
SFEI
AQUATIC SCIENCE CENTER
SAN FRANCISCO ESTUARY INSTITUTE & THE AQUATIC SCIENCE CENTER
Climate Change =
Opportunities for Leadership

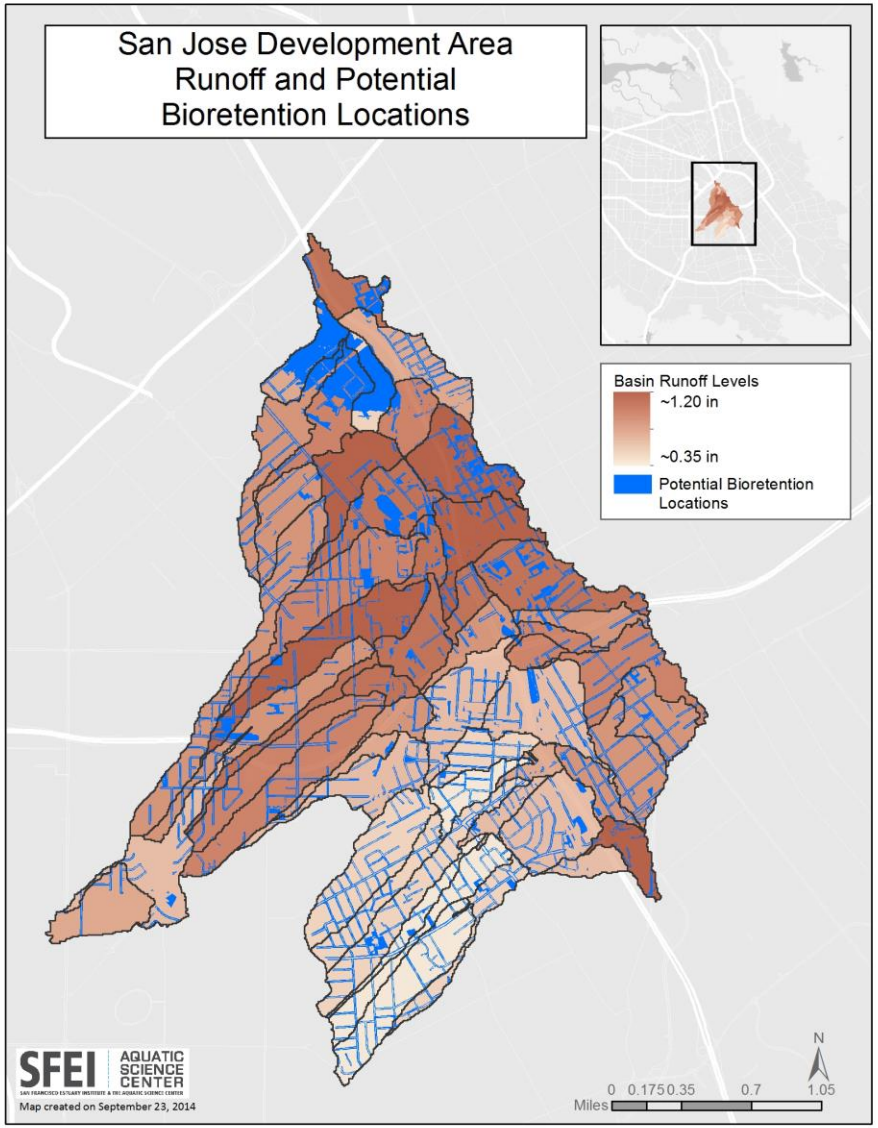

• Clean Water
• Resilient Landscapes
• Environmental Informatics

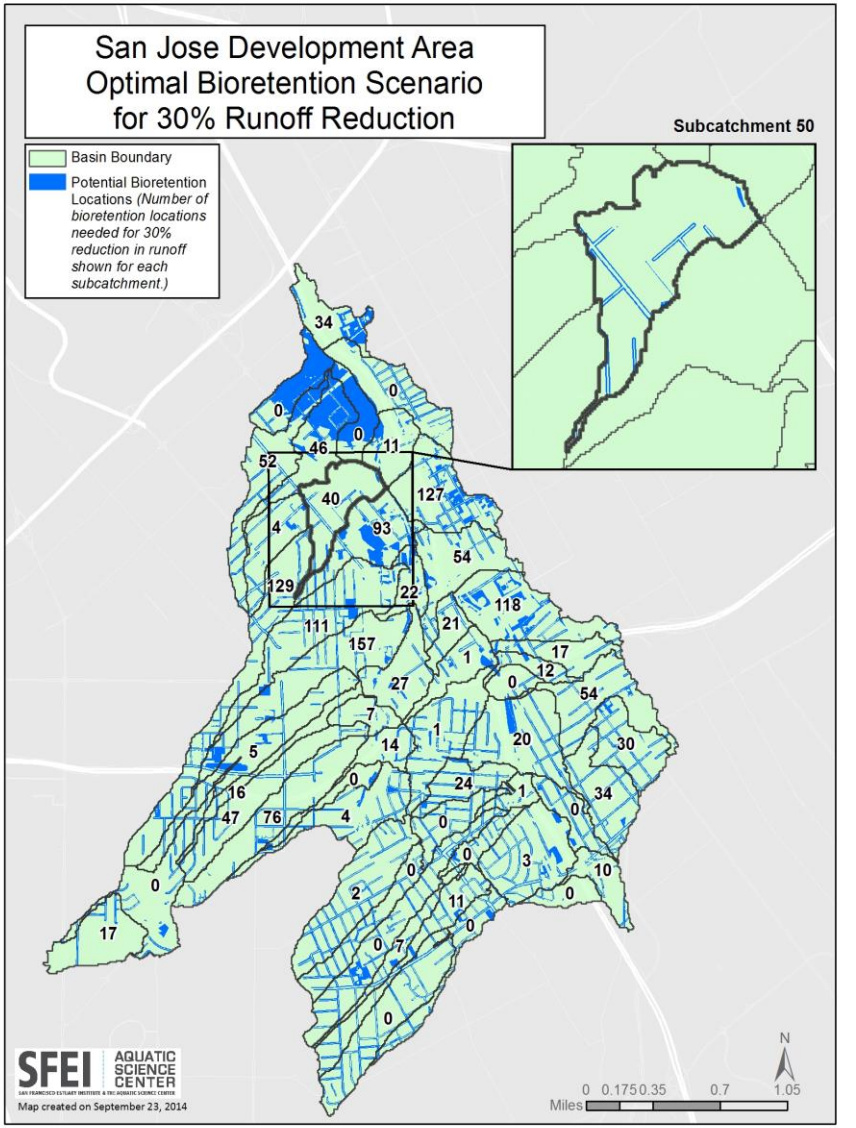

Clean Water

RMP UPDATE 2014

A Report of the Regional Monitoring Program for Water Quality in San Francisco Bay

Green Plan-IT Tool Kit





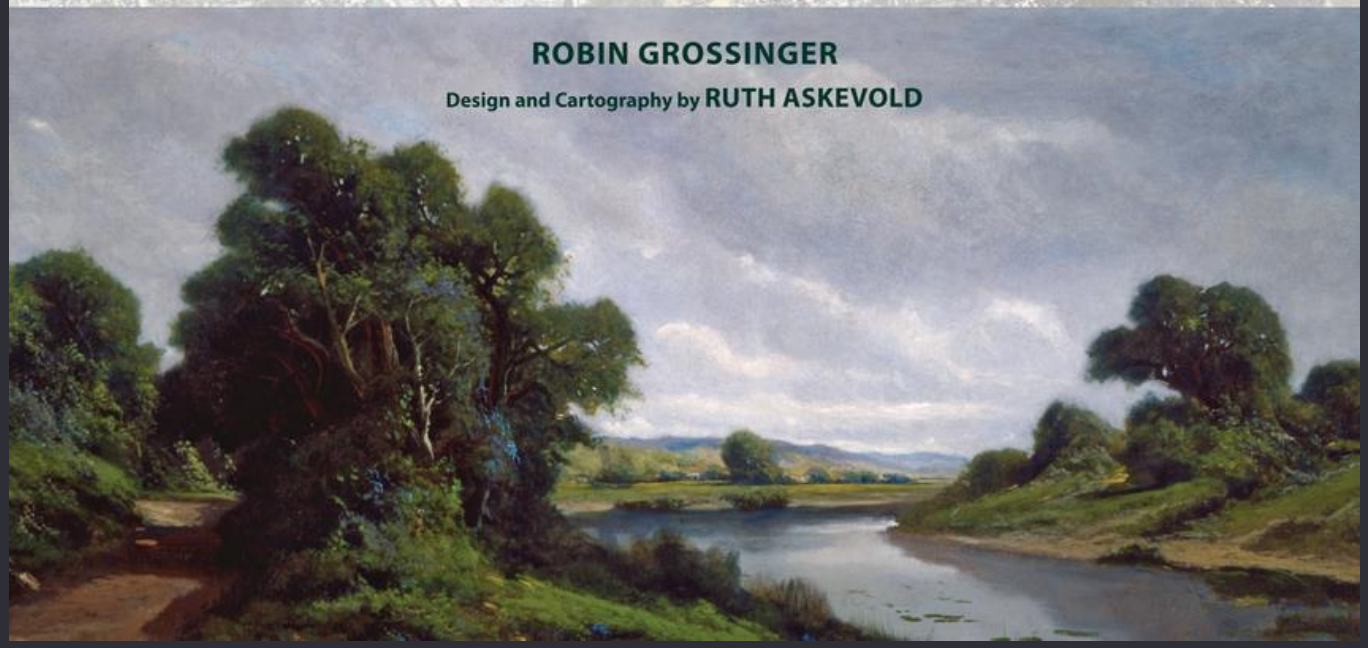
Resilient Landscapes

NAPA VALLEY
HISTORICAL ECOLOGY ATLAS

EXPLORING A HIDDEN LANDSCAPE OF TRANSFORMATION AND RESILIENCE

ROBIN GROSSINGER

Design and Cartography by RUTH ASKEVOLD




Environmental
Informatics


Web App Development
Geographic Information Systems
Data Services
Environmental Informatics
IT Systems
Design and Visual Communications

Where are the aquatic resources and how are they doing?

EcoAtlas

About EcoAtlas

California EcoAtlas provides access to information for effective wetland management. The maps and tools can be used to create a complete picture of aquatic resources in the landscape by integrating stream and wetland maps, restoration information, and monitoring results with land use, transportation, and other information important to the state's wetlands.

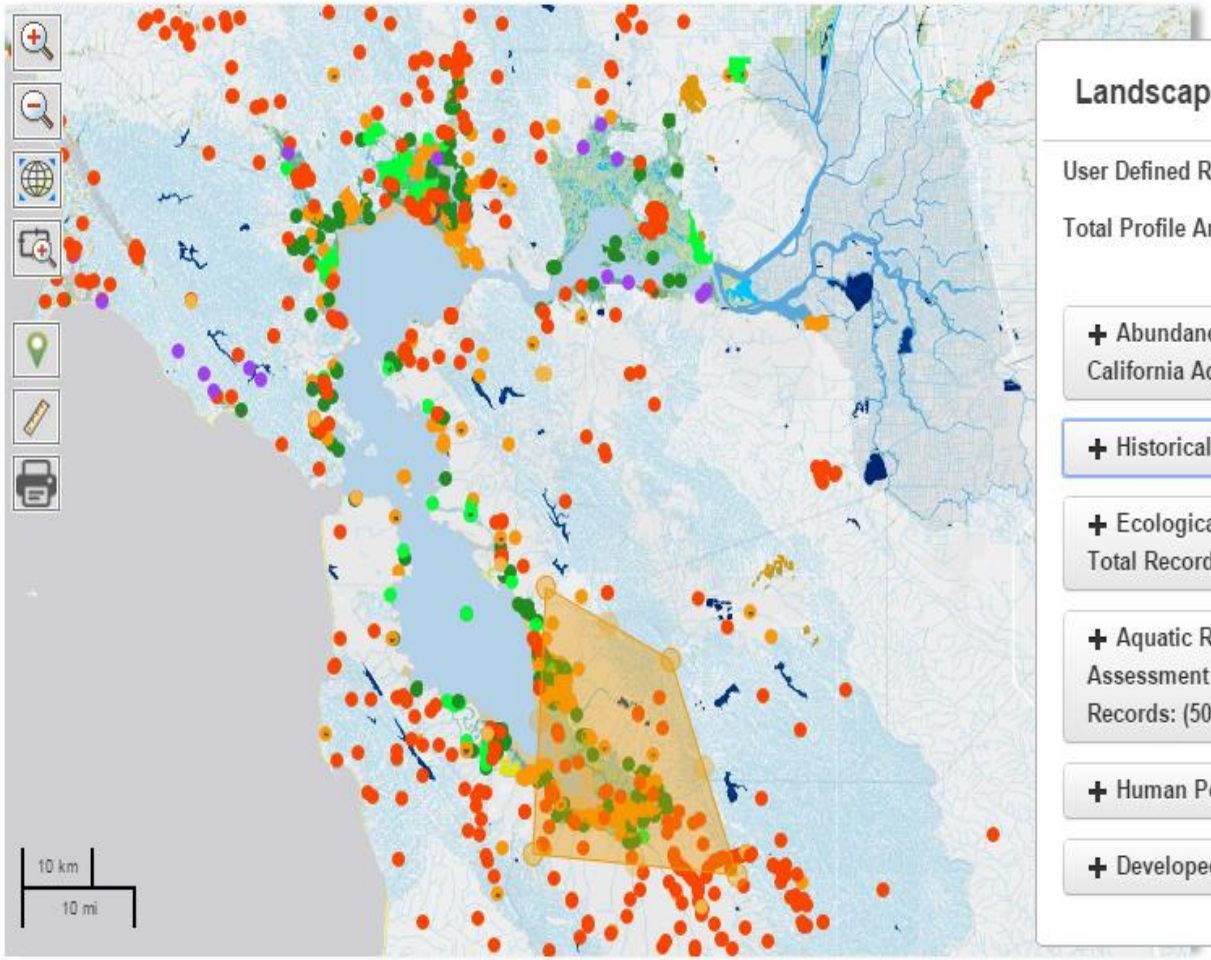
- **Projects:** Restoration project maps, plans, contact information, and a library of project files.
- **Resource Extent:** Maps of aquatic resource extent and special habitats of interest.
- **Condition:** Assessment and monitoring data including relevant water quality and California Rapid Assessment Method (CRAM) data.

Statewide

Map Projects Summaries

Ecoregions | Water Board Regions

- Klamath/North Coast
- Bay/Delta
- Central Coast
- Modoc
- South Coast
- Sierra
- Sacramento Valley
- Mojave
- San Joaquin Valley
- Colorado Desert



Landscape Profile

User Defined Region

Print Report

Total Profile Area: 180,389.5 acres or 281.9 miles^2

+ Abundance and Diversity of Existing Aquatic Resources based on California Aquatic Resource Inventory (CARI)

+ Historical Aquatic Resources

+ Ecological Restoration based on Wetland Projects within Profile – Total Records: (47)

+ Aquatic Resource Condition based on California Rapid Assessment Method for Wetlands (CRAM) within Profile – Total Records: (50)

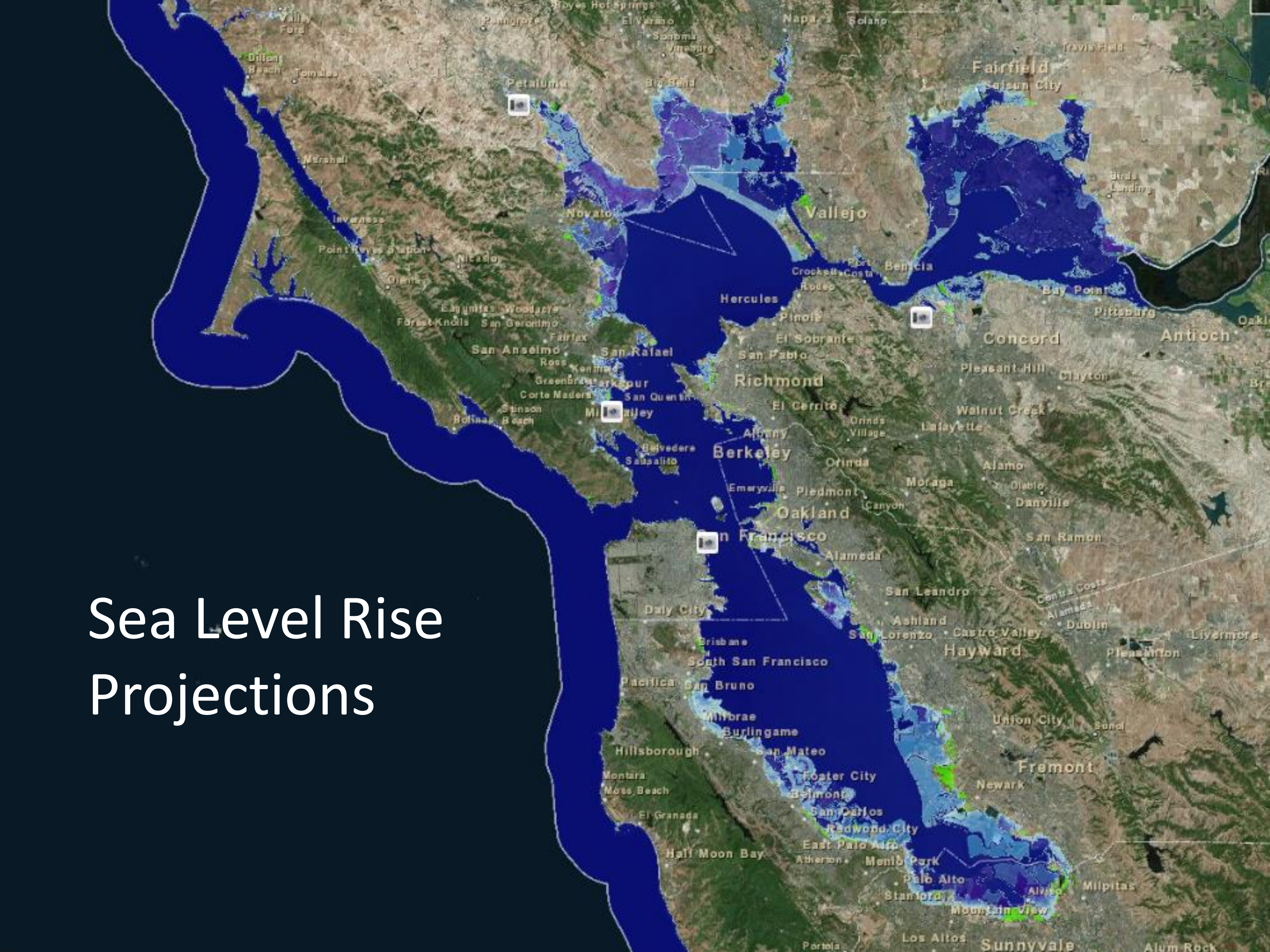
+ Human Population based on 2010 Census

+ Developed Land Cover by NLCD 2011 Category

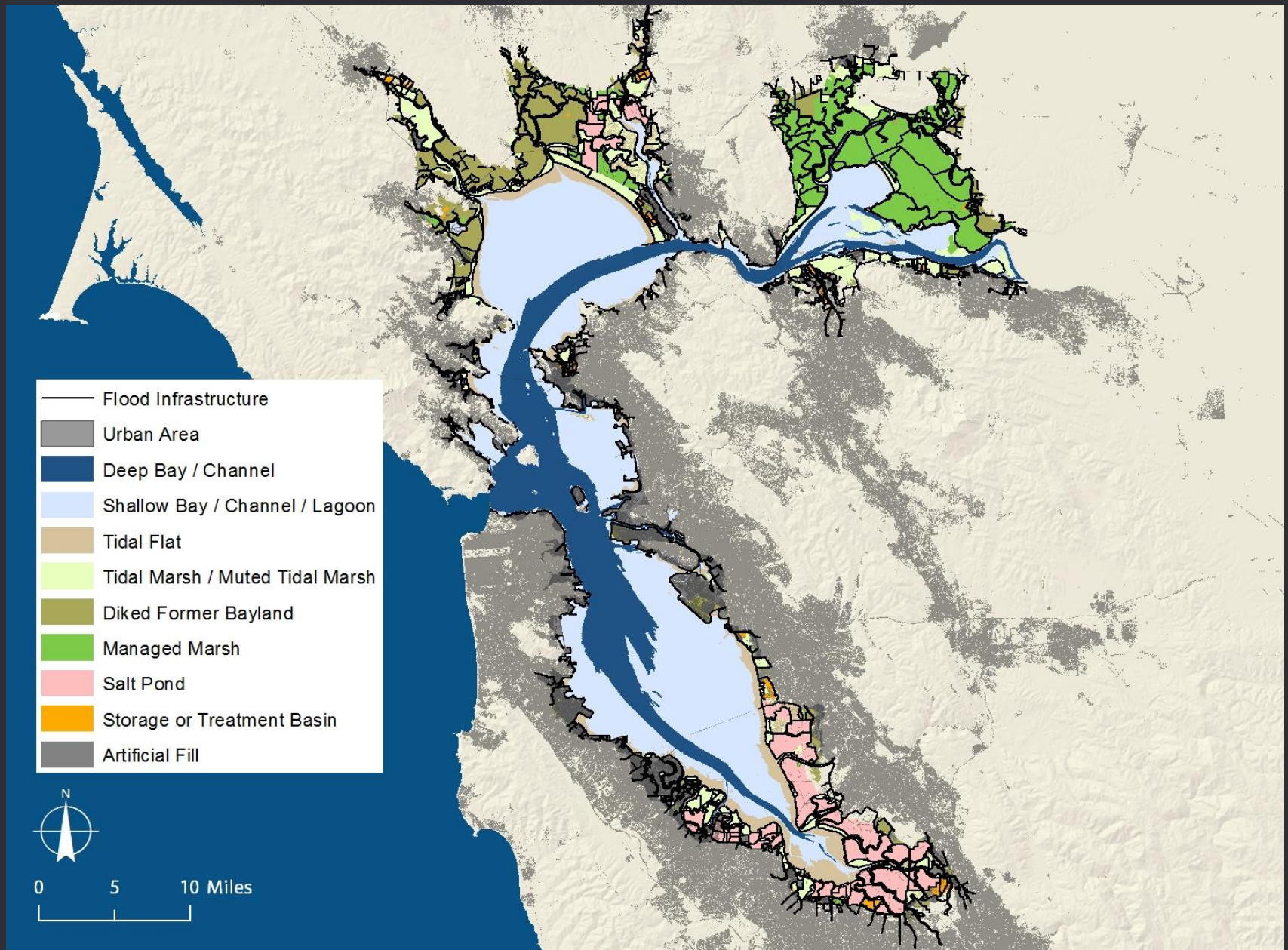
Resilient Silicon Valley


• Drought/Water Supply
• Sea Level Rise
• Sediment Loss
• Extreme Weather
• Increased Flood Risk

Sea Level Rise Projections

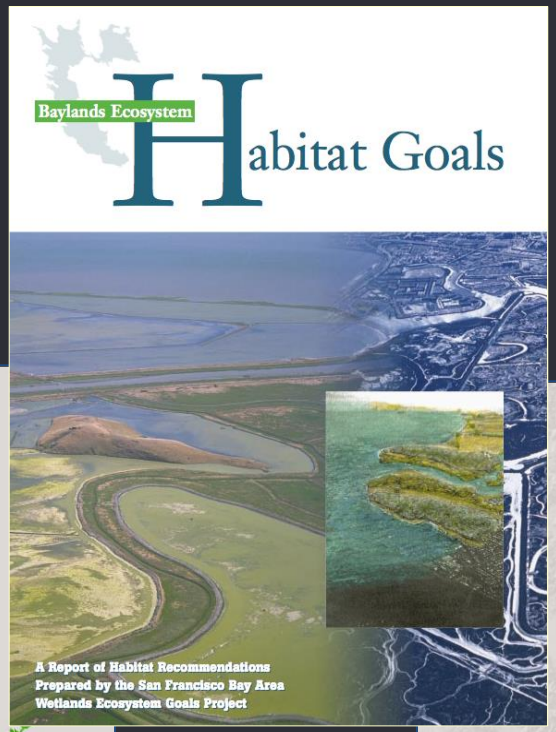


SF Bay – 200 Years of Change

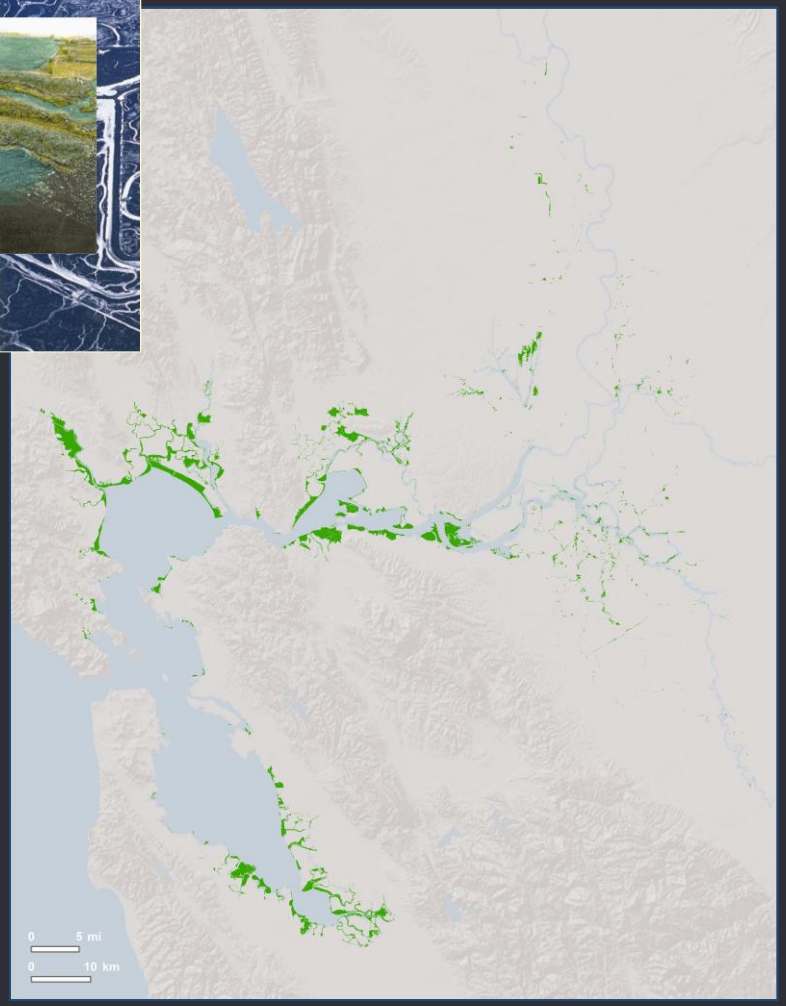



Robert David Paulison
Administrator
Federal Emergency Management Agency

Big Big Plans


Baylands Ecosystem
Habitat Goals
A Report of Habitat Recommendations
Prepared by the San Francisco Bay Area
Wetlands Ecosystem Goals Project


0 5 mi
0 10 km


0 5 mi
0 10 km

RMP 2015

THE PULSE OF THE BAY


STATE OF THE ESTUARY
PROCESSES
HABITAT
WILDLIFE
PEOPLE
WATER
SAN FRANCISCO BAY & DELTA

Baylands Goals Update - 2015

- Sea Level Rise Challenge
- Restore Processes not just Habitat Acreage
- 2030 Deadline for Action
- Restore Complete Systems -Habitats & Processes
- Restore Natural Stream Connections


Cost of Failure

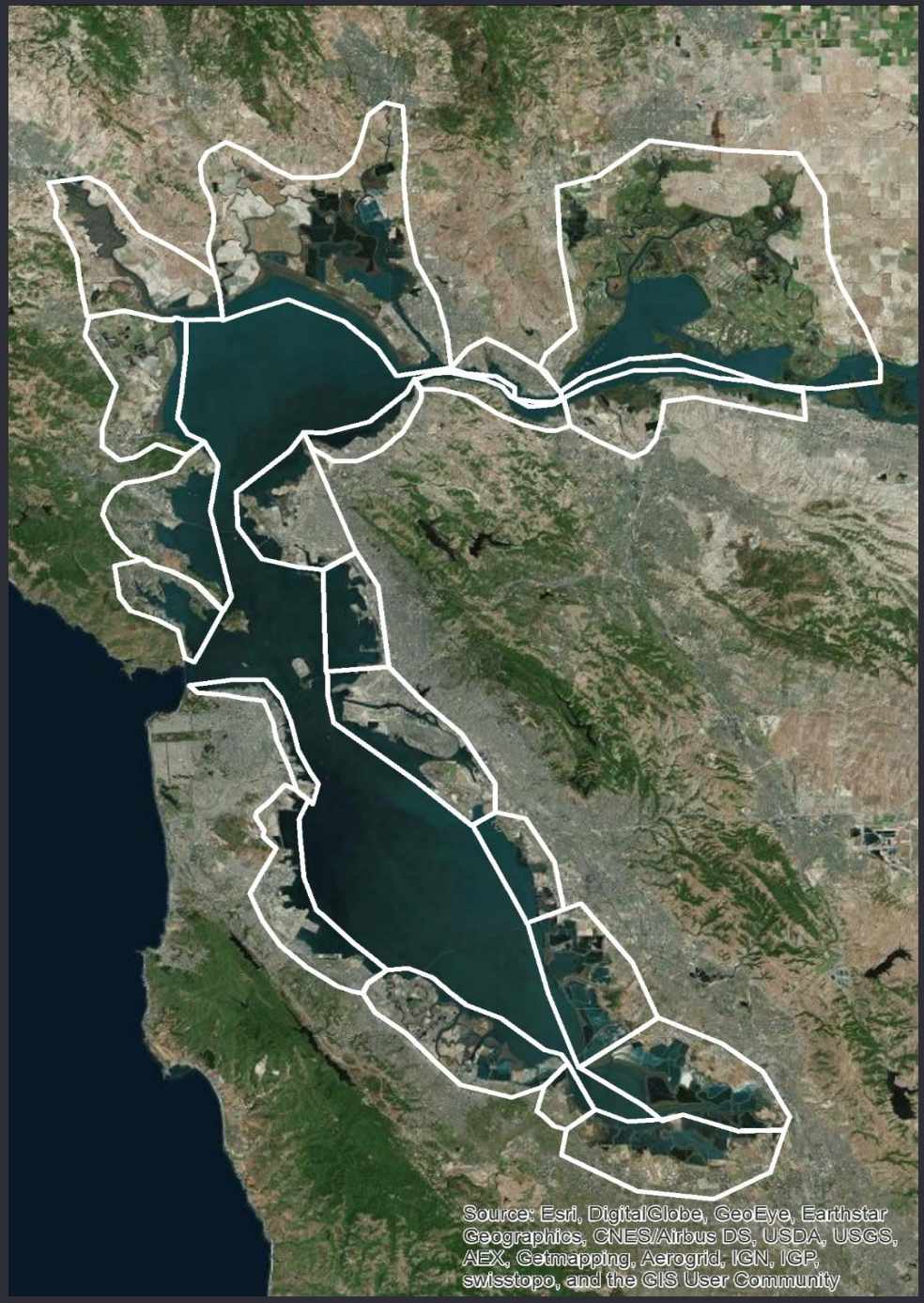

Rethink Water Quality
& Sea Level Rise Policy

Regional and Watershed Permitting

Flood Control 2.0

Meet future flood control needs
AND **restore ecosystem functions**

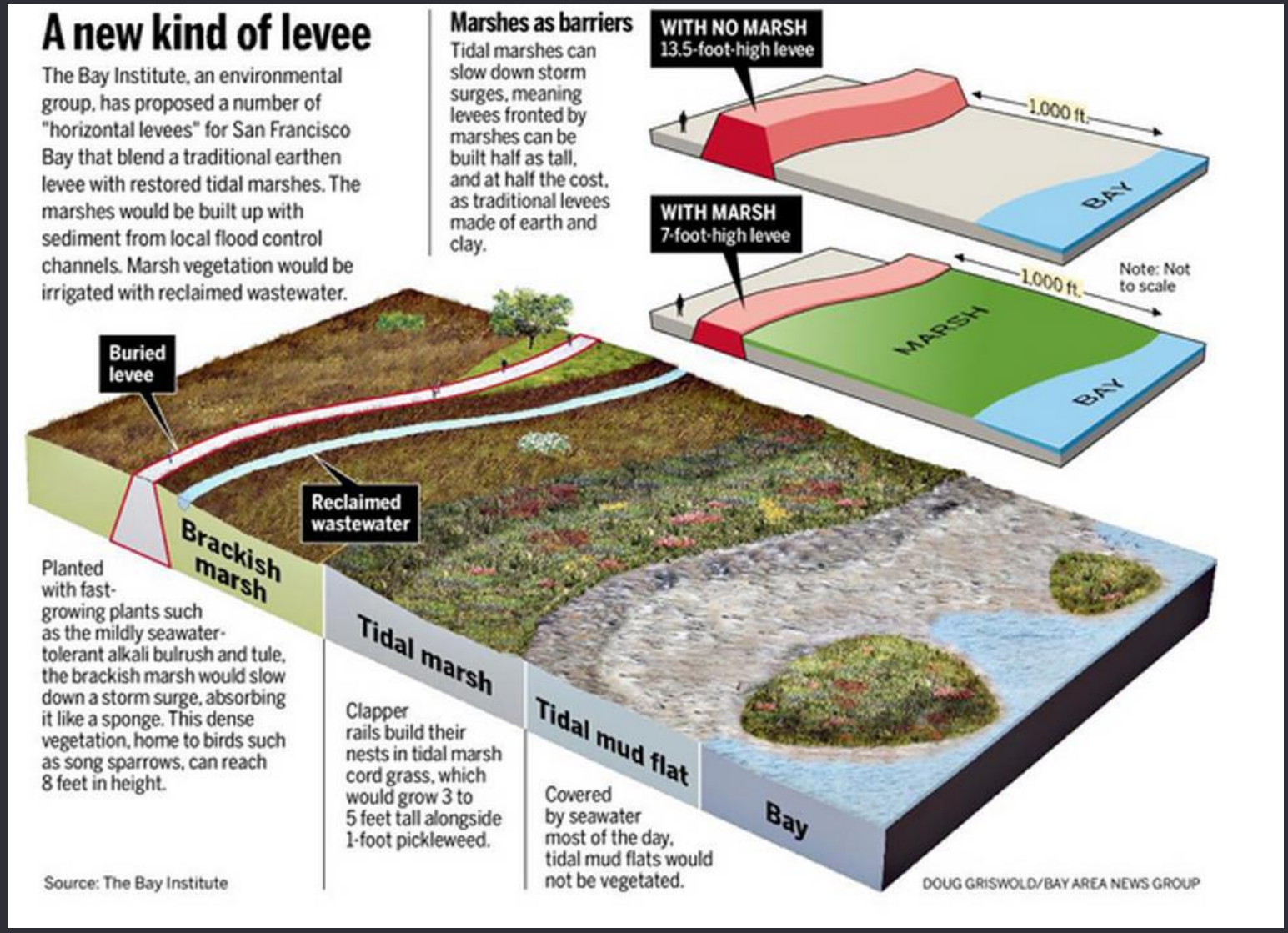
Operational Landscape Units




Sediment Management


PAULA LEE

Dikes and Levee Policy



Wetlands Monitoring

- Sea Level Rise
- 2030 Deadline
- Restore Complete Systems -Habitats & Processes
- Restored Natural Stream Connections


Welcome To
The Future