



September 27, 2024

Ms. Angel Drobnica, Chair
North Pacific Fishery Management Council
1007 West Third, Suite 400
Anchorage, AK 99501-2252

Mr. John Kurland, Regional Administrator
NOAA Fisheries, Alaska Region
709 West Ninth Street
Juneau, AK 99802-1668

Re: Agenda Item D2 Climate funding: review a) Climate Scenario Workshop Report, b) Climate science and harvest specification adjustments discussion paper/SCS8 report

Dear Ms. Drobnica, Mr. Kurland, and Council members;

The Alaska Marine Conservation Council (AMCC) is dedicated to protecting the long-term health of Alaska's marine ecosystems and the vibrant fishery-dependent communities they sustain. Our members include fishermen, subsistence harvesters, marine scientists, small business owners and diverse fishing families. Our ways of life, livelihoods and local economies depend on the sustainable fishing practices that contribute to healthy ecosystems.

We appreciate the opportunity to provide initial comments and amplify key findings on ideas generated during the Climate Scenario Workshop to advance short- and long-term management approaches to improve climate resiliency of federally managed fisheries in the North Pacific. The structure of the report and accompanying action memo serve as a welcome starting point for further discussion and planning.

AMCC offers the following observations on the following sections of the report:

1. Defining Climate Resilience

While it is clear that there are a variety of interpretations defining climate resilience, in order to build out management plans to support climate resilience, it is important to work toward a common understanding.

From the perspective of AMCC, climate resilience includes attributes related to ecosystems, communities, science and management. A climate resilience definition must include the value of the benthic habitat which supports biodiversity and ecosystem function in a holistic manner. Intact habitat structures support species recovery from climate shocks which are anticipated to



increase under a changing marine environment. Management systems that recognize the role of habitat to support all life cycles, particularly for climate vulnerable species, will increase the resilience of recovering species.

Community resilience includes the ability of people and communities to cope, adapt, and/or transform within their community. It is clear that people residing in coastal communities throughout Alaska want to stay rooted in their communities. Communities are place-based and dependent upon the health and vitality of the marine environment adjacent to coastal and river communities. A definition of resilience must include recognition that these communities must be allowed not only to survive, but to thrive. Management systems that recognize the importance of access to the marine resources adjacent to fishing communities support community resilience.

Science and information attributes are critical to support resilience. In our discussions with fishermen, the ability to review timely and understandable climate data will provide a tool to increase climate resilience with planning. The ability to plan is dependent upon the use of all information sources, including ESRs, ESPs, and risk tables, monitoring and understanding ecosystem changes and vulnerabilities. In addition, Indigenous science and local knowledge and processes to integrate these valuable sources of information are critical to advance resilience planning.

2. Council Process

AMCC appreciates the ideas generated in this section which strive to improve the responsiveness of the Council, make progress toward climate readiness planning, and strengthen Council operations and processes to support public engagement. In a sense, climate change amplifies the need for public engagement, not only in the decision making process but to collaborate, build knowledge, and bring diverse information and perspectives into the process in an equitable manner. Community level values that capture fishing as a way of life beyond economics, reducing waste, sustaining cultural practices, ensuring subsistence food security and supporting the next generation of fishermen all need to be elevated in Council level priorities to increase trust and collaboration.

To address this identified need, measures to diversify Council composition and its advisory bodies can help build out equitable representation on decision making bodies. Underrepresented voices must have a seat at the table, particularly subsistence and Tribal perspectives, to strengthen diverse representation and values in the process. To accomplish this,



the Council should utilize its ability to designate seats and perspectives on advisory bodies and committees.

3. Management measures

AMCC supports the themes of intergenerational access and equity to provide more opportunities for new entrants and upward mobility for individuals, Tribal interests, and communities. While there are different perspectives on barriers to entry, there seems to be general agreement that these barriers exist. It is critical that management processes continually strive to learn from past experiences with access challenges and equity. We see access as a key need in fishing communities to build climate resilience. An intriguing model referenced in the report, Territorial Use Rights for Fishing (TURFs) used in other regions of the world, could serve as a pathway to enable users to access the resources near them.

In terms of management flexibility, the process has advanced with ecosystem and climate-related concerns through risk tables, Ecosystem Status Reports (ESRs) and Ecosystem and Socioeconomic Profiles (ESPs) but there are limited pathways to act on this information. Adaptive management measures that use indicators to inform management outcomes will strengthen climate resilience. An inclusive, transparent process to formalize triggers or “if-then” mechanisms that link this information with a management response would benefit the process. The information should be both trusted and timely and the use of diverse information sources such as on the water observation and traditional knowledge.

Management tools include Ecosystem-based approaches which are inclusive of diverse information, a variety of knowledge systems and recognition of social, economic, and cultural needs and values are well suited to advance climate-ready fisheries management. Closing the loops on the gaps in existing management systems and measures to integrate ecosystems-based fishery management will strengthen the current systems and ideally increase equitable outcomes in the current process.

Ecosystem-based approaches support function and resilience with a holistic approach that is designed to balance a range of uses and user groups, not just target stocks. As the Council strives to advance climate resilience, an ecosystem approach considers humans, community well-being, impacts on other fishing sectors, subsistence, prey availability, habitat impacts and more as part of the ecosystem. Effective ecosystem approaches are inclusive of diverse perspectives, knowledge sources and value systems. The reference in the report to the ‘co-words’ provides examples of equitable methods to build trust and resilience in management



systems. Co-management, co-production, cooperation, and collaboration benefit the overall process.

When management systems consider communities from more of an ecosystem perspective, including their social-cultural interconnectivity, the infrastructure and support services that are vital to fishing communities, a more holistic value can be placed on a decision which is connected to community resilience and wellbeing. A holistic system is able to consider bycatch in terms of community values including respect for the ecosystem, avoiding waste, and maintaining subsistence and cultural practices. In a changing marine environment, bycatch reductions and ongoing recognition of the need to reduce fishing mortality on vulnerable stocks must not be downplayed and used as rationale to avoid addressing bycatch and habitat conservation challenges, management actions the Council can control. Any target species, bycatch, and habitat savings should be viewed as a part of optimal yield and an investment in the future of the ecosystem.

The Council process is slow to respond in a rapidly changing environment and dynamic, in-season or real-time management can help prepare for unknown volatilities which are expected to increase under all scenarios. Management must continue to explore development of dynamic and in-season management strategies and climate-informed spatial management tools to reduce ocean stress and increase effectiveness under shifting conditions. The evolution of fisheries management should have a diverse toolbox with a variety of static and dynamic responses available.

The annual specifications process is somewhat structured as a rapid response to provide pathways for incorporating climate information and risks and implementing a precautionary approach. AMCC believes a precautionary approach inclusive of protecting habitat and other ecosystem based means supports a more proactive management system. The SCS8 discussion paper highlights methods to advance an annual approach by considering the topic of "Applying Acceptable Biological Catch (ABC) Control Rules in a Changing Environment." AMCC is encouraged to see this conversation advance given the regulatory structures which are not designed to respond quickly.

4. External coordination

In terms of fishing industry action, while climate planning and management measures to mitigate climate change impacts in fisheries are important, there is more the industry can do. The fishing industry can and should be leaders in efforts to slow down carbon emissions,



working to communicate the stakes of climate change on our fishing communities and advocate for climate action. This is an area where all user groups can use our collective energy to advocate for changes needed to slow man-made emissions and give the species we depend on a fighting chance to adapt. Working collaboratively, we can and should try to influence policy actions to reduce carbon emissions.

5. Science and information

Timely climate science is critical to support resilience in a rapidly changing marine ecosystem. In a perfect world we would have data which informs how ecosystem dynamics are changing and management methods which could be structured to respond to changing conditions. A comprehensive understanding of how the changes are impacting various stocks could help us understand changes which are climate driven and may trigger management tools in a precautionary manner. Trust in science is key and the process to maintain and bolster climate science is critical. All available information sources are essential to meeting the challenges of climate change. Information is available from a variety of sources which are not used in a consistent manner. There is a wealth of local knowledge, traditional knowledge, and subsistence information, industry knowledge, and on-the-water observations which lack adequate onramps into the Council process. While the methods to integrate these valuable knowledge systems are challenging; collaboration, cooperative research, and co-production of knowledge are critical given the ongoing need for more information in a rapidly changing environment.

Thank you for considering our initial comments on a rich and inspiring workshop. We look forward to continued discussion to advance critical needs in a changing marine environment.

Respectfully,

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