the Energy Efficiency Board