

Science, Service, Stewardship



NOAA's Approach to Conserving Deep-Sea Coral and Sponge Ecosystems

New England Fishery Management Council
Habitat Committee
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NOAA Strategic Plan for Deep-Sea Coral and Sponge Ecosystems

Research, Management, and International Cooperation

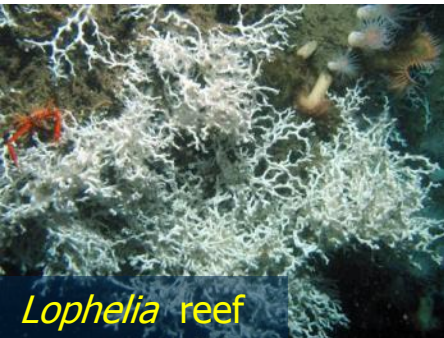


NOAA
FISHERIES
SERVICE



In this presentation

- Overview of NOAA's Strategic Plan for Deep-Sea Coral and Sponge Ecosystems
- Conservation and management objectives related to fisheries:
 1. Protect known areas from bottom-tending fishing gear
 2. Freeze the footprint of mobile bottom-tending fishing gear
 3. Develop additional regional approaches
- Examples from other regions
- Recommended next steps



Lophelia reef



Gorgonian corals



Sponge community



NOAA's Strategic Approach to Deep-Sea Coral and Sponge Ecosystems

NOAA Strategic Plan for Deep-Sea Coral and Sponge Ecosystems

Research, Management, and International Cooperation



Goal:
Improve the understanding, conservation, and management of deep-sea coral and sponge ecosystems

- Exploration and Research
- Conservation and Management
- International Cooperation



NOAA's Strategic Approach to Deep-Sea Coral and Sponge Ecosystems

NOAA Strategic Plan for Deep-Sea Coral and Sponge Ecosystems

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NOAA's DSC Research and Management Activities

Deep Sea Coral
Research and
Technology
Program

Northeast
Fieldwork
2013-15

- EFH and HAPC
- Bycatch reduction
- Deep-sea coral protection zones
- More...



Scope of the Strategic Plan

Timeframe – 2010-2019

NOAA Policy – extensive internal and external review, public consultation, and clearance by Assistant Administrators

Regions – all deep-sea coral and sponge ecosystems under the jurisdiction of the U.S. and cooperation on the high seas

Guides – all NOAA-funded exploration, research, management, and international activities

Integrates – NOAA’s legal mandates and documents

- Magnuson-Stevens Act
- National Marine Sanctuary Act
- U.S. Ocean Policy, etc.

**NOAA Strategic Plan
for Deep-Sea Coral and
Sponge Ecosystems**
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MSA Authorities to Protect Deep-Sea Corals and Sponges

- Designate zones to protect **deep sea corals** from physical damage from fishing gear (MSA § 303(b)(2)) – *Discretionary*
- Minimize bycatch to the extent practicable (National Standard 9; MSA § 301(a)(9)) – *Mandatory*
- Identify and describe EFH and minimize, to the extent practicable, adverse effects caused by fishing (MSA § 305(b)) – *Mandatory*
- Include management measures in FMPs to conserve target and non-target species and habitats (MSA § 303(b)(12)) – *Discretionary*

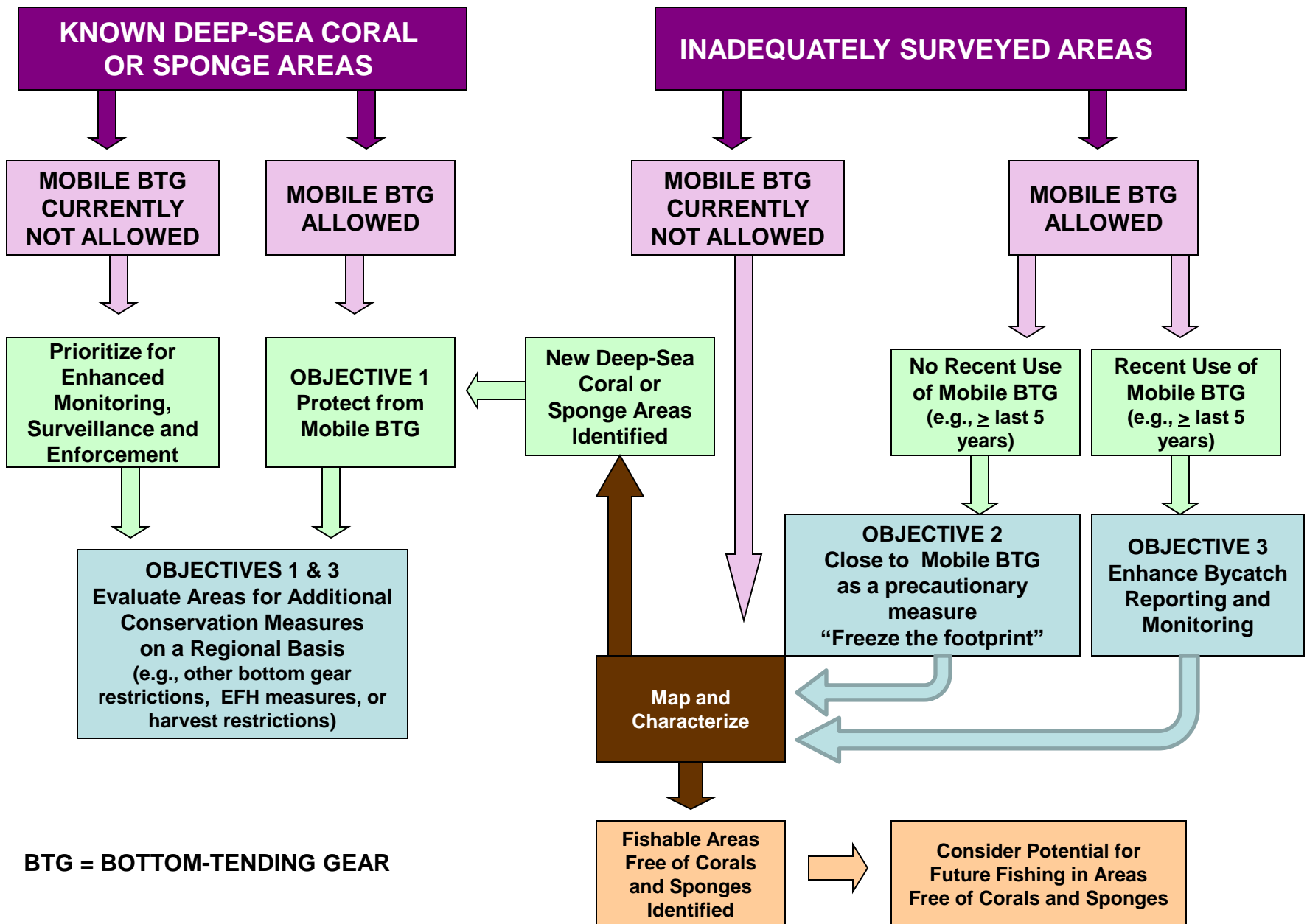




Conservation and Management Objectives

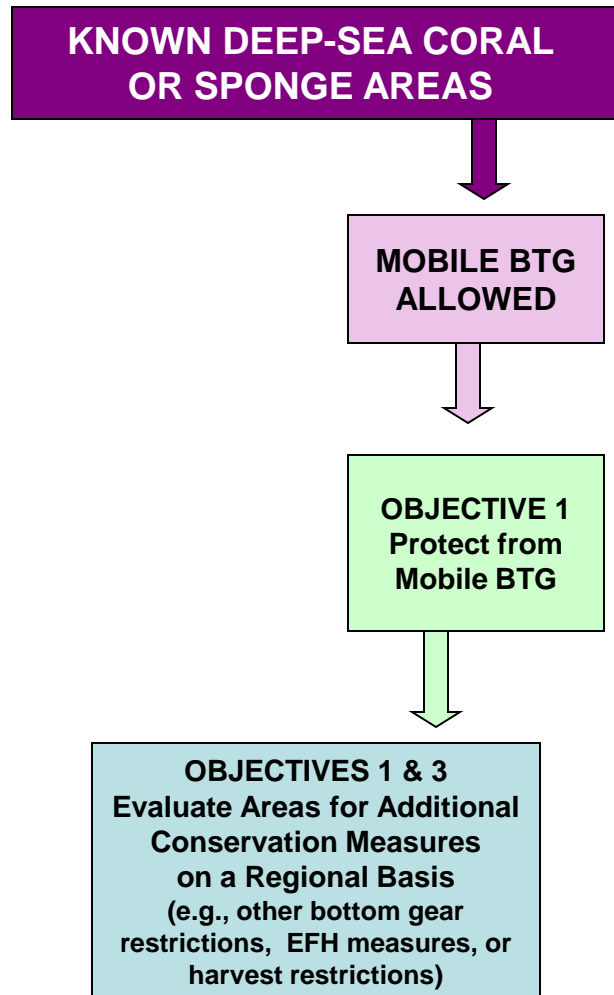
1. Protect areas containing known deep-sea coral or sponge communities from impacts of bottom-tending fishing gear.
2. Protect areas that may support deep-sea coral and sponge communities where mobile bottom-tending fishing gear has not been used recently, as a precautionary measure.
3. Develop regional approaches to further reduce interactions between fishing gear and deep-sea corals and sponges.
4. Enhance conservation in Sanctuaries and Monuments.
5. Assess and encourage avoidance or mitigation of adverse impacts of non-fishing activities on deep-sea coral and sponge ecosystems.
6. Provide outreach and coordinated communications to enhance public understanding of these ecosystems.

Approach to Manage Bottom-Tending Gear (BTG) Impacts



BTG = BOTTOM-TENDING GEAR

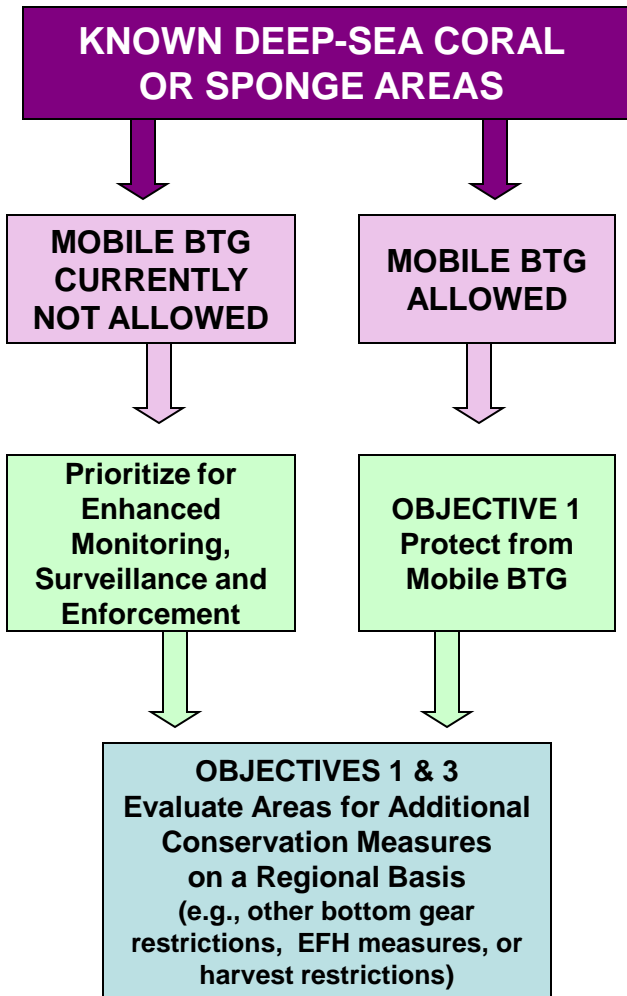
Objective 1. Protect Known Deep-Sea Coral & Sponge Areas



BTG = BOTTOM-TENDING GEAR

- Utilizes best existing information
- As national-level policy emphasizes attention to most damaging gear – trawls and dredges
- Other measures implemented based on regional needs
- Addresses multiple mandates:
 - Discretionary authorities
 - Bycatch reduction
 - EFH conservation (if designated)

Objective 1. Protect Known Deep-Sea Coral & Sponge Areas



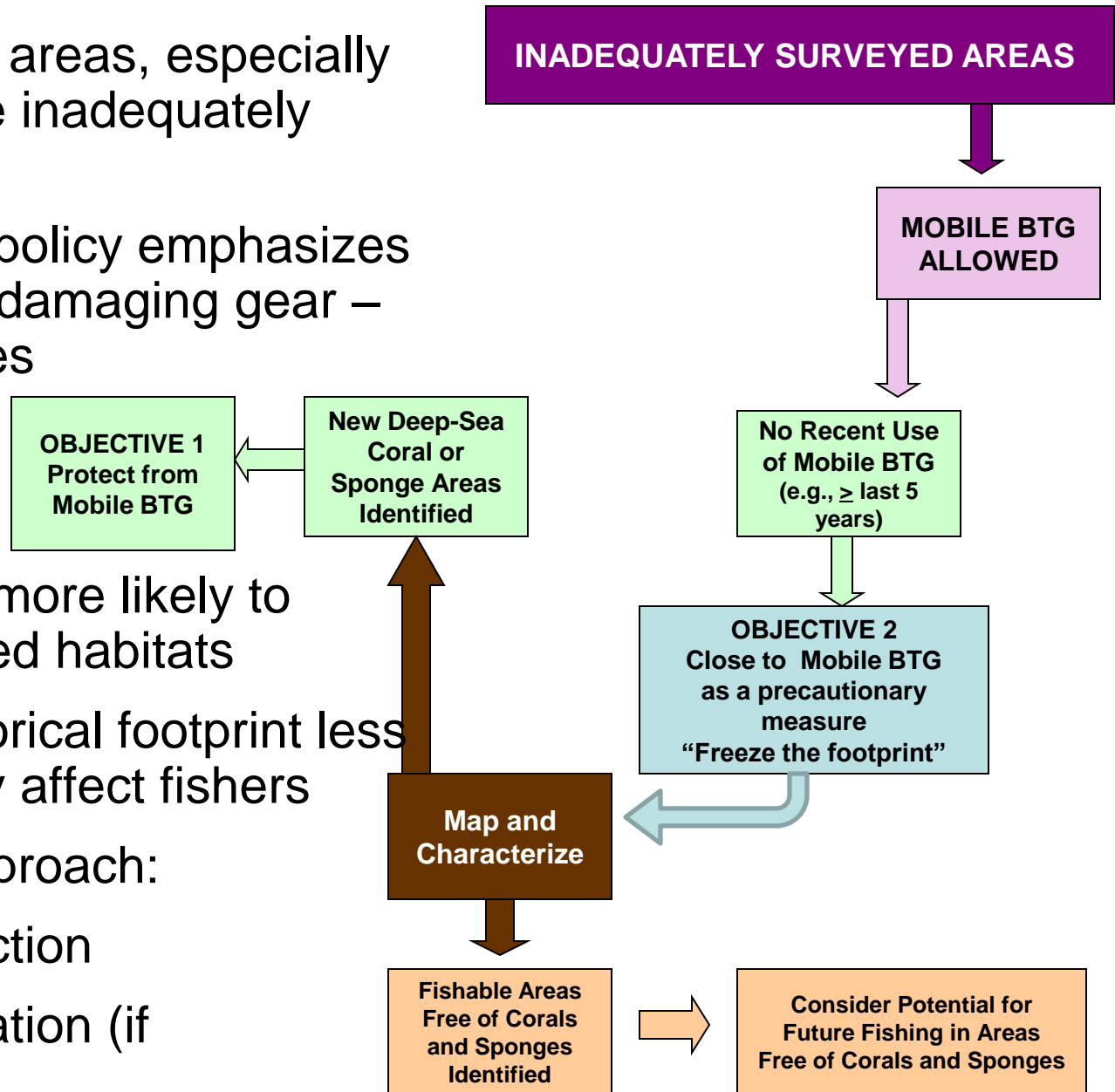
- Other measures implemented based on regional needs

BTG = BOTTOM-TENDING GEAR

Objective 2: “Freeze the Footprint”

- Recognizes most areas, especially deeper areas, are inadequately surveyed
- As national-level policy emphasizes attention to most damaging gear – trawls and dredges

- Untrawled areas more likely to shelter undamaged habitats
- Freezing the historical footprint less likely to adversely affect fishers
- Precautionary approach:
 - Bycatch reduction
 - EFH conservation (if designated)

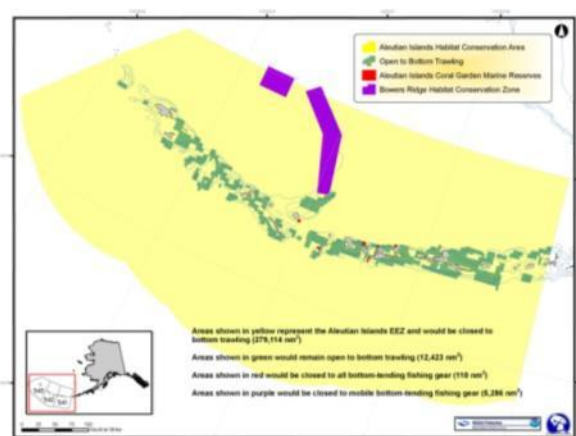


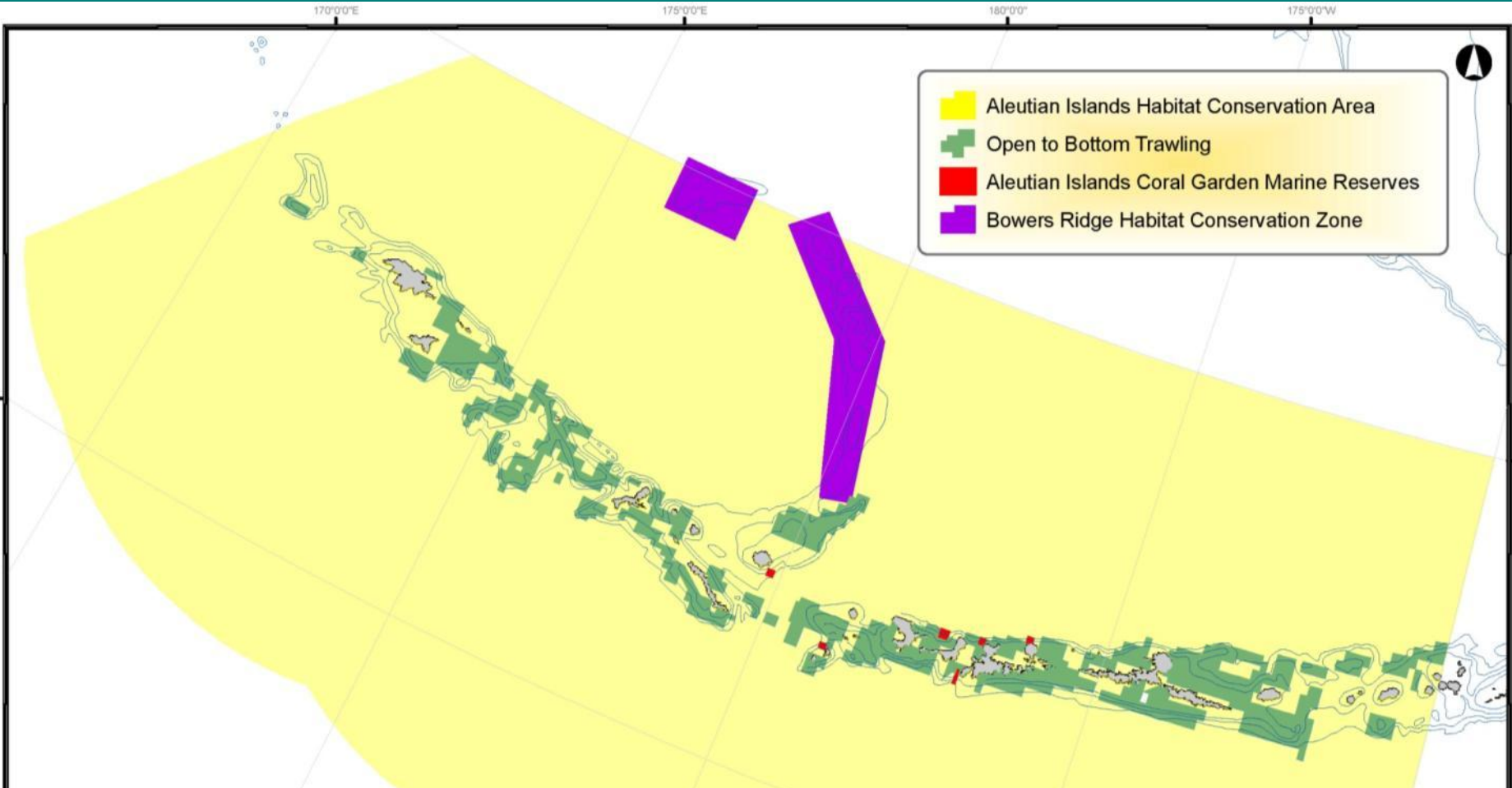


“Freeze the Footprint” of Trawling

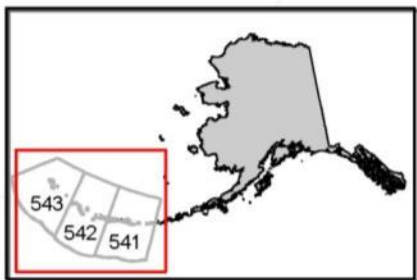
Example: Aleutian Islands Conservation Area

- Addresses most damaging threat
- Precautionary
 - No expansion of bottom trawl fisheries to new areas
- Reflects U.S. policy and best practices internationally and domestically
 - North Pacific Fishery Management Council
 - Pacific Council
 - South Atlantic Council





Aleutian Islands Habitat Conservation Area (957,333 km² closed to bottom trawling)
Green areas remain open for trawling
Red areas closed to all bottom gear



0 25 50 75 100 Nautical Miles






Stakeholder Participation in Aleutian Islands Habitat Protection Design

- NOAA scientists and partners identified “coral gardens” and areas of high coral and sponge bycatch (*Objective 1*)
- Environmental NGOs proposed “freeze the footprint” approach - allowing for open/closed areas based on historic locations of bottom trawl catch (*Objective 2*)
- Fishing industry participants refined areas allowing sustainable fisheries to progress

Final Product

43,557 km² open to bottom trawling
(97% of tows, 98% of catch)
60% fishable depths closed to
bottom trawling

 Open to bottom trawling

0 25 50 75 100
Nautical Miles

All areas not explicitly open are closed to bottom trawling





Conclusions

- Habitat Committee identification of alternatives to define Deep-Sea Coral Zones is in line with the NOAA Strategic Plan (*Objective 1*)
- Not clear if there is an alternative that would “freeze the footprint” of mobile bottom-tending gear (*Objective 2*)
- NMFS is committed to working with the Council as it moves forward
- Upcoming Deep Sea Coral Research and Technology Program opportunities:
 - Regional research priorities workshop
 - Three-year field research effort 2013-15



Further Information

Report to Congress on the Deep Sea Coral Research and Technology Program (2010)

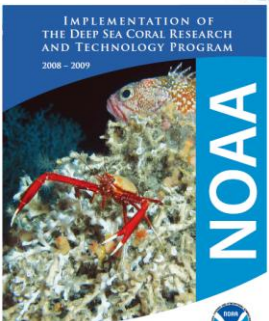
http://www.habitat.noaa.gov/pdf/pub_deep_coral_report_2010.pdf

NOAA Strategic Plan for Deep-Sea Coral and Sponge Ecosystems: Research, Management, and International Cooperation (2010)

http://coris.noaa.gov/activities/deepsea_coral/

The State of Deep Coral Ecosystems of the United States: 2007

http://coris.noaa.gov/activities/deepcoral_rpt/



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**THE STATE OF
DEEP CORAL ECOSYSTEMS OF
THE UNITED STATES: 2007**