



Silicon Valley Innovations

Northern California Communities

Global Economies

Innovating in the Built Environment

New Net Zero Projects



CA Strategic Objective

40,000
GWh/year

63,000
GWh/year

Zero net
energy homes

Zero net energy
commercial buildings

Energy
Efficiency

2008

2010

2013

2015

2016

2020

2025

2030

2050

ZNE demonstration projects



MarketZero

Taking an Existing Grocery Store to Near-ZNE

Upgrade a Whole Foods grocery store with high current energy use



Innovate Net Zero

Net Zero Demonstration in Low-Income Mixed-Use Housing

Mixed-use, low-income multi-unit housing (first-of-its-kind retrofit in US)

Strategic Objectives

- Deliver leading edge, cost-effective upgrades
- Create a platform for emerging technologies
- Leverage projects to build expertise in community



Project: Whole Foods ZNE

- 3950 24th St., San Francisco (Noe Valley)
- 1 story, 25,000 sqft, built 1968
- Efficiency goal: 40% to 60% reduction EUI
- www.prospectsv.org/marketzero/



Projects: Eddy St. ZNE

- 160 Eddy St., San Francisco
- 4 story, 41,000 sqft, built 1908
- Efficiency goal: 50% reduction EUI
- www.prospectsv.org/innovate-net-zero
- Show & Tell (if time)



Challenges to Address

Grocery Store

- Very high energy use
- Constrained spaces
- Aesthetic requirements
- ROI requirements
- Operational requirements

Multi-unit

- Very constrained physical spaces
- Tenant management and behavior
- Historic facade
- Operational requirements

Timelines

- 2016 Q2 – Q4 Technology Discovery
- 2016 Q4 – 2017 Q2 Design
- 2017 Q2 – 2018 Q1 Construction
- 2018 Q2 – 2019 Q4 Commissioning and M&V
- Ongoing Knowledge Transfer

Opportunities to Engage

- Technical Advisory Committee
- New Technology Discovery
- Knowledge Transfer