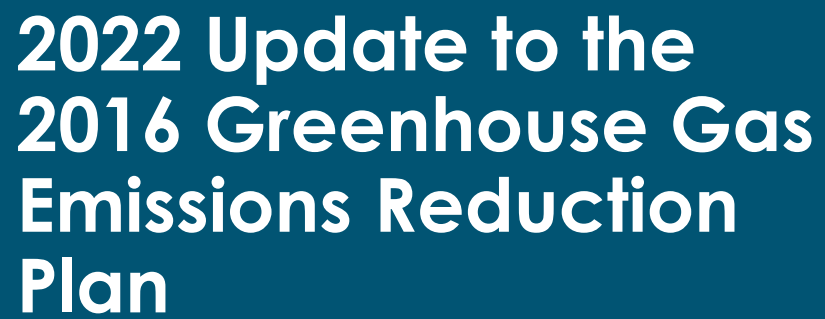


The logo for RIEC 4, with 'RIEC' in a dark blue serif font and '4' in a green sans-serif font.

# RIEC<sup>4</sup>

The main title of the report, displayed in white text within a large blue circular graphic on the left side of the page.

## 2022 Update to the 2016 Greenhouse Gas Emissions Reduction Plan

The date of the report, displayed in white text below the title.

December 2022



# 2021 Act on Climate

The Act on Climate establishes economy-wide emissions reduction targets of:

- 10% below 1990 levels by 2020
- 45% below 1990 levels by 2030
- 80% below 1990 levels by 2040
- **Net-zero emissions by 2050**

- By 12-31-2022, the EC4 shall submit an update to the 2016 GHG Reduction Plan to Governor & General Assembly
- By 12-31-2025 (and every 5 years), the EC4 must submit an updated Climate Change Strategic Plan, following public comment, that includes strategies/programs/actions to meet economy-wide targets for GHG reductions
- Develop public metrics and an online public dashboard tracking both emissions reductions and sources of energy consumed by the state
- Each agency has authority to promulgate rules and regulations necessary to meet the GHG reduction mandates



## Update – 2016 GHG Reduction Plan

- 6 years since our last significant comprehensive climate report
- Additional research/analysis since 2016 has altered our focus and direction
- RI needs to leverage lessons learned and chart an updated course of action
- Federal disengagement between 2016-2020; drove the need for state leadership



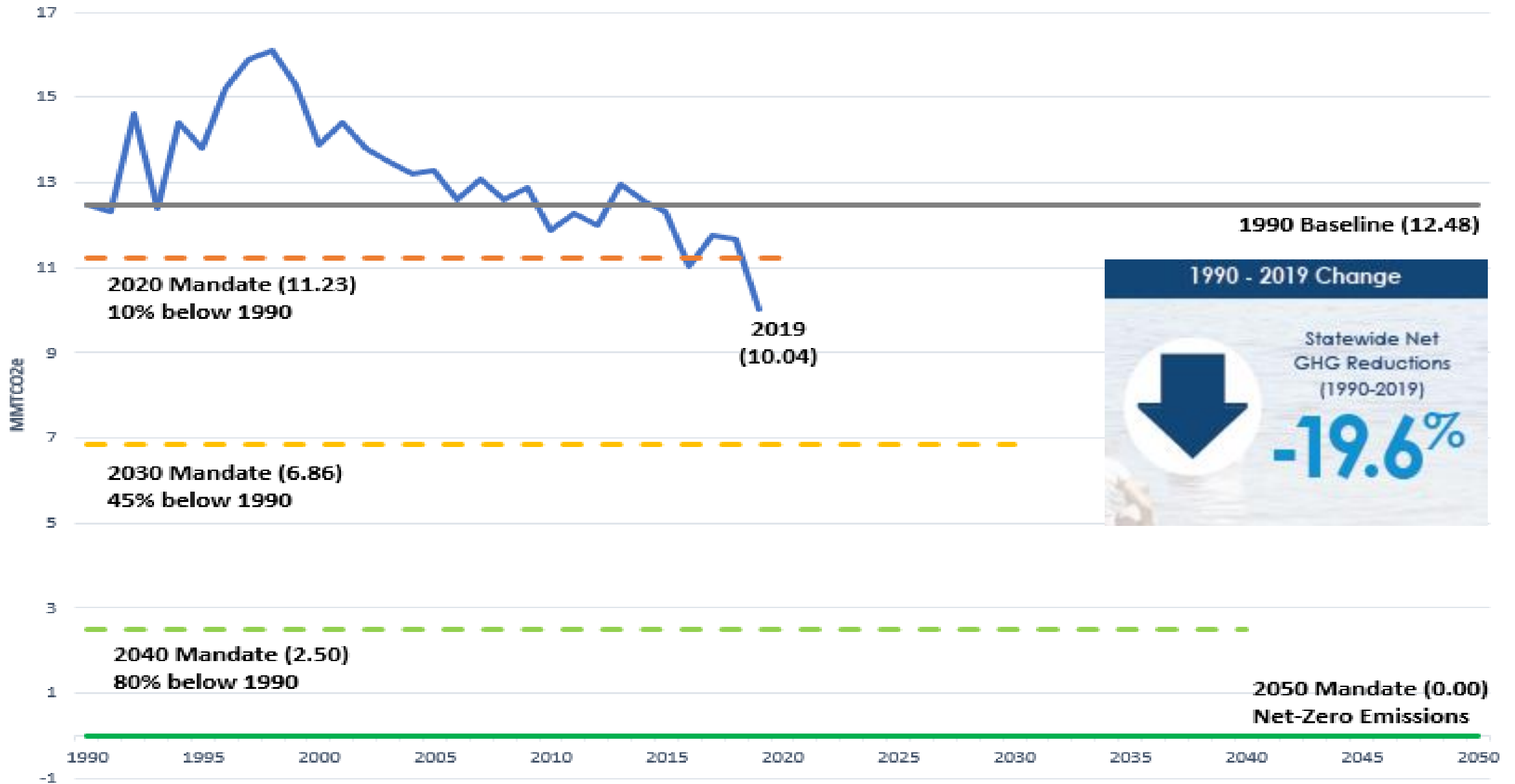
# Consensus on Scope

- Be responsive to the 2021 Act on Climate
- Center equity and public participation
- Leverage lessons learned since 2016
- Share high-level modeling results which shows policy impacts
- Focus on near-term actions
- Build a strong foundation for the larger 2025 Climate Strategy



# Rhode Island Greenhouse Gas Emissions Inventory

## 2021 Act on Climate Mandates



# Profile of RI's GHG Sources

## Quick Facts



1990-2019

Rhode Island Greenhouse Gas (GHG) Emissions Inventory

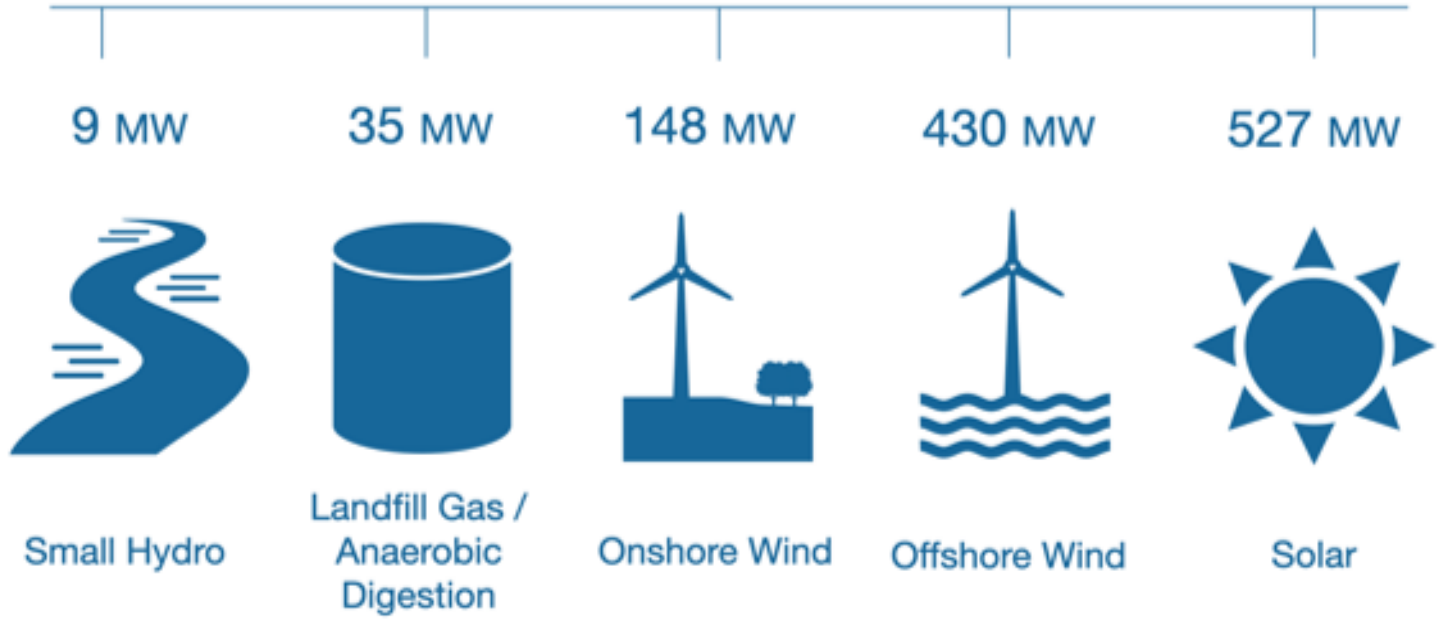
### Gross GHG Emissions by Economic Sector in 2019



**2022  
Jun 30**

# Rhode Island Clean Energy Portfolio

## 1,149 Megawatts



*Includes both current electricity production and future production under contract.*





# Key Legislation & Studies

## 2021-2022 Enacted Legislation:

- 2021 Act on Climate
- Extension of Least Cost Procurement and State Energy
- Efficiency Programs through 2028
- Extension of the Renewable Energy Fund through 2028
- Updates to Energy Efficiency Appliance Standards
- 100% Renewable Energy Standard by 2033
- 600 to 1,000 MW Offshore Wind Procurement RFP
- \$25M High-Efficient Heat Pump Program (Budget)
- \$23 million EV Charging Station Infrastructure Program Implementation Process (Budget)
- EJ representative on EC4 Advisory Board

## Studies:

- 100% Renewable Energy
- Heating Sector Transformation
- Solar Siting Opportunities



# Electric Sector Priorities

- Implement the 100% RES
- Modernize the electric grid
- Deploy advanced meters
- Procure offshore wind
- Continue deep investments in energy efficiency
- Complete RGGI program review



# Transportation Sector Priorities

- Target 10% EV registrations by 2030
- Align future transportation funding with Transit Master Plan & Bicycle Mobility Plan
- Continue RIPTA electrification
- Adopt Advanced Clean Trucks (ACT) rule
- Continue EV/E-Bike incentives
- Model climate impacts of transportation projects
- Develop 'Complete Streets' plan



## Thermal Sector Priorities

- Target 15% penetration of electric heat pumps by 2030
- Scale up heat pump incentives
- Adhere to biodiesel blending
- Explore gas system transformation (Future of Gas Docket)
- Continue energy efficiency & weatherization
- Begin developing 100% Renewable Thermal Standard

A stylized graphic on the left side of the slide. It features a hand in shades of brown and tan, with fingers curled around a globe. The globe is composed of various shades of green and cyan. The background is a solid blue color with some abstract, curved lines in brown and cyan.

# Climate Justice Priorities

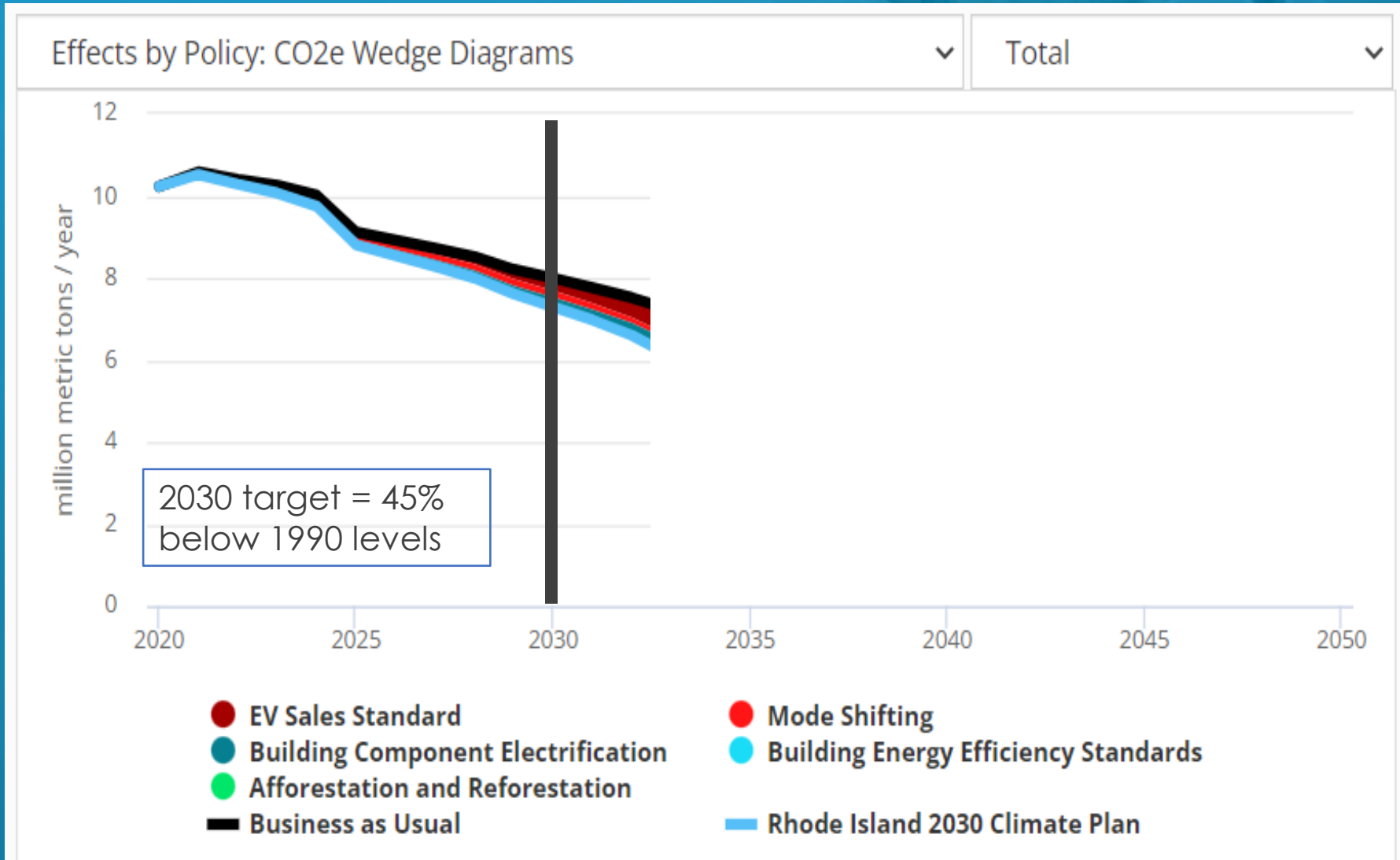
- Better align work of the EC4 with Health Equity Zones (HEZ) priorities/communities
- Create space for meaningful conversation (e.g. climate justice advisory group)
- Better coordinate state & local investments for urban trees
- Provide technical assistance to communities
- Promote research into the impacts of climate change in overburdened and underserved communities



## Land Use Priorities

- Explore improvements to siting guidance and incentives that push solar development away from forests and agricultural lands towards previously disturbed sites
- Identify a more stable and predictable funding stream for land conservation
- Coordinate state and local investments in urban tree programs
- Expand existing programs that promote local agriculture
- Promote research and policies that invest in regenerative agriculture practices

# A Peek at the Future – Acadia Center Modeling



- Electrifying the transportation sector & installing efficient electric appliances for space and water heating (e.g. heat pumps) combined have the most significant impact on GHG reductions in RI between 2020 and 2030

- Adoption of all the scenarios modeled results in a **40.8%** reduction in GHG emissions by 2030

HIGH  
EMISSIONS



## Highlights for 2023

- Funding to support the EC4
- Implementation & deployment of federal energy funds (infrastructure and inflation laws) for EV charging infrastructure and electrification of households
- Rolling out RI's \$25 Million (Federal Stimulus Funds) High-Efficiency Heat Pump Program
- 600 to 1,000 MW Offshore Wind RFP Procurement Results
- Significant PUC dockets (Future of Gas, Grid Modernization and Smart Meters)
- Center climate and energy justice
- Regulatory actions on clean cars
- Further electrification of transit & school buses
- New climate dashboard
- Investments in urban trees

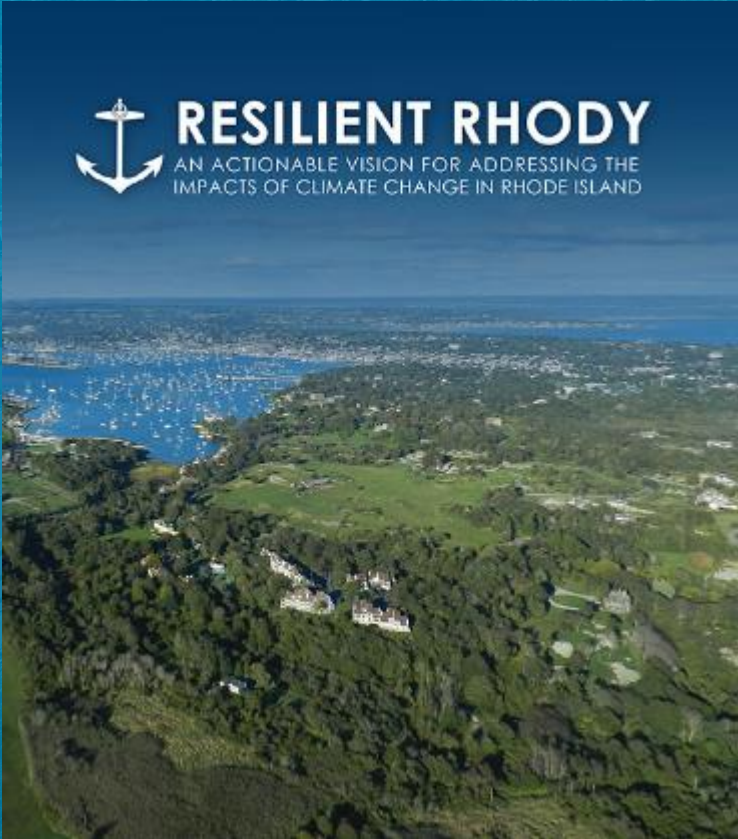


# Looking Ahead to 2025

- Build off public involvement success to date
- Engagement of disadvantaged/underserved communities
- Engagement of municipalities & businesses
- Harness the expertise of EC4 STAB & Advisory Board
- More refined modeling/more scenarios
- Invest in ports/workforce/just transition
- Resources & budget
- Metrics & dashboard

# Resilience Remains Critical

- Continued implementation of Municipal Resilience Program (MRP)
- Implementation of Ocean State Climate Adaptation and Resilience (OSCAR) Fund



(2018)