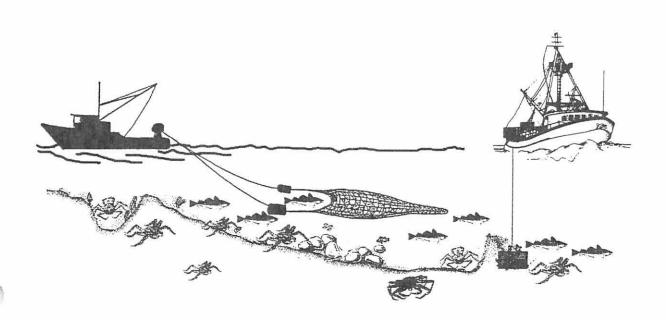
Environmental Assessment/ Regulatory Impact Review/ Initial Regulatory Flexibility Analysis for Proposed Amendment to the Fishery Management Plan for Groundfish of the Gulf of Alaska

Area Closures for *Chinoecetes bairdi* Crab Protection in Gulf of Alaska Groundfish Fisheries

September 2010

Public Review





Executive Summary

ES.1 Introduction

This document analyzes proposed area closures to protect *C. bairdi* crab around Kodiak Island. Included in the alternatives are options to apply the closures year round or seasonally, and to pot and/or trawl gear types. Additionally, some vessels may be exempted from the area closures if they meet specific conditions such as using approved gear modifications, or an observer coverage requirement.

ES.2 Purpose and Need

The purpose of this action is to provide additional protection to Gulf of Alaska (GOA) Tanner crab from the potential adverse effects of groundfish fisheries, in order to facilitate rebuilding of Tanner crab stocks. This would be achieved by closing areas around Kodiak Island that are important to the Tanner crab stocks. Areas would be closed to some or all groundfish fishing, depending on the vessel's gear type or gear configuration. An alternative in the analysis would allow a vessel to be exempt from the closures if the vessel carries 100% observer coverage¹. This would provide the Council with a high level of confidence in the assessment of any bycatch caught in the closed area, as a basis for future management action as necessary.

The Council formulated a problem statement in October 2009, to initiate this analysis, and revised it slightly in April 2010:

Tanner crab are a prohibited species bycatch in the Gulf of Alaska (GOA) groundfish fisheries. Directed fisheries for Tanner crab in the GOA are fully allocated under the current limited entry system. No specific conservation measures exist in the GOA to address adverse interactions with Tanner crab by trawl and fixed gear sectors targeting groundfish and low observer coverage in GOA groundfish fisheries limits confidence in the assessment of Tanner crab bycatch in those fisheries, and a greater level of observer coverage in the appropriate areas may provide the Council with a higher level of confidence in the assessment of any bycatch occurring in the designated areas as a basis for future management actions as necessary. Tanner crab stocks have been rebuilding since peak fisheries occurred in the late 1970s. Specific protection measures should be advanced to facilitate stock rebuilding.

ES.3 Alternatives

The alternatives evaluated in this analysis were adopted by the Council in October 2009, and modified during initial review in April 2010.

Alternative 1: Status Quo - No action

Alternative 2: Close the areas specified below to pot and trawl groundfish fisheries.

Component 1: Area definition

ADF&G Northeast Section

Option 1: Statistical Area 525807 and the area east of Statistical Area 525807 north of 58 degrees latitude, south of 58 degrees 15 min. latitude and west of 151 degrees 30 min. longitude.

^{1 30%} observer coverage required for pot vessels less than 125 ft

Option 2: Chiniak Gully (Four corners at 152°19'34" W x 57°49'24" N by 57°29' N x 151°20'W by 57°20' N x 151°20'W by 57° x 152°9"20' W), excluding State waters

ADF&G Eastside Section

Option 3: Statistical Area 525702

ADF&G Southeast Section

Option 4: Statistical Area 525630

Component 2: Closure timing

Option 1: Year round

Suboption 1: trawl gear Suboption 2: pot gear

Suboption 3: Vessels using approved, modified gear would be exempt from closures (e.g., trawl sweep modifications or pot escape mechanisms).

Suboption 4: Vessels using pelagic trawl gear would be exempt from closures Suboption 5: Vessels using pelagic trawl gear to directed fish for pollock would be exempt from the closures

Option 2: Seasonally (January 1 – July 31)

Suboption 1: trawl gear Suboption 2: pot gear

Suboption 3: Vessels using approved, modified gear would be exempt from closures (e.g., trawl sweep modifications or pot escape mechanisms).

Suboption 4: Vessels using pelagic trawl gear would be exempt from closures Suboption 5: Vessels using pelagic trawl gear to directed fish for pollock would

be exempt from the closures

Alternative 3: In order to fish in the areas specified below, require 100% observer coverage on all trawl groundfish vessels and 30% observer coverage on all pot groundfish vessels less than 125 feet. Note, fishing days and observer coverage in these areas would be separate from and not count towards meeting a vessel's overall 30% groundfish observer coverage requirement.

Area definition

ADF&G Northeast Section

Option 1: Statistical Area 525807 and the area east of Statistical Area 525807 north of 58 degrees latitude, south of 58 degrees 15 min. latitude and west of 151 degrees 30 min. longitude.

Option 2: Chiniak Gully (Four corners at 152°19'34" W x 57°49'24" N by 57°29' N x 151°20'W by 57°20' N x 151°20'W by 57° x 152°9"20' W), excluding State waters

ADF&G Eastside Section

Option 3: Statistical Area 525702

ADF&G Southeast Section

Option 4: Statistical Area 525630

Note, the options and suboptions under Alternatives 2 and 3 are not intended to be mutually exclusive, and may be applied in combination. Also, in April 2010, the Council clarified that at final action, they may select closure areas that are smaller than the areas described in the four options under the 'area definition' component.

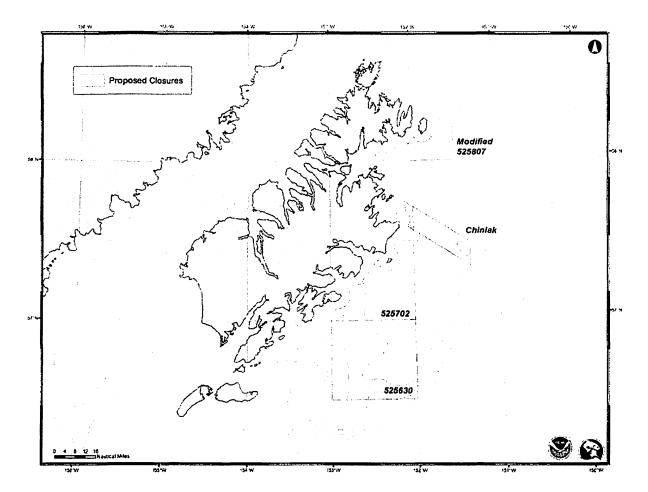


Figure 1 Area closures around Kodiak Island considered in Alternatives 2 and 3

ES.4 Impacts of the Alternatives

The alternatives were analyzed for their impacts on crab, groundfish and other fish species, marine mammals and seabirds, habitat, and the ecosystem, and for their economic and socio-economic impacts. The impacts on the socio-economic environment are analyzed in the Regulatory Impact Review (Section 6) and the Initial Regulatory Flexibility Analysis (Section 7) and are summarized in the following section.

The proportion of the surveyed abundance of Tanner crab around Kodiak which is taken as bycatch in the groundfish fisheries represents approximately 0.2% of the total abundance of crab. In the Eastside Section, which is identified as an important area for Tanner crab, groundfish bycatch represents a maximum of 0.3% of the Eastside surveyed abundance of Tanner crab, average over 2003-2009. Consequently, groundfish bycatch impacts on the sustainability of Tanner crab in the Kodiak District under the status quo, Alternative 1, are considered as adverse, but are not likely to be significant to the sustainability of the crab population.

Alternative 2, closing the proposed areas to groundfish fishing, would benefit crab stocks by reducing a source of mortality. Benefits to crab would be greatest by closing the areas to nonpelagic trawl fishing, as this gear type is observed to catch most of the crab in these areas. While pot vessels also contribute to the

overall Tanner crab bycatch in reporting area 630, and to some extent in the proposed area closures, observed crab bycatch in the pot fisheries occurred predominantly elsewhere in reporting area 630. Pelagic trawl and hook and line vessels account for very little crab bycatch, and closing the proposed areas to these gear types would provide little benefit to the crab stocks.

The impacts of suboption 3 under Alternative 2, which would exempt vessels from the closures if using approved gear modifications, are difficult to assess as proposed gear modifications have not been tested in the GOA. To the extent that they reduce unobserved mortality of crab, or reduce bycatch, they are likely to be beneficial to crab stocks. Alternative 3, which exempts vessels from the closures if they have 100% observer coverage, does not provide any benefit to crab stocks over the status quo, for those vessels that take advantage of the exemption.

The impact of the alternatives on other resource categories is analyzed in the EA, including groundfish and other fish species, marine mammals, seabirds, habitat, and the ecosystem. The proposed area closures may displace some vessels, and there may be some difficulty for vessels targeting shallow water flatfish to fully harvest the TAC., are not expeted to be significant. T In general, the timing, general location, and overall level of fishing effort in the GOA groundfish fisheries is not expected to change, as the proposed area closures are small and fishing will likely continue to occur in neighboring areas although there may be an increased level of effort in localized areas outside of the closures as displaced vessels attempt to harvest their target fish elsewhere. However, effects on these resource categories are not expected to be significant.

ES.5 Management and Enforcement Considerations

The boundaries of the proposed closure areas under Alternatives 2 and 3 are defined by existing ADF&G statistical areas and by polygons defined by latitude and longitude coordinates. Closure areas defined in this manner are easier for both the regulated industry to understand and comply with, as well as enforcement entities to patrol and enforce. The proposed closure areas present no noteworthy enforcement challenges.

Proposed modified gear requirements under Alternative 2, Suboption 3, such as trawl sweep modifications or pot escapement mechanisms, require a detailed description in regulations of the specific gear modification that would be required to qualify for exemption of the area closures. Such specifications have been discussed in general in this analysis, but no specific gear modifications have been described or widely tested for efficacy in protection of Tanner crab in the GOA fisheries. Therefore, Alternative 2, Suboption 4 should not be included in the preferred alternative as a specific recommended regulatory amendment at this time.

Suboptions 4 and 5 would exempt vessels using pelagic trawl gear from the proposed area closures. There are several areas around Kodiak Island that already are closed to nonpelagic (bottom) trawling. These closure areas overlap with some of the closure areas proposed under Alternative 2. These existing closure areas are regulated through both a prohibition against having nonpelagic trawl gear onboard the vessel. In addition, the "trawl gear performance standard", which specifies that it is unlawful to possess aboard a vessel, at any point in time, 20 or more crab of any species, with a carapace width of more than 1.5 inches, also applies for vessels directed fishing for pollock. Enforcement of this standard on any vessel (observed or unobserved) is difficult, and it is virtually impossible to monitor and enforce on unobserved vessels.

Alternative 3 would allow fishing in the proposed closure areas by vessels using trawl gear only if they carry an observer 100% of the days they conducted directed fishing for groundfish in these areas. All vessels using pot gear to directed fish for groundfish would be required to have 30% observer coverage.

In addition, observer coverage for fishing inside these closure areas would be separate from and not count towards meeting a vessel's 30% observer coverage requirements that applied for fishing outside of these closure areas. This last provision was added to the alternative to address the concern NMFS identified in the initial review draft that increased observer coverage requirements inside the proposed closure areas could decrease the observer data available from fishing outside of the closure areas. While this provision addresses that concern, the other concern identified in the initial review draft about the extrapolation of observer data to generate PSC estimates remains.

NMFS uses observer data and extrapolates prohibited species catch (PSC) sampled on observed trips to similar unobserved trips in the larger federal reporting area (by processing sector, week ending date, target fishery, gear, and federal reporting area). NMFS does not create separate PSC estimates for each ADF&G state statistical area or for catcher vessels fishing inside and outside of closure areas, such as those proposed in this action. It is not known whether data collected from the proposed closure areas would be representative of fishing over the entire reporting area. However, through ongoing work NMFS is working to improve the estimation process in concert with the observer restructuring efforts. The restructured program would enable NMFS to define estimation strata and randomly select trips at a consistent rate within them. Action to increase observer coverage in this one GOA area without modifications to the NMFS catch estimation process could result in estimates which are biased by data from this specific area. Thus NMFS would need to make changes to the current estimation process to accommodate this change in coverage. Likely NMFS would need to handle estimation for this specific area discrete from other areas in the GOA. Modifications to the catch estimation process would be complex and expensive, and would compete with other priorities for additions and improvements to NMFS's catch accounting system.

Some vessels less than 60 feet LOA may have fished in the proposed closure areas in the past. Under Alternative 3, any vessels of this size class would be required to carry observers for at least some of the fishing inside the proposed closure areas (unless they didn't meet the minimum threshold for observer coverage of 3 days per quarter). Although some vessel operators may choose to fish outside the closure areas rather than incur the cost of the required observer coverage, some of these vessels may seek observer coverage. They would be required to comply with existing safety and all other vessel requirements in 50 CFR part 679.50.

If the Council recommends increased observer coverage for vessels fishing with the GOA Tanner crab protection areas under Alternative 3, this would add a third special area with 100% observer coverage requirements to NMFS's current regulations. Existing areas are the Nearshore Bristol Bay Trawl Closure Area and the Red King Crab Savings Area, both in the BSAI management area. These specific requirements for 100% observer coverage within special areas currently are not included in the categories that would require ≥100% observer coverage under the observer restructuring alternatives. Therefore, if the Council recommends an observer restructuring alternative that places vessels in the <100% observer coverage category in a management area under a sampling plan, NMFS would remove the increased observer coverage for the "special areas" in the relevant management area. Vessels in the <100% observer coverage category would be subject to assignment of observer coverage under a sampling plan as described in the observer restructuring analysis.

The Council's current alternatives for restructuring the observer program could accommodate continuation of 100% observer coverage requirements for all vessels within these special areas. Vessels that are in the <100% coverage category would pay an exvessel value based fee for observers, and these vessels would be subject to an annual sampling plan developed by NMFS. Should vessels choose to fish in the special areas, the sample design could require that they carry observers 100% of the time they are directed fishing for groundfish in these areas. Thus, even though many of the affected vessels would not have 100% coverage any other time or in any other area, the observer restructuring action allows for

flexibility in determining coverage on vessels in the <100% coverage category. If a group of vessels is determined to need 100% coverage at specific times of the year, seasons, or areas, NMFS could direct observer deployment to accommodate those needs. The fee paid by those vessels would not change, but the coverage amount could be modified to account for those circumstances; this flexibility is part of the impetus of restructuring. This accommodation in the sampling plan is not currently described in the observer restructuring analysis, as that level of detail by sector was not deemed necessary. Establishing special areas of 100% observer coverage would significantly complicate the current sampling plan and necessarily reduce the amount of coverage days available for other fisheries and management priorities in the GOA. The vessel selection plan currently included in the observer restructuring analysis does not assign observer coverage based on what a vessels intends to do. Instead, it takes parameters such as vessel length and gear type, which are known in advance, and assigns random coverage of trips based on a predetermined coverage rate. Vessels would call in prior to trips and be selected for coverage or not regardless of where they planned to fish.

ES.6 Regulatory Impact Review

The Regulatory Impact Review is in Section 6 of this document, and describes the economic impacts of the alternatives. Under the closures proposed under Alternatives 2 and 3, groundfish vessels that are subject to the closures will be required to forego fishing in the proposed areas. The impact on these vessels will be proportional to the extent that they rely on the area for target fishing.

Based on observer data, the nonpelagic trawl fishery will be most impacted by the area closures, especially the flatfish fisheries. 65-70% of groundfish caught in the pollock target occurs in the Chiniak and 525702 closures; 50-60% of groundfish in the arrowtooth flounder and flathead sole target occurs in 525702 and 525630; 50% of shallow water flatfish occurs in 525702; and 60-70% of the rex sole target fishing occurs in 525630. For arrowtooth flounder and flathead sole targets, there are areas outside of the proposed closures where a concentration of catch in those targets occurs, however for the shallow water flatfish target fishery, there are few areas outside of the proposed area closures where significant catch occurs. Therefore particularly for shallow water flatfish, it may be difficult to fully harvest the TAC outside the proposed area closures. There are several catcher vessels who derive over 20% of their exvessel revenue from flatfish from the 525702 and 525630, and these vessels would be more impacted than others by the proposed closures. To the extent that flatfish TACs cannot be fully harvested as a result of this alternative, there may also be impacts on the community of Kodiak and processing facilities.

For pelagic trawl, the biggest impact would result from closing 525702, where the western and central portions of the statistical area are important for pollock trawling. Approximately 25% of the groundfish catch in the pollock pelagic trawl target fishery occurred within the Marmot, Chiniak, and 525702 closures, on average between 2007 and 2009. However, the pelagic trawl pollock fishery is prosecuted in other areas within reporting area 630, which would remain open to fishing.

For pot vessels, the proposed area closures have a smaller impact on groundfish fishing because, according to observer data, the area is not as much fished as other parts of reporting area 630. However, there appear to be a higher proportion of pot vessels using the proposed area closures that are unobserved, so observer data may be less reliable for this gear type. Fish ticket data identify that an average of 42% of exvessel revenue from pot vessels came from the combined 525702 and 525630 statistical areas.

Under Option 2, the seasonal closure, adverse impacts from the area closures on groundfish fishers would be reduced compared to Option 1, as vessels could fish in the areas for the remainder of the year.

Alternative 3 would increase costs to the owners of any vessel that continued to fish in the closure areas that are not already required to have 100% or greater observer coverage. The category of vessels that

could incur increased costs are (1) vessels less than 60' LOA currently required to have no observer coverage, and (2) vessels currently required to have 30% observer coverage. The estimated total increase in costs for 60' - 125' trawl catcher vessels under Alternative 3 is the full cost of 100% observer coverage inside these areas (\$558,882 or an average of \$17,465 per vessel). The estimated increase in cost under Alternative 3 for vessels using pelagic trawl gear is a total of \$30,744 or about \$900 per vessel. Because most of the 37 vessels using trawl gear in these areas in 2009 used both nonpelagic and pelagic trawl gear, the total cost of the increased observer coverage requirements for many trawl vessels between 60' and 125' LOA would the sum of the cost estimates for nonpelagic and pelagic trawl gear (\$589,626 or an average of \$15,936 for the 37 vessels between 60' and 125' LOA using trawl gear). For vessels less than 60 ft using pot gear, the total cost for that observer coverage is estimated at \$33,764 (average per vessel of \$2,814). For 60' - 125' pot catcher vessels, is estimated to be \$22,948, an average of \$2,086 per vessel. NMFS estimates that each day of additional observer coverage costs the agency \$130. Based on 2009 data, we may expect an increase in cost of approximately \$277,000, a cost that is not currently identified in NMFS's budget.

ES.7 Initial Regulatory Flexibility Analysis

This action could directly regulate all pot and trawl vessels participating in Federal groundfish fisheries around Kodiak Island in the Central Gulf of Alaska. From 2003 to 2009, there were 74 nonpelagic trawl vessels, 53 pelagic trawl vessels, and 129 pot vessels with reported Tanner crab bycatch, participating in one or multiple years in the groundfish fisheries in reporting area 630. Of the vessels fishing in reporting area 630, from 2003-2009, with reported Tanner crab bycatch, 26 nonpelagic trawl vessels, 12 pelagic trawl vessels, and 97 pot vessels are considered small for RFA purposes. A complete discussion of significant alternatives will be included in this section once the Council has finalized their recommendation to the Secretary of Commerce.

ES.8 Organization of the Document

There are four required components of an environmental assessment. The need for the proposal is described in Section 1, and the alternatives in Section 2. Section 4 discusses the environmental impacts of the proposed action and alternatives. A list of agencies and persons consulted is included in Section 10.2.

Management and enforcement considerations are addressed in Section 5. A Regulatory Impact Review (Section 6) discusses economic impacts of the action, and an Initial Regulatory Flexibility Analysis (Section 7) evaluates the impact of the action on small businesses. Sections 8 and 9 discuss the alternatives with respect to other analytical considerations.

Color figures mapping the distribution of bycatch and groundfish catch are included at the end of the document, in Appendix A Color Figures.

C-5 GOA Tanner crab bycatch motion October 10, 2010

The Council adopts the following amended problem statement and preferred alternative for final action:

Problem Statement:

Tanner crab are a prohibited species bycatch in the Gulf of Alaska (GOA) groundfish fisheries. Directed fisheries for Tanner crab in the GOA are fully allocated under the current limited entry system. No specific conservation measures exist in the GOA to address adverse interactions with Tanner crab by trawl and fixed gear sectors targeting groundfish and low observer coverage in GOA groundfish fisheries limits confidence in the assessment of Tanner crab bycatch in those fisheries, and a greater level of observer coverage in the appropriate areas may provide the Council with a higher level of confidence in the assessment of any bycatch occurring in the designated areas as a basis for future management actions as necessary. Trawl sweep modifications have been effective in reducing unobserved bycatch mortality of Tanner crab in the Bering Sea, and similar effects may be realized in the Gulf of Alaska if modified trawl sweeps are employed in those groundfish fisheries. Tanner crab stocks have been rebuilding since peak fisheries occurred in the late 1970s. Specific protection measures should be advanced to facilitate stock rebuilding.

Alternative 2: Close the areas specified below to pot and trawl groundfish/fisheries.

Component 1: Area definition ADF&G Northeast Section

> Option 1: Statistical Area 525807 and the area east of Statistical Area 525807 north of 58 degrees latitude, south of 58 degrees 15 min. latitude and west of 151 degrees 30 min. longitude.

Component 2: Closure timing Option 1: Year round

Suboption 1: trawl gear

Suboption 5: Vessels using pelagic trawl gear to directed fish for pollock would be exempt from the closures

Twestadd Alternative 3: In order to fish in the areas specified below, require 100% observer coverage on all non-pelagic trawl groundfish vessels and 30% observer coverage on all pot groundfish vessels less than 125 feet.) Note, fishing days and observer coverage in these areas would be separate from and not count towards meeting a vessel's overall 30% groundfish observer coverage requirement. The Council encourages the agency to incorporate, to the extent possible, the 100% observer program so that 3 years of data at the 100% coverage level are obtained.

Area definition

ADF&G Northeast Section

Option 2: Chiniak Gully (Four corners at 152°19'34" W x 57°49'24" N by 57°29' N x 151°20'W by 57°20' N x 151°20'W by 57° x 152°9"20' W), excluding State waters

ADF&G Eastside Section

Option 3: Statistical Area 525702

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In order to fish in the areas specified below, require trawl vessels to use approved modified gear (e.g., trawl sweep modifications).

Area definition

ADF&G Northeast Section

Option 2: Chiniak Gully (Four corners at 152°19'34" W x 57°49'24" N by 57°29' N x 151°20'W by 57°20' N x 151°20'W by 57° x 152°9"20' W), excluding State waters

ADF&G Eastside Section

Option 3: Statistical Area 525702

ADF&G Southeast Section

Option 4: Statistical Area 525630

It is expected that NMFS initiate an iterative process similar to that used to develop trawl sweep specifications in the BSAI in order to implement the trawl sweep requirement and reduce the footprint in the GOA by bottom trawls.

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The Council adopts the following amended problem statement and preferred alternative for final action:

Problem Statement:

Tanner crab are a prohibited species bycatch in the Gulf of Alaska (GOA) groundfish fisheries. Directed fisheries for Tanner crab in the GOA are fully allocated under the current limited entry system. No specific conservation measures exist in the GOA to address adverse interactions with Tanner crab by trawl and fixed gear sectors targeting groundfish and low observer coverage in GOA groundfish fisheries limits confidence in the assessment of Tanner crab bycatch in those fisheries, and a greater level of observer coverage in the appropriate areas may provide the Council with a higher level of confidence in the assessment of any bycatch occurring in the designated areas as a basis for future management actions as necessary. Trawl sweep modifications have been effective in reducing unobserved bycatch mortality of Tanner crab in the Bering Sea, and similar effects may be realized in the Gulf of Alaska if modified trawl sweeps are employed in those groundfish fisheries.

Alternative 2: Close the areas specified below to pot and trawl groundfish fisheries.

Component 1: Area definition ADF&G Northeast Section

Option 1: Statistical Area 525807 and the area east of Statistical Area 525807 north of 58 degrees latitude, south of 58 degrees 15 min. latitude and west the longitude line extending north from the eastern boundary of the Type 1 red king crab closure area.

Component 2: Closure timing Option 1: Year round

Suboption 1: trawl gear

Suboption 5: Vessels using pelagic trawl gear to directed fish for pollock would be exempt from the closures

Alternative 3: In order to fish in the areas specified below, require 100% observer coverage on all non-pelagic trawl groundfish vessels and 30% observer coverage on all pot groundfish vessels less than 125 feet. Note, fishing days and observer coverage in these areas would be separate from and not count towards meeting a vessel's overall 30% groundfish observer coverage requirement. The Council encourages the agency to incorporate, to the extent possible, in the new fee-based observer program, an observer deployment strategy that ensures adequate coverage to establish statistically robust observations in the areas described below.

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Area definition

ADF&G Northeast Section

Option 2: Chiniak Gully (Four corners at 152°19'34" W x 57°49'24" N by 57°29' N x 151°20'W by 57°20' N x 151°20'W by 57° x 152°9"20' W), excluding State waters

ADF&G Eastside Section

Option 3: Statistical Area 525702

Develop a trailing amendment to require trawl vessels to use approved modified gear, e.g. trawl sweep modifications, in the Central GOA nonpelagic trawl fishery.

It is expected that NMFS initiate an iterative process similar to that used to develop trawl sweep specifications in the BSAI in order to implement the trawl sweep requirement and reduce the footprint in the GOA by bottom trawls.

[Deeming language]

C-5 GOA Tanner crab bycatch motion FINAL MOTION AS RECONSIDERED - October 11, 2010

The Council adopts the following amended problem statement and preferred alternative for final action:

Problem Statement:

Tanner crab are a prohibited species bycatch in the Gulf of Alaska (GOA) groundfish fisheries. Directed fisheries for Tanner crab in the GOA are fully allocated under the current limited entry system. No specific conservation measures exist in the GOA to address adverse interactions with Tanner crab by trawl and fixed gear sectors targeting groundfish and low observer coverage in GOA groundfish fisheries limits confidence in the assessment of Tanner crab bycatch in those fisheries, and a greater level of observer coverage in the appropriate areas may provide the Council with a higher level of confidence in the assessment of any bycatch occurring in the designated areas as a basis for future management actions as necessary. Trawl sweep modifications have been effective in reducing unobserved bycatch mortality of Tanner crab in the Bering Sea, and similar effects may be realized in the Gulf of Alaska if modified trawl sweeps are employed in those groundfish fisheries.

Alternative 2: Close the areas specified below to trawl groundfish fisheries.

Component 1: Area definition ADF&G Northeast Section

Option 1: Statistical Area 525807 and the area east of Statistical Area 525807 north of 58 degrees latitude, south of 58 degrees 15 min. latitude and west the longitude line extending north from the eastern boundary of the Type 1 red king crab closure area.

Component 2: Closure timing
Option 1: Year round

Suboption 1: trawl gear

Suboption 5: Vessels using pelagic trawl gear to directed fish for pollock would be exempt from the closures

Component 3: Observer coverage for pot groundfish fishery

In order to fish in the area, require 30% observer coverage on all pot groundfish vessels less than 125 feet. Note, fishing days and observer coverage in these areas would be separate from and not count towards meeting a vessel's overall 30% groundfish observer coverage requirement. The Council encourages the agency to incorporate, to the extent possible, in the new fee-based observer program, an observer deployment strategy that ensures adequate coverage to establish statistically robust observations in the area described.

Alternative 3: In order to fish in the areas specified below, require 100% observer coverage on all non-pelagic trawl groundfish vessels and 30% observer coverage on all pot groundfish vessels less than 125 feet. Note, fishing days and observer coverage in these areas would be separate from and not count towards meeting a vessel's overall 30% groundfish observer coverage requirement. The Council encourages the agency to incorporate, to the extent possible, in the new fee-based observer program, an observer deployment strategy that ensures adequate coverage to establish statistically robust observations in the areas described below.

Area definition

ADF&G Northeast Section
Option 2: Chiniak Gully (Four corners at 152°19'34" W x 57°49'24"
N by 57°29' N x 151°20'W by 57°20' N x 151°20'W by 57° x
152°9"20' W), excluding State waters

ADF&G Eastside Section
Option 3: Statistical Area 525702

Develop a trailing amendment to require trawl vessels to use approved modified gear, e.g. trawl sweep modifications, in the Central GOA nonpelagic trawl fishery.

It is expected that NMFS initiate an iterative process similar to that used to develop trawl sweep specifications in the BSAI in order to implement the trawl sweep requirement and reduce the footprint in the GOA by bottom trawls.

[Deeming language]