



NOAA OFFICE FOR COASTAL MANAGEMENT **STRATEGIC PLAN**

2020 to 2025

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National Oceanic and Atmospheric Administration (NOAA)

National Ocean Service

NOAA Office for Coastal Management

coast.noaa.gov

Introduction

Coastal management. The term covers the actions taken to keep the coast's natural environment, built environment, quality of life, and economic prosperity in balance.

The guiding legislation for NOAA's role is the Coastal Zone Management Act and the Coral Reef Conservation Act. NOAA's Office for Coastal Management is the federal agency tasked with implementing these laws.

The issues covered are challenging, and include storm preparedness, erosion, development, habitat loss, sea level rise, public access, and water quality threats.

NOAA provides access to the science and management strategies needed to address these issues and more. The role of NOAA's Office for Coastal Management is demonstrated through the office's four major programs:

- Coral Reef Conservation Program
- Digital Coast
- National Coastal Zone Management Program
- National Estuarine Research Reserve System

This strategic plan is built on the nearly 50-year history of the Coastal Zone Management Act. This innovative, partner-driven legislation continues to provide an important roadmap for addressing the suite of rapidly changing conditions found along the nation's coasts. The plan describes, in broad terms, targeted outcomes and a suite of metrics designed to document results over the next five years.

The Coastal Zone is

- **Popular.** *The coast represents just 10 percent of the nation's land mass but is home to more than 40 percent of the population.*
- **Profitable.** *\$8.3 trillion in goods and services is produced in the coastal region each year. The coast is responsible for 55.8 million jobs.*
- **Vulnerable.** *Storm damages and flooding are on the rise. For example, the cumulative costs of the 16 separate billion-dollar weather events in the U.S. in 2017 was \$306.2 billion. High-tide flooding has increased between 300 and 925 percent since the 1960s.*

Source: NOAA Office for Coastal Management Fast Facts
(coast.noaa.gov)

Vision and Mission

- **Vision:** Coastal communities and ecosystems are resilient and healthy—today and in the future.
- **Mission:** Inspire and influence a broad base of leaders, citizens, and coastal management professionals to ensure healthy coastal ecosystems, resilient coastal communities, and vibrant and sustainable coastal economies.

Operating Principles

- **Partner and User Focused.** We use continual feedback loops to ensure that the programs, products, and services are relevant and help accomplish the desired outcomes.
- **High-Quality Programs, Products, and Services.** We demonstrate excellence in all that we do. We focus on providing timely, science-based results that are fiscally sound and highly valued by coastal communities.
- **Think Nationally, Empower Locally.** We believe in multidisciplinary, multiscale approaches. We work to provide national benefits while meeting specific needs at regional, state, and local levels.
- **Skilled and Engaged Workforce.** We are committed to ensuring that all staff are able to fully contribute to the mission by providing professional growth opportunities and the right equipment and resources. We believe that high-performing staff should be recognized and empowered.

Core Values

- **Collaboration.** *To better understand and manage coastal communities and ecosystems, we depend on partnerships that leverage knowledge, expertise, resources, and abilities.*
- **Innovation and Resourcefulness.** *We value a work environment that embraces the critical thinking and creative approaches that move the organization toward elegant and cost-effective solutions. We are committed to being flexible, nimble, and ready to adapt to changing needs. Staff are empowered to take initiative and foster innovative solutions.*
- **Stewardship.** *We believe we can make a difference and are making a difference. We are collectively committed to safeguarding coastal and marine resources for current and future generations. We share a passion to protect and make our planet a better place to work, live, and play.*
- **Integrity.** *We earn trust by being accountable, using and leveraging resources effectively, and fostering meaningful engagement.*
- **Respect.** *We welcome a diversity of thoughts, opinions, and cultures from within and outside of our office. We appreciate others' approaches, backgrounds, and skills. We recognize that diverse perspectives help bring better service to our partners and constituents and ensure long-term fulfillment of our mission.*

Priority Outcomes

This strategic plan provides a framework for achieving three strategic outcomes:

- Healthy Coastal Ecosystems
- Resilient Coastal Communities
- Vibrant and Sustainable Coastal Economies

HEALTHY COASTAL ECOSYSTEMS

Healthy coastal ecosystems provide many important benefits, including valuable habitat, enhanced water quality, reduced impacts from severe storms and flooding, and economic benefits related to fisheries, recreation, and tourism.

NOAA's Office for Coastal Management collaborates with a range of partners at multiple scales to achieve this goal. Our partner programs and networks, such as the National Estuarine Research Reserve System and the coral reef jurisdictions, serve as platforms for cutting-edge research, community engagement, education, and best management practices.

Sample efforts include coral reef and wetland restoration projects, tools and data designed to increase community knowledge about the effects of various land use practices, and innovative short- and long-term management approaches designed to help communities address climate change impacts.

Strategies

- Facilitate use of the best available science by delivering integrated data, tools, and information to guide decisions about complex ecosystem and coastal management challenges.
- Provide training, guidance, and best practices that help coastal decision makers and coastal management officials understand and apply the science-based tools that inform effective policies and management approaches.
- Support conservation and restoration of coastal habitats and ecosystems.
- Engage and convene meaningful partnerships with federal, state, territorial, and local agencies, as well as nongovernmental organizations and the private sector, to leverage investments and address the scope and scale of coastal ecosystem challenges.
- Provide multiple fellowship opportunities to cultivate emerging leaders in coastal management and provide professional development opportunities for the next generation of coastal management practitioners and environmental stewards.
- Increase and enhance opportunities for the public, students, and teachers to understand and appreciate coastal ecosystems, and motivate community involvement in resource management.

Signs of Success

- Priority coastal ecosystems are protected, restored, and more effectively managed.
- Coastal ecosystems are managed through improved scientific understanding of the extent, condition, and function of coastal and ocean ecosystems and their response to natural and human impacts.
- Water quality and quantity are sustained along the coast through land use practices, enhanced monitoring, and stakeholder involvement and coordination.
- Tools for monitoring, interpreting, and visualizing the health of coastal ecosystems are applied by partners and stakeholders.
- Decision makers have access to and are using integrated environmental, social, and economic information to strengthen policies and inform their decisions.
- Citizens value and take action to protect coastal and ocean ecosystems that in turn support coastal-dependent community economies.

RESILIENT COASTAL COMMUNITIES

Coastal communities are among the most densely populated in the nation and are increasingly at risk from climate change. The NOAA Office for Coastal Management has the technical and collaborative expertise, skills, data, and place-based partnerships needed to help coastal communities address this risk.

The office aligns federal and state coastal mapping and monitoring efforts, especially for shoreline change and social and economic demographics; participates in projects that protect and restore coastal habitats, thereby reducing storm surge and flooding issues; and deploys engineered and nature-based strategies that increase community and ecological resilience.

Strategies

- Provide coastal hazard- and climate change-related data, tools, guidance, training, and technical assistance to people working to enhance community resilience and to communicate risk to the public.
- Increase public awareness of current and future coastal hazard risks and impacts, and of actions undertaken to reduce loss of life, property, and economic opportunity.
- Increase the understanding, application, and cost-benefit estimation of natural and nature-based infrastructure to protect communities.
- Foster engagement and coordination among public- and private-sector partners to leverage resources, as well as to share resilience-related expertise, lessons learned, and best practices.
- Build the capacity of coastal leaders to incorporate resilience in both pre-disaster mitigation and post-disaster recovery, and to engage communities in effective planning or policy development by providing actionable information, skill building, and funding.

- Increase understanding of the equity issues that arise as communities face coastal hazard and climate impacts, and foster inclusion and meaningful assistance for all.
- Support a resilience-based management approach in coastal zone management and place-based programs focused on coral reefs and estuarine systems.

Signs of Success

- Policy and decision makers use improved understanding of the natural and human impacts from coastal hazards and climate change, and of potential resilience and adaptation strategies, to reduce the vulnerability of coastal communities and to seek opportunities for all to succeed.
- Coastal communities are better prepared for coastal storms and hazards through effective management and incorporation of natural infrastructure features.
- Coastal state and community leaders develop and implement policies and make decisions that reduce the chance of injury or loss to the built environment, natural resources, and human communities.
- Coastal-dependent uses, such as ports, are prepared for future coastal hazards and changing environmental conditions.
- Informed citizens take action to reduce their vulnerabilities to hazards and climate change, and support public-sector investments for increased community resilience.
- Coral reefs and estuarine systems are made more resilient to coastal hazards and climate change through effective management.

VIBRANT AND SUSTAINABLE COASTAL ECONOMIES

Coastal and ocean economies are a major engine for the national economy. Included are a wide range of sectors, from energy and security to tourism and recreation. These industries co-exist within a relatively small area, and many depend on healthy coastal ecosystems.

To thrive, these industries require sound information to run their businesses and forecast their future, but these data can be in short supply.

To address this challenge, the NOAA Office for Coastal Management engages and mobilizes federal data providers to provide social and economic data that are easy to obtain and use. This office also provides a platform for understanding the interdependence and desirability of community resilience, economic development, and natural resource protection.

Strategies

- Increase the understanding of the social and economic implications of coastal and ocean management approaches.
- Promote policies and practices that foster transparent, predictable, and efficient government decisions to manage coastal and ocean uses that affect coastal industries and economic development.

- Integrate socioeconomic data and methods with biophysical data to provide actionable information that supports ocean commerce, sustainable infrastructure, energy development, and conservation.
- Provide funding and assistance that enable states and protected areas to support public access and recreation in an environmentally sustainable manner and to prepare for emerging coastal and ocean uses.
- Understand, quantify, and communicate the value of coastal ecosystem services to inform decision-making, including the economic costs and benefits of natural infrastructure.
- Protect economic investments along the coast, including important ecological, cultural, and historical areas, for public enjoyment.
- Coastal communities invest in actions that reduce vulnerability, particularly vulnerabilities related to repetitive natural hazards.

Signs of Success

- Coastal leaders make land- and ocean-use decisions that consider environmental, economic, and social objectives.
- Coastal management professionals foster efficiency and transparency in governance through inclusive public participation and engagement.
- Economic prosperity on the coast is enhanced by the sustainable redevelopment of waterfront communities.
- Decisions are based on a full understanding of the services coastal ecosystems provide.
- Coastal communities receive economic benefits from recreation and tourism tied to healthy coastal ecosystems, protected areas, and preserved cultural resources.

Performance Measures

These measures are being piloted in fiscal years 2020-2021 to ensure that the needed data can be gathered and that the measures are meaningful indicators of organizational goals.

	Healthy Coastal Ecosystems	Resilient Coastal Communities	Vibrant and Sustainable Coastal Economies
Number of products and services provided that advance the use of natural and nature-based infrastructure practices designed to reduce damage to the coast and coastal communities	√	√	
Percent and number of coastal communities accessing products and services or implementing projects to improve understanding of ecosystem and community resilience or their capacity to enhance community resilience	√	√	
Number of acres of habitats protected or restored	√	√	
Number of policies and plans adopted for improved coastal ecosystem and community resilience	√	√	
Number of policies, plans, and activities supporting sustainable waterfront redevelopment to enhance economic prosperity			√
Percent of coastal counties creating or enhancing public access for sustainable recreation and tourism			√
Total number of fellowship opportunities provided	√	√	√
Percent of fellowship students who remain in the coastal resource management field within a year after completing the fellowship	√	√	√
Number of coastal practitioners whose job skills were enhanced through professional training	√	√	√

Supporting Strategic Plans

Each of the four programs within the NOAA Office for Coastal Management developed a strategic plan to define its programmatic vision and further refine organizational outcomes and strategies. Summaries are provided below.

Coral Reef Conservation Program

coralreef.noaa.gov/about/welcome.html

The goal is to reduce threats affecting coral reefs, particularly in U.S. waters, and to restore coral ecosystem functions at an ecological scale. The plan lays out a framework for the coral conservation community and identifies opportunities to leverage expertise and resources across multiple agencies and organizations. The strategic plan contains four main pillars of work:

- Climate: Increase Resilience to Climate Change
- Fisheries: Improve Fisheries Sustainability
- Pollution: Reduce Land-Based Sources
- Restoration: Restore Viable Coral Populations

Each strategy contains short-term (2-5 years) and mid-term (5+ years) objectives. For the near term, the plan guides conservation investments to provide the best available science, tools, and strategies to inform management decisions. Measureable, long-term goals are set for implementation by 2040.

Digital Coast

coast.noaa.gov/data/digitalcoast/pdf/digitalcoast-strategic-plan.pdf

The Digital Coast is an enabling platform for coastal communities, a website focused on providing the data, tools, and training coastal communities need to protect their citizens, infrastructure, and economy from coastal hazards and other threats and challenges. The Digital Coast is managed by NOAA's Office for Coastal Management, with input from the Digital Coast Partnership. The implementation of this strategic plan builds on past successes and will propel the effort to expand its reach and provide increased capacity for coastal communities.

The strategic plan focuses on the following:

- Advancing the Digital Coast Partnership
- Increasing the Availability of Core Coastal Data Sets
- Providing Actionable Decision-Support Resources
- Growing Learning Resources Available via the Digital Coast Academy
- Expanding NOAA and Interagency Collaborations
- Enhancing the Digital Coast Platform

Note: The Digital Coast Partnership represents constituents and includes representation from the following organizations: American Planning Association, Association of State Floodplain Managers,

Coastal States Organization, National Association of Counties, National Estuarine Research Reserve Association, National States Geographic Information Council, The Nature Conservancy, and Urban Land Institute.

National Coastal Zone Management Program

coast.noaa.gov/czm/about

This program embodies the work of coastal states and territories, and NOAA to address today's most pressing coastal issues. The national framework provides federal support and guidance to help the 34 participating states implement comprehensive coastal management programs.

This strategic plan is focused on the following themes:

- Effectively Planning and Preparing for Change
- Coastal Protection, Preservation, and Restoration
- Strengthening Advancement of Coastal Management

Implementation strategies include increasing public access, developing new and innovative partnerships, promoting nature-based infrastructure, integrating social and economic information into coastal management, and informing new policies that lessen risk for coastal communities.

National Estuarine Research Reserve System

coast.noaa.gov/nerrs

Estuaries provide social, economic, and environmental benefits for the entire country. These benefits, however, are dependent on healthy, well-functioning estuarine habitats. Research reserves practice and promote coastal and estuary stewardship through innovative research, education, and training throughout the 29 research reserve sites.

The goals and strategies identified in this strategic plan revolve around the following themes:

- Protecting Places
- Applying Science
- Educating Communities

The strategies are varied and include vulnerability assessments, volunteer and educational programs, additional environmental monitoring capabilities, and increased data sharing and collaboration within the reserves, the scientific community, and coastal communities.