C4 Chum Salmon Bycatch

Motion 1:

The AP supports the current Purpose and Need, the full range of alternatives in the Chum Salmon Bycatch Preliminary Review and recommends the document move forward for Initial Review.

*The purpose and need and list of alternatives are unchanged from April 2023.

[1] Salmon are an important fishery resource throughout Alaska, and chum salmon that rear in the Bering Sea support subsistence, commercial, sport, and recreational fisheries throughout Western and Interior Alaska. Western and Interior Alaska salmon stocks are undergoing extreme crises and collapses, with long-running stock problems and consecutive years’ failures to achieve escapement goals, U.S.-Canada fish passage treaty requirements, and subsistence harvest needs in the Yukon, Kuskokwim, and Norton Sound regions. These multi-salmon species declines have created adverse impacts to culture and food security and have resulted in reduced access to traditional foods and commercial salmon fisheries.

The best available science suggests that ecosystem and climate changes are the leading causes of recent chum salmon run failures; however, non-Chinook (primarily chum) salmon are taken in the Eastern Bering Sea pollock trawl fishery which reduces the amount of salmon that return to Western and Interior Alaska rivers and subsistence fisheries. It is important to acknowledge and understand all sources of chum mortality and the cumulative impact of various fishing activities. In light of the critical importance of chum salmon to Western Alaska communities and ecosystems, the Council is considering additional measures to further minimize Western Alaskan chum bycatch in the pollock fishery.

The purpose of this proposed action is to develop actions to minimize bycatch of Western Alaska origin chum salmon in the Eastern Bering Sea pollock fishery consistent with the Magnuson-Stevens Act, National Standards, and other applicable law. Consistent, annual genetics stock composition information indicates that the majority of non-Chinook bycatch in the pollock fishery is of Russian/Asian hatchery origin; therefore, alternatives should structure non-Chinook bycatch management measures around improving performance in avoiding Western Alaska chum salmon specifically.

The Council intends to consider establishing additional regulatory non-Chinook bycatch management measures that reduce Western Alaska chum bycatch; provide additional opportunities for the pollock trawl fleet to improve performance in avoiding non-Chinook salmon while maintaining the priority of the objectives of the Amendment 91 and Amendment 110 Chinook salmon bycatch avoidance program; meet and balance the requirements of the Magnuson-Stevens Act, particularly to minimize
salmon bycatch to the extent practicable under National Standard 9; include the best scientific information available including Local Knowledge and Traditional Knowledge as required by National Standard 2; take into account the importance of fishery resources to fishing communities including those that are dependent on Bering Sea pollock and subsistence salmon fisheries as required under National Standard 8; and to achieve optimum yield in the BSAI groundfish fisheries on a continuing basis, in the groundfish fisheries as required under National Standard 1.

**Alternative 1: Status Quo**

All action alternatives apply to the entire Bering Sea pollock B season, the season in which chum salmon are taken as bycatch (prohibited species catch or PSC).

**Alternative 2: Overall bycatch (PSC) limit for chum salmon**

Option 1: Chum salmon PSC limit based on historical total bycatch numbers.

[2] **Option 1:** PSC limit: Establish an overall PSC limit of:

- Sub option A: 0
- Sub option B: 22,000
- Sub option C: 280,000

PSC limits are apportioned among CDQ, catcher processor, mothership and inshore sectors based on historical total bycatch by sector. The inshore limit is further apportioned among the inshore cooperatives. The CDQ limit is further apportioned among the CDQ groups. Reaching a limit closes the pollock fishery to which the limit applies.

Option 2: Weighted, step-down PSC limit triggered by a three-river chum index (Kwiniuk (or index developed for Norton Sound area), Yukon, Kuskokwim) that is linked to prior years’ chum abundance/ANS/escapement and weighted to account for variance in stock sizes across river systems.

[2] **Option 2:** PSC limit linked to in-river indices: Establish a PSC limit range from 0 to 280,000 that is linked to multi-region in-river indices using prior year chum abundance and/or ANS and/or escapement goals inclusive of the Norton Sound, Yukon, and Kuskokwim regions.

PSC limits would be triggered and in effect when one or more Western Alaska chum index areas fails to meet index thresholds. As more areas fail to meet index thresholds, chum PSC limits would step-down and become more restrictive. PSC limits are apportioned among CDQ, catcher processor, mothership and inshore sectors. The inshore limit is further apportioned among the inshore cooperatives. The CDQ limit is further apportioned among the CDQ groups. Reaching a limit closes the pollock fishery to which the limit applies.
Alternative 3: Bycatch (PSC) limit for Western Alaska chum salmon

Option 1: Western Alaska chum salmon PSC limit based on historical total bycatch numbers.

PSC limits are apportioned among CDQ, catcher processor, mothership and inshore sectors based on historical total bycatch by sector. The inshore limit is further apportioned among the inshore cooperatives. The CDQ limit is further apportioned among the CDQ groups. Reaching a limit closes the pollock fishery to which the limit applies.

Option 2: Weighted, step-down Western Alaska chum PSC limit triggered by a three-river chum index (Kwiniuk (or index developed for Norton Sound area), Yukon, Kuskokwim) that is linked to prior years’ chum abundance/ANS/escapement and weighted to account for variance in stock sizes across river systems.

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Alternative 4: Additional regulatory requirements for Incentive Plan Agreements (IPAs) to be managed by either NMFS or within the IPAs

Option 1: Require a chum salmon reduction plan agreement to prioritize avoidance in genetic cluster areas 1 and 2 for a specified amount of time based on two triggers being met: 1) an established chum salmon incidental catch rate and 2) historical genetic composition (proportion) of Western Alaska chum salmon to non-Western Alaska chum salmon.

Option 2: Additional regulatory provisions requiring Incentive Plan Agreements to utilize the most refined genetics information available to further prioritize avoidance of areas and times of highest proportion of Western Alaska and Upper/Middle Yukon chum stocks.

As part of the Initial Review analysis, the AP recommends the following suggestions, which are intended to be responsive to some of the decision points before the Council as summarized in Table ES 6 of the Preliminary Review.

1. Move the analysis of temperature data to Alternative 4 rather than linking it to a management measure in Alternative 2.

2. Rely on the SSC’s recommendations for scientific responses on the inclusion of data for the potential 3-Area Index.

3. Focus on industry developed IPAs, in consultation with the Council, as the responsible management entity of measures implemented under a chum salmon Reduction Plan Agreement (RPA).
4. Have the IPAs evaluate the efficacy of potential regulatory indicators and determine trigger values. This would include supporting industry consultation with Council staff to submit a detailed proposal for analysis prior to the Initial Review for incorporation into that analysis. The following is a list of potential regulatory indicators that could be evaluated for inclusion in the industry’s IPA proposal.

    a. Temperature data
    b. Adjusted bycatch rates
    c. Adjusted base rates
    d. Adjusted closure area size
    e. Adjusted closure duration
    f. Genetic Data
    g. Genetic cluster thresholds

5. The triggers referenced in Alternative 4 could be included in the proposal, but should be assessed for Cluster 1, Cluster 2, and the combination.

The AP also recommends the following additions be included in the analysis.

    • Impact analysis of proposed management measures on the WAK Chum stock.

        * [5] Information on bycatch and intercept fisheries & ocean conditions leading up to the year 2000 and record low runs.
        * [5] Information on the declines on stocks across Canada, Japan, Russia, Korea and Pacific Northwest.

    • Tradeoffs with:

        * Chinook PSC
        * Herring PSC
        * Other bycatch
        * Current spatial and temporal closures
        * [4] Crab PSC

    • Sector and Vessel level impacts including, but not limited to:

        * Ability to prosecute the pollock fishery to the annual allocation.
        * Fishing behavior
        * Fuel consumption and additional costs

    • Consider sustainable ADF&G data that is protected from funding shortfalls (in order to ensure continued reliability of data) and have a contingency plan in place for unavailable data sources.

    • Refined genetic clusters that reflect the pollock fishing grounds more accurately.
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- Analysis should expand on CDQ participation in the pollock fishery and any actions’ effects on the 65 Western Alaska CDQ villages.

- [3] Socioeconomic impacts of each alternative to all communities affected by coastal communities, Western Alaska the chum declines, and the State of Alaska.

Main motion as amended: Passed 14-3

Rationale in Favor of Main Motion:

- The AP noted broad support for including Alternatives 2 and 3 for analysis, but aside from the options proposed in Amendment 2, the AP did not come to a resolution that resulted in recommendations for analysis.
- All Alternatives should be considered in an analysis. Even a Chum PSC cap should be analyzed and include a reasonable range of alternatives to assess the negative and positive effects on all user groups affected. If a large number for a cap is included in the analysis it has the potential to reveal that flexibility given to the fleet to manage chum PSC is beneficial and could result in more chum saved than a constraining cap would, while also allowing the fishery to be fully prosecuted.
- Ocean temperature is one way to gauge the effects of climate change. It is also easily available data and could be a good indicator of what fishing conditions to expect in the ocean for a fishing season. While this is important, the linkage is uncertain and it should be best analyzed as an indicator rather than linked with a management measure. The IPAs are responsive and likely able to use ocean temperature in combination with other time and area indicators.
- The 3-Area Index should be included in the Analysis, but the SSC should have weighted input on whether the data supporting the index would be reliable, as well as which data to utilize.
- The Preliminary Review document on page 84 "...doesn't recommend ANS or escapement goals be used in isolation because ANS and escapement goals may sometimes be influenced by factors other than chum salmon analysis in a given year or area..." This is why there should be an additional review of the ADF&G data for assurance that it is sustainable and reliable over a forward-looking timespan. Two major concerns are counts delayed by weather or abandonment of counts, and reliable funding of the programs that operate the counts on the rivers to be included.
- If a set of rivers are selected to inform a 3 Area Index, and that index linked with a management measure, ADF&G and/or the Council should consider a contingency plan for ensuring data availability.
- The AP considered it important to note that neither the Council, Agency, nor Fishery can guarantee that the chum saved in the Bering Sea will help returns to the rivers of origin.
- The pollock industry relies on the use of IPAs, with NMFS and Council oversight, to implement responsive, timely, and spatially explicit salmon avoidance measures. Further discussion of the IPAs, with additional analysis described in the motion, should give more clarity on possibilities for successful avoidance of Western Alaska chum salmon.
- There are many factors that already go into managing IPAs, and decisions on when and where to implement a RHS closure. These factors could be enhanced with new or improved data. The IPAs
are able to make unique and responsive closures in a timely manner, compared to the notification and timing constraints of NMFS management and the need to post a notice to the Federal Register.

- If any measures are going to be linked with a genetic cluster it would be more beneficial to in-season bycatch avoidance measures to refine the geographical bounds of the clusters to better match the fishing grounds.

- The pollock industry intends to be collaborative with the Council and submit a proposal with improved indicators and potential triggers for staff to analyze, according to one of the options outlined in the analysis. The proposal and triggers are expected to be just two ways to hold the industry accountable. The proposal will not be limited to just the indicators and triggers, but other potential changes to the IPAs and SSIP agreements.

- An impact analysis on WAK chum Stocks is important to help answer the question of whether or not any of the suggested management measures will meet the purpose and need.

- Based on testimony, socioeconomic impacts should be focused on and expanded for CDQ communities, coastal pollock-dependent communities, communities affected by the decline of WAK chum (especially Western Alaskan communities), and the state of Alaska as a whole.

- The analysis should include discussion of the multi-faceted CDQ program from both a fishery participation perspective as well as socioeconomic perspective that results from their collective investment in the AFA sector. This would help inform the tradeoffs that could come out of this action consistent with National Standard 8.

Rationale in Opposition to Main Motion:

- Failure of the motion to include values associated with a hard cap as outlined in Amendment 2 rendered the main motion less palatable.

**Amendment 1: Passed 17-0** (include the purpose and need statement and list of alternatives)

Rationale in Favor of Amendment 1:

- This amendment clarifies the language in the initial first paragraph to ensure that the Council, AP, and public know that the original suite of alternatives are still moving forward as part of this review and the motion purpose is to include further information to be analyzed.

- It is important to be clear and transparent in motion language in order for all parties involved to understand the action at hand.

**Amendment 2: Failed 6-11 (replace option 1 and 2: failed language in strikethrough)**

Rationale in Opposition to Amendment 2:

- This amendment was a potential substantive change to Alternative 2. Since the intention of this review was to primarily flush out details and give recommendations for the Council decision points, the Council had indicated that they want the AP to provide additional specificity for the next analysis with existing alternatives in their current form.
Some AP members expressed that the lack of a higher range of values for analysis made this alternative unviable. A cap of 280,000 would have shut down the pollock fishery in multiple past years.

The AP heard testimony that the pollock fishery allows communities such as Unalaska to continue to be the only international exporting port in the state to Asia and economic activity from the fishing sector helps to subsidize movement of goods and fuel to Western Alaska. The potential shutdown of the pollock fishery due to reaching a hard cap could also have large impacts to the state’s economy as a whole.

At this time the pollock trawl fishery stabilizes the processing sector in many regions. We heard public testimony and comment at the AP that the pollock fishery allows the processing sector, especially in Unalaska, to remain open and viable. There has been a recent collapse of global markets for all seafood species and this economic downturn has already begun to have negative impacts on communities that are heavily dependent on commercial fishing. Further constraining processors with a hard cap on the pollock fishery could result in the loss of processors who support all commercial fisheries, especially those that are much smaller than the pollock fishery, which would have even further devastating effects for all Alaskans.

Some AP members felt there is not enough information to inform a decision on the correct numbers to analyze for a hard cap consideration, which may demonstrate a fundamental problem with Alternative 2 – with the unknowns about hatchery fish and variability of where the Western Alaska chum are and when, it seems unlikely the council could set a cap that will deliver the results intended.

Any hard cap would have to be allocated between sectors. The inshore sector delivering to Alaska communities uses the most bycatch but they also have the least ability to move to avoid chums. At low cap amounts, allocations to individual shoreside vessels could be so small as to prevent any ability to fish.

A range of reasonable cap values should be included in the analysis but zero is not reasonable. Keeping zero in the analysis will complicate and lengthen the analysis and the EIS, which is already under a tight time constraint. The potential impacts of any closure of the pollock fishery could have negative effects on the local, national, and global levels.

A zero level for chum bycatch has been addressed in past Council actions.

Some AP members felt that the high value suggested in the amendment was not reasonable. There was no discussion during public testimony or deliberation of an actual number or numbers for a range. A low static value does not likely account for the ecological and environmental fluctuations experienced in the Bering Sea with Chum. There are too many uncontrollable factors that affect the fluctuation to support a low constraining range of values.

Over the last 30 plus years of the CDQ program, CDQ groups have invested heavily in the pollock fishery. With the recent reductions in revenue from other fisheries including crab, a large portion of benefits are generated from pollock. A zero cap on chum could shut down the B-season fishery, significantly impacting the ability of CDQ groups to distribute benefits to eligible Alaska residents, many of whom live below national poverty standards.
Rationale in Favor of Amendment 2:

- Some AP members supported the failed Amendment 2 (which attempted to create a range of PSC limits to be reviewed, including a suboption of zero) not as an effort to shut down the pollock fishery, but as an effort to show the inverse of Alternative 1, No Action and to understand a wider range of economic impacts to the pollock fishery.
- Some AP members felt a cap of zero should be analyzed. This has been a consistent request to the Council from subsistence users, Tribes, and Tribal organizations for years in recognition of the severity of the crisis and the fact that it has been “practicable” to expect subsistence users to sit at zero harvest, while thousands of the same fish are utilized as PSC offshore. Many subsistence users see this as waste.
- Analysis of a cap of 0 additionally broadens the range of alternatives for analysis, as required under NEPA. The Council and Agency have a responsibility to transparently consider this number and make clear what values they are prioritizing.
- 22,000 was the chum bycatch level in 2012, which represents the lowest bycatch level in the 2011-2022 time series. This is a reasonable number to include because the fleet has shown they can achieve low chum bycatch such as this; and it broadens the range of numbers for analysis.
- The upper end of the proposed range is 280,000, which is the average bycatch in the 2011-2022 time series. This should be the absolute upper bound for analysis, as maintaining average chum bycatch is another way of maintaining the status quo.
- This is responsive to public testimony as well as recent proof of the pollock industry on their ability to decrease their chum bycatch.

Amendment 3: Passed 16-1 (clarify language about assessing socioeconomic impacts)

Rationale in Favor of Amendment 3:

- The amendment was not intended to change the purpose of the bullet point, rather to assure the inclusion of all communities affected by the chum declines. The AP heard from multiple testifiers that there are affected interior communities along the river system that may not be considered geographically to be part of Western or coastal Alaska.
- It is important to break down the potential action impacts at both a statewide and community level separately as there was public testimony on the statewide impacts on the potential shutdown or curtailing of the pollock industry in areas such as export, fuel prices, movement of goods/shipping, etc.

Rationale in Opposition to Amendment 3:

- The language is too broad.
Amendment 4: Passed 11-6 (Add Crab PSC)

Rationale in Favor of Amendment 4:

- Crab has consistently occupied the “other bycatch” category and in the face of the crisis many crab fisheries are experiencing today, it is important to elevate crab to a level of consideration on its own.

Rationale in Opposition to Amendment 4:

- The original intention of specifying Chinook PSC and Herring PSC in the bulleted list of tradeoffs that the analysis should consider was to clearly prioritize the two most constraining PSC species to the pollock fleet. Any adopted alternatives to minimize chum bycatch are most likely to impact the pollock fleet's ability to avoid chinook and herring. The analysis of tradeoffs with all other species, including crab, was intended to be included in "other bycatch"; those other bycatch species are not expected to be as constraining to the pollock fleet.
- There was expressed concern that the addition of crab PSC as its own bulletin could detract from the chum bycatch analysis as there are many pending issues and concerns around crab PSC being discussed at this time.

Amendment 5: Passed 12-5 (three additional items to be included in the analysis)

Rationale in Favor of Amendment 5:

- Page 105 of the analysis has information on a decline in chum salmon around the year 2000 that appears similar to the decline the region is experiencing now. Information to help understand what led to that decline could help inform the current action.
- Information on Trawl bycatch numbers during that same time period (leading up to and during the chum salmon declines of the year 2000) and also potential impacts from the area M intercept fisheries would also add helpful context.
- Any additional information as to the condition or causes of chum salmon declines in other regions would inform our understanding of broader chum population trends.

Rationale in Opposition to Amendment 5:

- There is validity in exploring all possible data that may inform understanding of current chum declines, but doing so at this stage may slow down the analysis with uncertain benefits.
- The Area M salmon fisheries’ intercept of Western Alaska chum is being discussed extensively through the State process and it shouldn’t be brought into the Federal process.
Motion 2:
The AP recommends the Council include periodic review for any action alternative.

Motion failed: 7-10

Rationale in Opposition to the Motion:
- Annual IPA updates and salmon genetics reports present a yearly opportunity to review performance of the pollock fishery and to determine whether or not it has been successful at bycatch avoidance. It is not necessary to initiate a periodic review framework when this capability already exists.
- At any Council meeting, the opportunity exists for the public to ask for a review or revision due to unintended effects of any past Council action. A planned review for each action is not necessary and may be burdensome to staff and jeopardize other high-priority concerns.
- Some AP members pointed out that typically the Council process only associates a regulatory review process with new Limited Access Privilege Programs or changes in gear, such as slinky pots for sablefish.
- Some AP members felt it is too early in the process to consider adding a periodic review.
- AP members felt the timeline was not specific and expressed concerns there may not be measurable metrics of success for the action and that could challenge the success or efficacy of accurate review.

Rationale in Favor of the Motion:
- Without a planned initial comprehensive review subsequent to potential Council action on this subject, there is concern that the opportunity to review its efficacy may be limited.
- The information to support the desired action outcomes identified in the Council’s Purpose and Need Statement is uncertain. Moving forward with an action that has efficacy linked to unlikely scenarios is not a scientific approach and does not follow the Precautionary Principle. To meet those standards, this action would benefit from provisions for review where the council could gain insight from new and more relevant data gathered during the management paradigm and fishing environment this action may create.
- The impacts of Chum Salmon avoidance measures, caps, or other management strategies are not well understood and data regarding its effects on the pollock fishery and other affected fisheries may not be able to be assessed without first having an action implemented first. AP members felt that makes this action experimental in nature.