

City of Newton, Massachusetts

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Senator Michael Barrett Co-Chair, Joint Committee on Telecommunication, Utilities and Energy State House Boston, MA 02133

Mike.Barrett@masenate.gov Lexi.Concannon@masenate.gov

Representative Jeffrey Roy Co-Chair, Joint Committee on Telecommunication, Utilities and Energy State House Boston, MA 02133

<u>Jeffrey.Roy@mahouse.gov</u> JointCommittee.Utilities&Energy@malegislature.gov

Re: An Act Relative to the Electrification of New and Substantially Remodeled or Rehabilitated Buildings, H.3183 and S.2115

Dear Chair Barrett and Chair Roy:

I am writing in strong support of An Act Relative to the Electrification of New and Substantially Remodeled or Rehabilitated Buildings, H.3183 and S.2115. I appreciate the opportunity to support this legislation.

I was the Massachusetts Undersecretary of Energy from 2008 to 2010, and the Chair of the Massachusetts Department of Public Utilities from 2010 to 2015. I am currently the Co-Director of Sustainability in the City of Newton.

In my local role, even more than in my earlier positions, I am acutely aware of the contribution that buildings make to our greenhouse gas emissions—over 60% in Newton, which is not atypical. This figure does not include the emissions from the leaky pipes that deliver natural gas — the fossil fuel most commonly used for heating — to our buildings.

You well understand that electrification of both transportation and buildings is the clear path forward to addressing climate change. It's not the only path—energy efficiency is also crucial—but electrification of buildings is essential. Electrification of new construction and significant renovations is the absolutely lowest-hanging fruit in this regard. It is technically easier than retrofitting existing buildings and less expensive. Moreover, it avoids creating stranded assets, that is, buildings that will need to be retrofitted long before the

end of their useful life. It simply makes no sense to build new and remodeled buildings with the fossil fuels that need to be eliminated as quickly as possible.

Perhaps surprisingly, it is the case that even now, with the current electric grid mix, using an electrically powered air-source heat pump to provide heating (and cooling) results in less than half the greenhouse gas emissions of an efficient boiler powered by natural gas. In 2050, thanks to the expected increase of solar- and wind-generated power, the State Department of Energy Resources ("DOER") reports that electric heating is projected to reduce greenhouse gas emissions by 98 percent compared with gas heating.

Newton looks forward to being one of the ten communities that will be allowed to require new buildings and major renovations to be all-electric pursuant to the legislation that created the State's Ten Communities Program. The legislation that created that program was welcome. However, given extensive experience to date with all-electric construction, this "pilot" program simply stops short of the policy we need. Moreover, the State does not typically leave the choice of whether to enact important health and safety measures, like smoke detectors and lead paint removal, to a city or town.

We know not only that new buildings and significant renovations need to be constructed to be all-electric, but we know as well how to do it affordably. DOER maintains that it "has commissioned studies to analyze the change in construction costs related to building to the Stretch code for several sizes and types of residences, and they generally indicate the construction and operating costs are lower under the Stretch code standards with fully electric heating and cooling via heat pumps." https://www.mass.gov/doc/2023-stretch-energy-and-municipal-opt-in-specialized-building-code-faq/download. These case studies are available on DOER's website: https://www.mass.gov/doc/residential-Stretch-code-costs-and-benefits-case-studies/download.

I have heard the concern that the workforce simply does not exist to implement such an electrification requirement. However, the reality is that nothing will help create the necessary workforce more quickly than the requirement contained in this legislation.

Once again, I appreciate your considering my comments.

Sincerely,

Ann G. Berwick

Co-Director of Sustainability

Em G. Benick