Massachusetts Proposal for DOE Training for Residential Energy Contractors Grant (TREC)

Dedicated to innovating clean energy solutions

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MASSACHUSETTS CLEAN ENERGY CENTER®

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Mission:

The Massachusetts Clean Energy Center's mission is to accelerate the clean energy and climate solution innovation that is critical to meeting the Commonwealth's climate goals, advancing Massachusetts' position as an international climate leader while growing the state's clean energy economy.

How we approach our work:

Innovation

MassCEC supports innovation to develop new solutions to unmet challenges, and reduce cost and increase performance of existing solutions.

Workforce Development

MassCEC ensures we have a diverse and equitable workforce that is trained and ready to take part in the growing clean energy industry.

Market Development

MassCEC de-risks commercially ready technologies paving the way for broad adoption, filling gaps unmet by the private sector.

Overview

TRAINING FOR RESIDENTIAL ENERGY CONTRACTORS (TREC)

(FORMERLY THE HOME ENERGY EFFICIENCY CONTRACTOR TRAINING GRANT (CTG) PROGRAM)

- Funding opportunity through the Federal Department of Energy (US DOE)
- Deadline for application submittal is **January 31, 2024** (originally Sept 30, 2023)
- Massachusetts eligible to apply for just under **$2.8M** in formula funding. Potential for additional competitive funding available in 2024.
- Training programs must be approved by DOE to be eligible for funding

Training for Residential Energy Contractors (TREC) Program – An Overview

TREC is being run by the US Department of Energy (DOE) using **$200 million** enabled by the Inflation Reduction Act (Section 50123)

Program Overview: The Training for Residential Energy Contractors (TREC) program will provide States the ability to develop and implement a state workforce energy program that prepares workers to deliver energy efficiency, electrification, and clean energy improvements, including those covered under the Home Energy Performance-Based, Home Energy Rebates (HER-formerly HOMES) and the Home Electrification and Appliance Rebate Program (HEAR).

The goals of the program are to:

1. **Reduce the cost of training contractor employees** by providing workforce development tools for contractors, their employees, and individuals including, but not limited to, subsidizing available training, testing and certifications.

2. **Provide testing and certifications of contractors trained and educated** to install home energy efficiency and electrification technologies and deliver residential energy efficiency and electrification improvements.

3. **Partner with nonprofit organizations to develop and implement a State-sponsored workforce program** that attracts and trains a diverse set of local workers to deliver the influx of new federally-funded energy efficiency and electrification programs—including but not limited to the IRA-funded Home Energy Rebate programs (IRA Sections 50121 and 50122).

4. **Designed to help meet the Justice40 goal** that 40% of the overall benefits of Biden-Harris Administration investments in clean energy and climate solutions flow to disadvantaged communities, create good jobs with the free and fair chance to join a union, and foster economic revitalization in coal, oil and gas, and power plant communities.

MASSCEC/DOER Proposal Development Process

- The MassCEC and Department of Energy Resources (DOER) intend to apply for **$2.79M** in formula funding and await details on the additional competitive funding opportunity
- MassCEC is currently seeking feedback from external stakeholders and strategic partners
    - Organized Labor
    - Utilities - Community First Projects
    - Contractors, particularly MWBEs and signatory businesses
    - MassCEC Equity Training and MWBE Partners
    - MassCEC EmPower Grantees
    - Community-based organizations within environmental justice communities such as ABCD, Worcester Community Action Council, etc.
    - MassHire
    - Educational institutions including community colleges and vocational technical high schools
- MassCEC and DOER are considering strategically deploying funding largely to scale existing workforce programs but may, in coordination with other funding, also support new programming as needed
    - Seek to braid other workforce funding (such as MassCEC Equity Workforce grants) to ensure quality programming and supports to expand business and workforce opportunities for disadvantaged populations.
    - Support new workforce entrants, upskilling current workers and expansion of existing businesses into energy-efficiency work
- Upon award of this TREC formula funding, MassCEC and DOER plan to issue a competitive solicitation to award funds to eligible training providers or programs.

Population Focus for Participants

TREC funds can be used to attract, train, certify, place, and retain a diverse set of local workers to deliver the influx of new federally-funded energy efficiency and electrification programs. This funding opportunity has been designed to help meet the goals of the Biden-Harris Administration's Justice40 Initiative, as such MassCEC anticipates that **40% of the benefits of these funds will support residents of disadvantaged communities or Justice40 Communities.**

- Justice40 Communities (map) – Examples in MA with significant concentrations of Justice40 Census Tracts* include: Dorchester, Roxbury, Chelsea, Lawrence, New Bedford, Fall River, Worcester, Holyoke, Springfield
- Potential to braid with MassCEC Equity Funding to expand further into environmental justice populations as defined in Massachusetts
- Benefits can include both training participants who reside in Justice40 or EJ communities, or contractors whose work is concentrated in these communities to upgrade existing residential single and multi-family housing.

*Census tracts are small units of geography that generally have populations between 1,200 and 8,000 people. They are similar to what many would consider neighborhoods.

Occupational Focus

The TREC funding opportunity is limited to certifications that are recognized by US DOE, which, at this time, include predominantly upskilling opportunities for incumbent workers in the first three occupations to the right in bold.

As of 2022, an estimated 26.2% of all clean energy workers in MA were people of color, compared to 19.1% of the overall workforce.

MassCEC recognizes that the greatest projected need for new entrants is among electricians, and we will continue to direct our other resources to support aligned workforce development efforts for electricians and other climate-critical occupations that are beyond the scope of the approved certifications for this grant.

- Focus on in-demand professions, including:
  - **Energy Analysts/Auditors**
  - **Home Performance Contractors**
  - **HVAC Contractors**
  - Plumbers
  - Electricians

Occupation Title	SOC Code	2022 Clean Energy Employment*	Net Change in Clean Energy Employment (2022-2030)
Construction and Building Inspectors (Energy Analyst/ HERS Rater)	47-4010	2,096	532
Heating, Ventilation, Air Conditioning, and Refrigeration Mechanics and Installers	49-9020	3,844	650

Source: *Powering the Future: A MA Clean Energy Workforce Needs Assessment* and *2022 Mass Clean Energy Industry Report*

* Based on 2022 MA Clean Energy Industry Report and 2022 & 2030 Clean Energy & Climate Plan.

US DOE Recognition of Certifications and Trainings

- To support the development of a robust building systems workforce, the Department of energy recognizes training and certifications programs that are aligned with DOE goals.
- DOE recognized trainings are listed at https://bsesc.energy.gov/recognition

and currently include:

	Building Performance Institute (BPI)	Home Energy Professional (HEP) Energy Auditor Building Analyst Professional (BA-P)
	Residential Energy Services Network (RESNET)	Certified Home Energy Rater

	NATE Certification with Heat Pump Service Specialty NATE Certification with Heat Pump Installation Specialty

	Building Performance Institute - Building Analyst Professional (BA-P)	Energy Analyst/HERS Rater	North American Technician Excellence (NATE)
Duration	35-66 hours	36 hours online, 5 days classroom/field	250 - 330 hours
Cost	$1,700-$2,599	$3,000	$2,800 - $3,600
Barriers to Access/Completion	• Pre-requisites: Building Science Principles (BSP) and Building Analyst Technician (BA-T) • English language proficiency • Limited availability of training in or near environmental justice communities	• Prior experience in building science, trades, and related occupations • Limited in-person training in Massachusetts, majority offered online • English language proficiency	• One to two years industry experience • English language proficiency
Sample of Training Providers Active in MA	Green Jobs Academy (SMOC) Everblue Training Institute Abode Energy Management	Northeast Home Energy Rating System (NEHERS)	HVACRedu Blue Hills Regional Technical School Bunker Hill Community College Interplay Learning

Evaluation Plan

- TREC proposal to DOE requires determination of metrics for assessing impact. MassCEC plans to evaluate TREC program progress and outcomes.
- Performance metrics to be collected may include but are not limited to:
  - Number of individuals and/or businesses enrolled in training program
  - Percentage of those enrolled who complete training program
  - Number/percentage of those who complete who receive an industry recognized certification or credential
  - Number of participants from underserved or underrepresented communities
  - Number of individuals placed in employment, receiving promotion, or connected to registered apprenticeship
  - Estimated cost of training per participant
  - Number of communities of interest served (i.e. disadvantaged and Massachusetts definition of environmental justice)
  - Most impactful best practices that emerge for recruiting participants (training and businesses) from communities of interest
  - Depth of engagement with environmental justice communities to recruit for participation, partnership, and awareness of energy efficiency solutions for the home

Guiding Questions and Next Steps

TREC proposal request for feedback

- Do you have any additional questions or concerns about the proposal that we are working on?
- What strategies do you think would be most helpful to increase access to this program?
- What additional stakeholders and organizations should we engage with?

Contact us

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Appendix
(More detailed job demand numbers)

TREC Priority Occupational Demand by Workforce Skills Cabinet Region 2022-2030

- **Energy Analysts/Auditors** fall under the Construction and Building Inspectors Standard Occupation Code (SOC)
- **Home Performance Contractors** are not currently captured by an existing SOC.
- **HVAC Contractors** fall under Heating, Air Conditioning, and Refrigeration Mechanics and Installers SOC.

	SOC	Berkshire	Pioneer Valley	Central Mass	Northeast	Greater Boston	Southeast	Cape Cod and Islands
Construction and Building Inspectors (Energy Analyst/ HERS Rater)	**47-4010**	10	41	60	76	194	117	34
Heating, Air Conditioning, and Refrigeration Mechanics and Installers	**49-9020**	14	50	72	92	235	147	40

Source: *Powering the Future: A MA Clean Energy Workforce Needs Assessment*