

The Commonwealth of Massachusetts

PRESENTED BY:

Michael J. Barrett

To the Honorable Senate and House of Representatives of the Commonwealth of Massachusetts in General Court assembled:

The undersigned legislators and/or citizens respectfully petition for the adoption of the accompanying bill:

An Act to encourage the deployment of heat pumps.

PETITION OF:

NAME:	DISTRICT/ADDRESS:	
Michael J. Barrett	Third Middlesex	
James B. Eldridge	Middlesex and Worcester	1/30/2019
Tommy Vitolo	15th Norfolk	1/31/2019
Denise Provost	27th Middlesex	1/31/2019
Brendan P. Crighton	Third Essex	2/1/2019

The Commonwealth of Massachusetts

In the One Hundred and Ninety-First General Court (2019-2020)

An Act to encourage the deployment of heat pumps.

Be it enacted by the Senate and House of Representatives in General Court assembled, and by the authority of the same, as follows:

1	SECTION 1. (a) On or before July 31, 2020, the department of energy resources shall
2	publish numerical data on the current statewide utilization of: (1) heat pumps for space heating
3	and cooling, including air-source heat pumps, ground-source heat pumps, water-source heat
4	pumps, and variable refrigerant flow systems installed in residential, commercial, industrial,
5	institutional, and government buildings; (2) heat pump water heaters in residential, commercial,
6	industrial, institutional, and government buildings; and (3) any other economically feasible
7	technology that serves to electrify major heating and cooling end-uses. Data shall include but not
8	be limited to: (1) estimates of current adoption across Massachusetts residential, commercial,
9	industrial, institutional, and government buildings; and (2) estimates of energy, natural gas, and
10	fuel consumption reductions attributable to the statewide adoption of each technology.
11	(b) On or before December 31, 2020, the department of energy resources shall adopt
12	numerical targets, to be achieved by December 31, 2030, for statewide increases in the utilization
13	of each technology named in subsection (a), with the objective of maximizing the utilization
14	within the commonwealth of non-fossil fuel means of heating and cooling buildings. The

department shall submit a report on policies most likely to result in the achievement of these targets, which shall include legislative recommendations, to the chairs of the joint committee on telecommunications, utilities and energy, and the chairs of the house and senate committees on ways and means.

(c) On or before December 31, 2025, the department shall publish a report on progress in
statewide adoption and on policies that may be needed to achieve the targets established pursuant
to subsection (b). The department shall recommend updates to the targets, if necessary, and shall
provide a rationale for such updates.

SECTION 2. As used in this section the following words shall have the following
 meanings unless the context clearly requires otherwise:-

25 "Heat pump", a temperature regulation system or technology that provides all or a portion 26 of the heating and cooling needs of a residential or commercial building by capturing thermal 27 energy via refrigerant and transporting the captured thermal energy back and forth between a 28 building's internal spaces and external air, ground, or water sources.

29 "Heat pump water heater", any water heating system that uses heat pump technologies to30 heat water for use in a residential or commercial building.

The board of building regulations and standards, as established by section 93 of chapter 143 of the General Laws, in consultation with the department of energy resources, shall include requirements that all new construction be built to accommodate the installation of a heat pump system and heat pump hot water heater as amendments to the state building and electric code. Amendments established pursuant to this section shall include an provision for developers to seek an exemption from the requirements upon a showing that: (1) a commercial building's heating and cooling needs will verifiably not benefit from heat pump or heat pump water heater implementation, as confirmed by the board; or (2) the implementation of heat pump and heat pump water heater accommodation will be prohibitively expensive to new housing built for publicly-assisted housing.

SECTION 3. Amendments to the building and electric code made pursuant to section 2 of
this act shall be in effect no later than January 1, 2021.