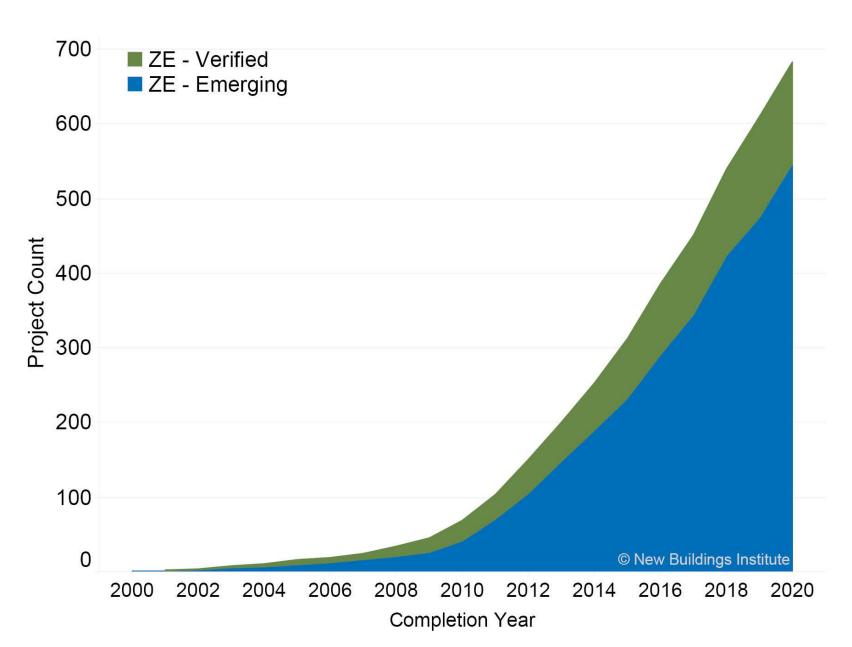
# **EXISTING BUILDING ELECTRIFICATION**



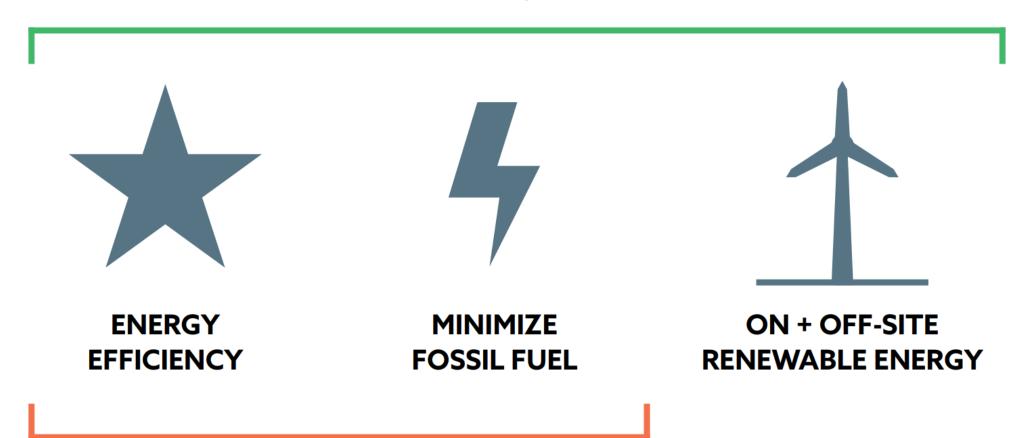
#### **NET ZERO BUILDINGS U.S.**



#### **NET ZERO BUILDINGS MASSACHUSETTS**



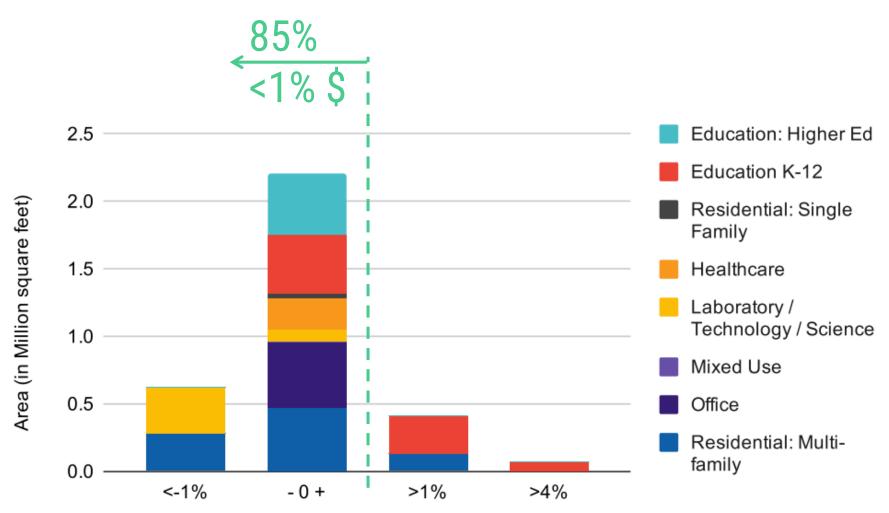
### NET ZERO - 5.5 Million Sq Ft in MA



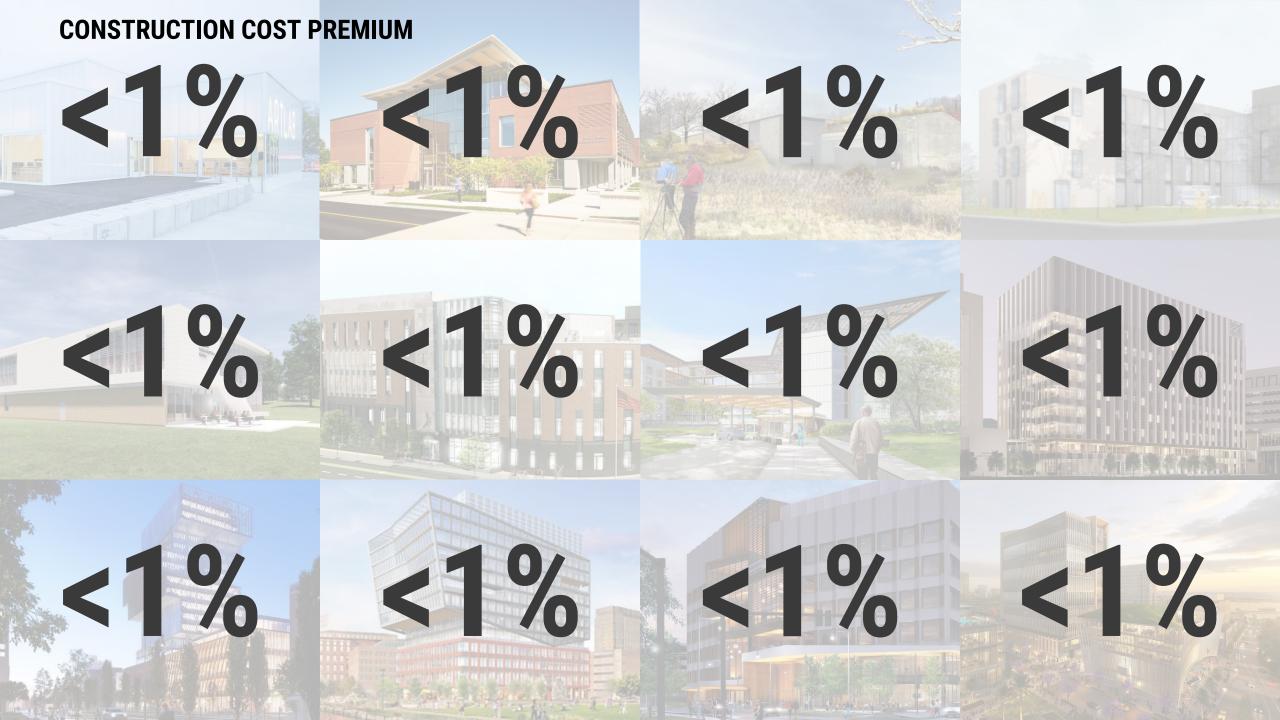
NET ZERO READY - 7.2 Million Sq Ft in MA

#### **CONSTRUCTION COST PREMIUM**

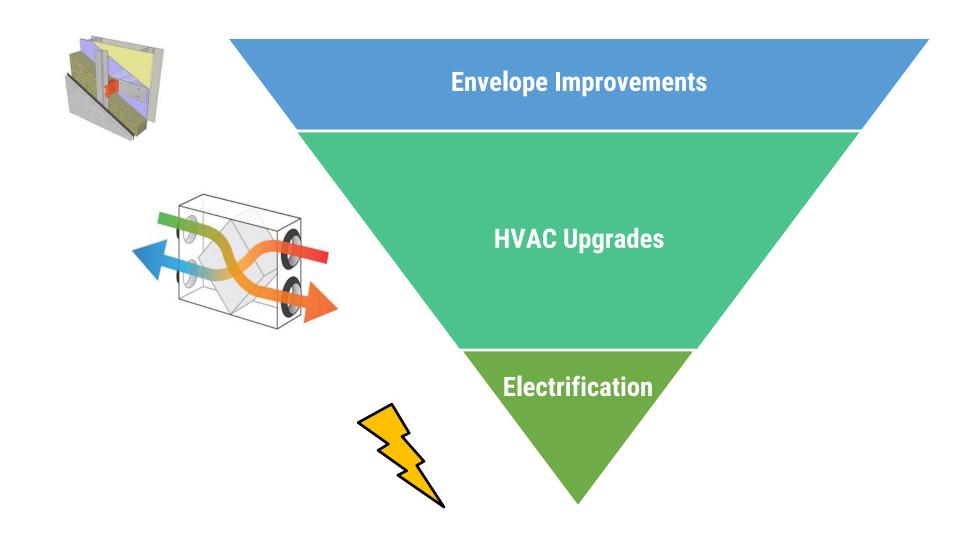








#### **BUILDING ELECTRIFICATION**



## **EXISTING BUILDING ELECTRIFICATION**

- Higher-Ed
- Historic
- Healthcare
- Labs/Pharma Manufacturing













#### **HIGHER-ED**

#### Wide Range of:

- Building Types
- Facility Conditions
- Existing Energy Performance

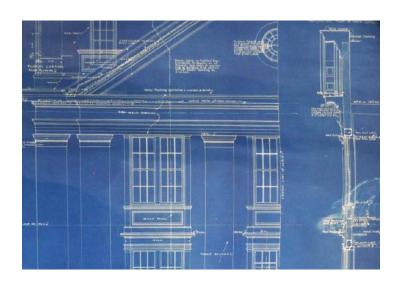
#### **Key Considerations:**

- Expansion Master Plan
- Level of Retrofit Viable
- Stand-Alone vs. Precinct vs. Central



#### **HISTORIC**

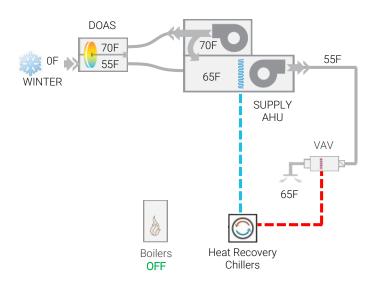
- Historic Window Sash and Weatherstripping Replacement
- Insulate + Air-Seal
- Smart Vapor Barrier
- Energy Recover Ventilators >90% Ef
- Ground-Source vs. Air-Source





#### **HEALTHCARE**

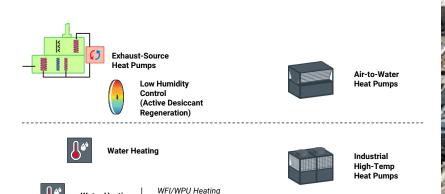
- Exhaust/Relief Over-Recovery
- Heat Recovery Chillers
- Adiabatic Humidification
- Air-Source Indirect Domestic HW
- Electric Steam Sterilization
- 3<sup>rd</sup> Party District Energy





#### LABS / PHARMA

- Advanced Exhaust Heat Recovery
- Exhaust-Source Heat Pump
- Air-to-Water Heat Pumps
- Industrial High-Temp Heat Pumps



Electric Point of Use / Electric Steam

Humidifier

Autoclave Cage Wash

