

# 8th National Workshop of the Scientific Coordination Subcommittee

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Council Coordination Committee  
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# SCS8 Workshop: Applying ABC Control Rules in a Changing Environment



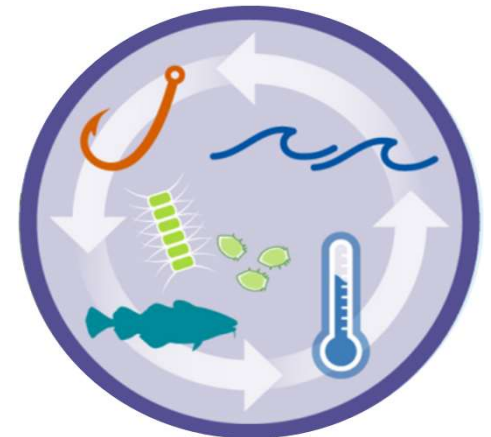
Hosted by New England Fishery Management Council in  
Boston, MA (August 26-28, 2024)

# SCS8 Workshop:

## Applying ABC Control Rules in a Changing Environment

**Goal:** Provide actionable guidance on how to best support Councils in the management of fisheries, specifically the application of ABC control rules, in a changing environment.

**Motivation:** SSCs have been challenged in applying ABC control rules in a manner that reliably achieves management goals given the degree of ecosystem change and scientific uncertainty that Council regions are experiencing.



# Participants

- Representatives from 8 Fishery Management Councils SSC's and staff
- NOAA representatives
- Keynote speakers
- Facilitated by Urban Harbors Institute, UMass Boston





# Meeting Opener

**Janet Coit**

Assistant Administrator  
NOAA Fisheries





# Topics We Covered

- **Context setting:** Current approaches to defining ABC control rules and challenges in their application
- **Sub-Theme I:** Advances in ecosystem science and assessment to inform ABC control rules in a dynamic environment
- **Sub-Theme II:** Application of social science to achieve management goals under dynamic conditions
- **Sub-Theme III:** Adaptation of reference points, control rules, and rebuilding plans to changing environment
- **Closing:** Synthesis, actionable outcomes, next steps



# Context Setting

- Reviewed ABC control rules used across Councils:
  - Tiered control rules are used across most regions, some use of ramped control rules. Empirical approaches (index or catch) used in data-limited scenarios.
  - Some Councils have one (tiered) control rule for all stocks, others are FMP-specific.
  - Recent and ongoing revisions to ABC control rules underway by some Councils.
- Overviewed challenges and successes in applying ABC control rules.





# Challenges with ABC Control Rules

## Challenges

## Recommendations

**Data Limitations**



**Basic research**

- Funding and planning to address data limitations
- More mechanistic studies

**Stock Assessment Performance**



**Analytical advances**

- Integrate climate impacts into assessment and reference points

**ABC Control Rule Performance**



**Performance evaluation**

- Simulation testing (MSE)
- Retrospective analyses

**System Rigidity**

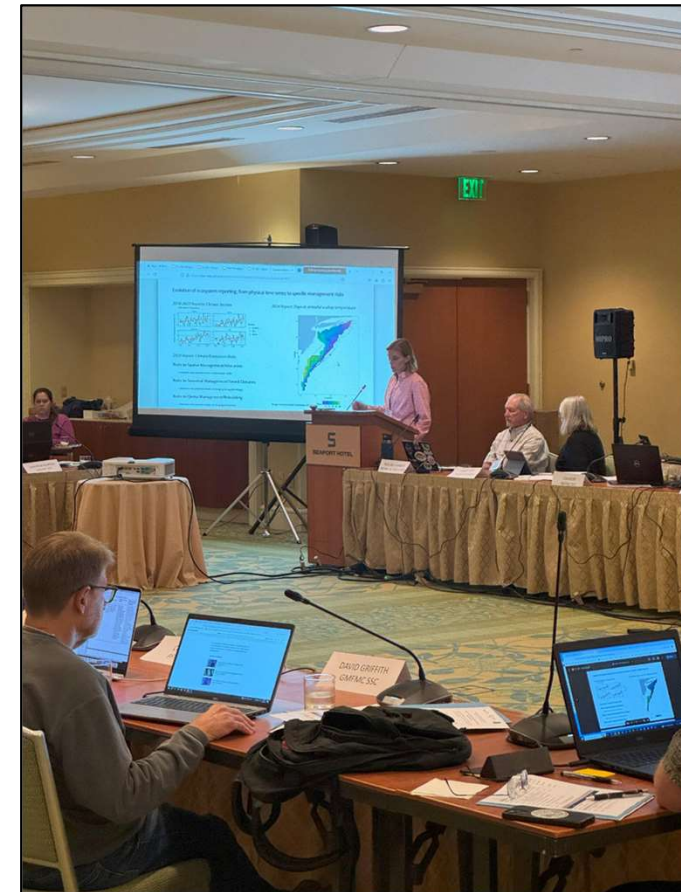


**Proactive actions**

- Regulatory actions required to allow future flexibility (phase-in, carryover)
- Build flexibility into FMPs.

# I. Advances in Ecosystem Science and Assessment

- Initiatives and products
  - Climate, Ecosystem, and Fisheries Initiative
  - Ecosystem Status Reports
  - Ecosystem and Socioeconomic Profiles
  - Fisheries Ecosystem Plans
  - Climate Chapter in SAFE Report
- Modeling platforms that can use ecosystem/climate info (e.g. WHAM, FIMs)
- Use of risk tables to characterizing ecosystem considerations



# I. Advances in Ecosystem Science and Assessment

## Challenges

**Regional Differences**

**Capacity Limitations**

**Ad Hoc Uptake**

## Recommendations

**Consistent Availability**

**Expand Collaborations**

**Strategic Guidance**

- Differences in data/information available by region
- Commitment to making resources available

- Expand data collection and collaboration with partners, integrate local ecological knowledge

- Define opportunities for on-ramping ecosystem information



## II. Use social science expertise and information in decision making

- Variation in the scope/flexibility for SSCs to use socioeconomic data
- Risk Policy and setting ABC by SSCs:
  - ABC setting focused on biological risk, ACL often set very close or equal to ABC, leaving little room for integration of socioeconomic impacts of decision making
  - Risk policies vary widely in integration of social science and economic metrics
  - With empirical assessments or when less quantitative biological data is available, SSCs utilize more socioeconomic information.
  - Risk policy and/or ABC control rules being revised, potentially to include socioeconomic data.
- More use of socioeconomic data in is setting ACL/TAC by Councils (e.g., SEEM process)
- Some SSC involved in reviewing economic models and impacts



## II. Use social science expertise and information in decision making

### Challenges

**Regional Differences**

### Recommendations

**Engage and Formalize Use**

- Respond to public testimony, foster relationships and trust
- Use of LEK, cooperative research, industry input

**Capacity Limitations**

**More Coordination**

- Coordination of focus of available staff resources.
- Define how SSCs can contribute

**Ad hoc Uptake**

**Strategic Guidance**

- Define on-ramps for social science
- Consider alignment of scales of data, timing of science and decision, and roles



### **III. Adapting reference points, control rules, and rebuilding plans to environmental change**

- Examples of performance testing of Council control rules under climate change (e.g., Pacific sardine)
- Examples of integration of climate impacts into assessment (e.g., NCLIM)
- Examples of reference points being adjusted to account for changes in climate and ecosystems are emerging.
- Mechanisms and perceived rate of climate influence on stocks varies across regions.



### III. Adapting reference points, control rules, and rebuilding plans to environmental change

#### Challenges

**Data Limits**



**Application of  
available info**

- Identify information available to understand ecosystem and productivity changes
- Scale goals to information available

**System Rigidity**



**Cross-Council  
Conversations**

- Are current FMPs, risk policies, and Council procedures capable of allowing change?
- If not, what is the path to achieve this?

**Performance of  
BRPs, control rules,  
rebuilding plans**



**Expand on current  
advances**

- Expand on current advances in adaption
- Share best practices, lessons learned





## SCS8 Goal: Provide Actionable Guidance

- Given **very real limitations** in data, capacity, our understanding of ecosystem change and fish and fishery impacts, and funding:
  - How can we do more with what we have right now?
  - What action can we take in our specific regions?
  - Are there national level policy changes that need to be made to enable these actions?

# Development of Council Action Plans

- Plan for how each Council delegation would bring SCS8 recommendations home to continue the dialogue and take action on recommendations.
- **Framing of actions**
  - Audience/Scale
  - Timeline/Priority
  - Process
  - Partners and resources
  - Next Steps...





## Examples of Council-specific Action Items

- Data-poor regions to explore alternative management frameworks and data collection schedules/methods to overcome existing barriers.
- Leverage existing expertise to consider alternative management pathways to integrate socioeconomic data into decision making.
- Build conceptual model of the management process and identify constraints that prevent changes to management in response to climate change.
- Develop working group of managers and scientists to focus on strategic guidance on changing reference points in response to ecosystem change.

# NEFMC Action Items

**Action Item 1:** Develop a working group on reference points that spans management and science and supports goals to redefine reference points in a dynamic environment.

**Audience:** Council, GARFO, and NEFSC

**Timeline:** Short term (1-3 years)

**Scale:** Regional, within New England (or joint with Mid-Atlantic)

**Prioritization:** Urgent (1-2 year)

**Process:** Council priority

**Partners:** Council to develop work group (e.g. SSC members, NEFSC, GARFO, etc.)

**Resources Needed:** Council staff to coordinate, funding for convening

**Next Steps:** Bring to new NEFMC IRA steering committee. Build a NEFMC focused group.





# Follow-up

- Currently drafting SCS8 final report, final expected within 2024.
- SCS8 delegates presenting outcomes and draft region-specific action items to their own SSCs.
- Continued communication
  - Among SSC staff coordinators.
  - Informal webinar of SCS in early 2025 to share progress on action items.
- Some Councils planning for region-specific SSC workshops on this theme.
- Future presentation to CCC on synthesis of meeting outcomes.

# Field Trip: Red's Best



# Acknowledgements

- SCS8 Steering Committee (26 SSC members, Council and NOAA staff)
- Urban Harbors Institute facilitation team: Kim Starbuck (lead facilitator)
- Janet Coit, NOAA Assistant Administrator
- NEFMC Hosts
  - Rick Bellavance, Acting Chair
  - Cate O'Keefe, Executive Director
  - Administrative and technical staff support
- All SCS8 participants
- Funding
  - NOAA Fisheries
  - NEFMC
  - All Regional Councils