ADVISORY PANEL
Motions and Rationale
June 7-10, 2022 - Sitka, AK

C3 BSAI Crab

Motion 1

The Advisory Panel reviewed the CPT report and recommends the Council adopt the updated AIGKC SAFE report, as well as approve the 2022-23 AIGKC OFLs and ABCs as recommended by the CPT and SSC.

Motion passed 17-0

Rationale:

- *The AP appreciates the effort and work-product provided by the CPT and SSC as well as the effort by industry to assist with the AIGKC survey.*

Motion 2

The Advisory Panel recommends the Council adopt the following purpose and range of alternatives for rebuilding Bering Sea snow crab.

Purpose & Need

The Bering Sea snow crab (BSS) stock was declared overfished in October 2021, because the estimated spawning biomass was below the minimum stock size threshold specified in the crab FMP. To comply with provisions of the Magnuson-Sevens Act (MSA), a rebuilding plan must be implemented prior to the start of the 2023/2024 fishing season. In addition, the MSA at Section 304(e) provides several considerations to balance while rebuilding a stock as quickly as possible. Those considerations inform the following goals for the Bering Sea snow crab rebuilding plan: (1) to minimize the adverse social and economic impacts associated with rebuilding, including adverse impacts on fishermen and fishing communities, (2) to equitably distribute both the conservation burdens and recovery benefits among fishing sectors, and (3) to protect the quantity and quality of crab and crab habitat necessary to support the stock at healthy levels in the future. This action is necessary to facilitate compliance with the requirements of the MSA to end and prevent overfishing, rebuild overfished stocks, and achieve optimum yield and to be consistent with NOAA's National Catch Share policy for rationalized fisheries which are intended to "*help rebuild fisheries and sustain fishermen, communities and vibrant working waterfronts*."

> ***Alternatives –*** Action alternatives must set target rebuilding time frame for the number of years necessary to rebuild the stock to the BMSY level at a probability ≥50%. The stock will be considered "rebuilt" once it reaches BMSY.

Alternative 1: No action; State harvest strategy with no rebuilding plan (same as listed in Council analysis p.29)

Alternative 2: Rebuilding thresholds (Tmin, Tmax, Ttarget) set using an optimistic scenario for natural mortality where Tmin is less than or equal to 10 years.

Option A: (as fast as possible) No snow crab removals at all (F=0).

Option B: (dynamic) Allow the directed snow crab fishery to open based on a revised state harvest strategy to reduce discards and/or with a reduced fishing rate while the stock is rebuilding. Implement bycatch reductions and habitat protections.

~~(1)~~(i) Create a dynamic closed area to protect core areas of abundance

ii) Revise closed area around Pribilof Islands to protect crab and crab habitat

iii) Remove PSC floor & count bycatch throughout the stocks range towards PSC

Option C: (fishing emphasis) Allow the directed snow crab fishery to open based on the current state harvest strategy while the stock is rebuilding. No changes to bycatch measures or habitat protections.

Alternative 3: Rebuilding thresholds (Tmin, Tmax, Ttarget) set using a pessimistic scenario for natural mortality where Tmin is greater than 10 years.

Option A: (as fast as possible) No snow crab removals at all (F=0).

Option B: (dynamic) Allow the directed snow crab fishery to open based on a revised state harvest strategy to reduce discards and/or with a reduced fishing rate while the stock is rebuilding. Implement bycatch reductions and habitat protections.

~~(1)~~i) Create a dynamic closed area to protect core areas of abundance

ii) Revise closed area around Pribilof Islands to protect crab and crab habitat

iii) Remove PSC floor & count bycatch throughout the stocks range towards PSC

Option C: (fishing emphasis) Allow the directed snow crab fishery to open based on the current state harvest strategy while the stock is rebuilding. No changes to bycatch measures or habitat protections.

Amendment 1 to strike option B sub i from Alternative 2 & 3 failed 6-11.

Voluntary Measures

The AP requests that each Bering Sea sector with crab mortality (directed crab fishery, Pacific cod sectors, AFA pollock, and A80) present the following to the Council in October 2022 along with reports on Bristol Bay red king crab and thereafter in the annual cooperative reports:

- voluntary measures for implementation in 2023 and beyond to avoid BSS and reduce crab mortality in the non-directed fisheries.
- measures in the directed crab fishery to reduce discard mortality of BSS.
- description of research that would inform development of more flexible and effective spatial management measures; gear modifications to reduce impacts on the BSS stock, or to evaluate unobserved mortality in the trawl sector.

Main Motion passed 14- 3

Rationale in Opposition to Amendment 1

- *In order to successfully rebuild the BSS crab stock and support the directed crab fleet, the rebuilding analysis needs to include as wide a range of Alternatives/Options as possible. A broader range for analysis will help ensure that the Council has the ability to meet the goals of the Purpose and Need Statement for this action.*
- *Dynamic closures should be considered a critical component for the most comprehensive rebuilding plan possible and their potential complexity should not be a reason to exclude them at this time. It is anticipated that the rebuilding analysis will highlight the lack of data and/or data limitations to accomplish this measure, which is important information to have going forward.*

Rationale in Favor of Amendment 1

- *The inclusion of an option related to the establishment of dynamic closures will add a significant amount of complexity to the rebuilding analysis and its implementation timeline, which is established by the MSA. Some of these complexities include: 1) identifying, evaluating the appropriateness (e.g., summer survey data vs. fishery dependent data), and compiling the data that exists to inform where, when, and size of closure areas; 2) impacts of closure areas on other PSC species; and 3) economic impacts to all fisheries that operate in the closure areas.*
- *Analysis of dynamic closure areas for crab is more appropriate as a stand alone action separate from Council action on the development of a rebuilding plan.*

Rationale in Favor of Main Motion

- *The unprecedented collapse of the BSS stock and fishery requires implementation of the most robust rebuilding plan possible and should include drastic measures given the extreme nature of the crisis being faced. Regardless of complexity, this action warrants significant Council time, dedication, and priority. This motion is directly responsive to public comment as well to the recommendations made by PNCIAC. It is intended to establish a meaningful rebuilding plan that complies with the MSA to rebuild as quickly as possible taking into account the needs of fishing communities while also providing options to rebuild the stock faster through bycatch control measures and habitat protections.*
- *The recommended Purpose and Need statement reflects the requirements of the MSA to develop a rebuilding plan for overfished stocks within two years, as well as requirements to rebuild as quickly as possible while taking into account the needs of fishing communities, sharing the burden of conservation, and providing additional protections for the stock to build a meaningful, robust rebuilding plan.*
- *The SSC is recommending a new snow crab stock assessment model (GMacs) that will help the Council frame rebuilding timeframes and develop a range of alternatives to analyze for. This motion is consistent with recommendations from the SSC to evaluate not only optimistic but*

also more pessimistic scenarios for natural mortality in the stock assessment given uncertainty and the expectation that climate change may bring more frequent mortality events. Additionally, it is anticipated that in September/October 2022 more detailed information regarding the potential impacts of BSS crab bycatch on rebuilding will be available from the assessment author and CPT. With this information, the Council has the ability to modify the rebuilding alternatives as deemed appropriate at that time.

- *The recommended action Alternatives differ in the levels of natural mortality assumed in the new GMACS stock assessment model for snow crab. The options under Alternative 2 (optimistic natural mortality scenario) and Alternative 3 (pessimistic scenario) are the same between the two alternatives but represent a range from:*
    - *zero fishing mortality (F=0) in Option A,*
    - *a middle option with more dynamic management and restrictions on the directed fishery and bycatch, with habitat protections in Option B, and*
    - *an option with no limits on fishing beyond the state harvest strategy and no changes to bycatch measures in Option C.*
- *Finally, this motion asks for voluntary measures by all sectors that interact with snow crab to come back in October and report on actions they are taking to reduce their impacts on the stock, alongside reports for Bristol Bay red king crab as requested by the Council during their April 2022. Voluntary measures are the fastest way to make changes and take pressure off this overfished stock while the rebuilding plan is under development.*

<u>*Rationale in Opposition to Main Motion*</u>

- *A rebuilding analysis for BSS is mandated under the requirements of the MSA; however, the inclusion of an option related to dynamic closures will most likely result in the rebuilding analysis imploding from the weight of the complexity (previous crab-related analysis initiated by the Council have experienced this and required the Council to essentially "start over"). Additionally, the inclusion of voluntary measures for analysis does not fit in with the overall analytical package (difficult to analyze voluntary measures and their effects on rebuilding) and would be more appropriately considered as a supplemental report to the rebuilding analysis.*