


MEMORANDUM

TO: Council, SSC, and AP Members

FROM: Clarence G. Pautzke 
Executive Director

DATE: November 22, 1991

SUBJECT: Groundfish Management for 1992

ACTION REQUIRED

- A. Comments on proposed changes in recordkeeping and reporting requirements.
- B. Review proposed rules implementing Walrus Islands closures to protect walrus.
- C. Review for approval a regulatory amendment assigning halibut bycatch to the demersal shelf rockfish hook-and-line fishery in the Southeast Outside District of the Gulf of Alaska.

BACKGROUND

A. Recordkeeping and reporting requirements

Annual changes to NMFS recordkeeping and reporting program are presented to the Council for its review. The changes proposed for 1992 were presented to the Council at its September 1991 meeting and are presented here again in summary form as Item D-1(c)(1). NMFS will hold an open meeting with industry representatives on Wednesday evening of the Council meeting week to discuss these proposed changes. They are provided here in the event the Council has any additional comments to make on the proposals. NMFS will be preparing a regulatory amendment to submit to the Secretary for review and approval sometime after the December meeting.

B. Walrus Islands closure

At the August extension of the June 1991 Council meeting the Council approved Amendment 17/22 to the Gulf of Alaska and the Bering Sea/Aleutian Islands FMPs. Part of the action included in approving this package was to reestablish the 12-mile buffer zones around Round Island, the Twins, and Cape Pierce (the Walrus Islands). The Proposed Rule drafted to implement this action will affect only those vessels fishing for groundfish, as opposed to all fishing, because the closure is implemented under the authority of the fishery management plan and cannot apply to vessels fishing for non-groundfish species unless those vessels possess federal fishing permits issued under the authority of the FMP. The Secretary will review authorities for implementing other closures. The closure would apply to all activity in which a vessel might be engaged, and, thus would prohibit transit of federally permitted vessels through the area.

Secondly, because the Magnuson Act does not apply to the Territorial Sea, these measures would apply only to the area from 3 to 12 miles out and the Secretary is not proposing the transit area around Right Hand Point. The State of Alaska will be requested to close the Territorial Sea around the Walrus Islands consistent with the intent of the federal regulations. The Council may then request the State to implement the intent of the Council by allowing a transit area around Right Hand Point. A regulation will be proposed that prohibits entry into the closed area nine miles seaward of the Territorial Sea by federally permitted fishing vessels from April 1- September 30.

C. Assignment of halibut PSC to DSR fishery

The NMFS has prepared a regulatory amendment which would allow the Council to assign a separate halibut PSC limit to the demersal shelf rockfish longline fisheries in the Southeast Outside District of the Gulf of Alaska. Data from the 1991 fisheries indicates that about 15 mt of halibut mortality was counted in the rockfish longline fisheries. The DSR fishery was constrained to a harvest of 284 mt in the Southeast Outside District in 1991 due to halibut PSC closures of the longline fisheries. The TAC for the species complex was 425 mt. The regulatory amendment will be available at this meeting and the Council needs to approve it to establish a separate PSC limit in the specifications process for the 1992 fishery. Item D-1(e)(1) is a letter from the NMFS indicating their intent to prepare this regulatory amendment.

National Marine Fisheries Service
Fisheries Management Division
September 19, 1991

PROPOSED CHANGES TO THE 1992 RECORDKEEPING AND REPORTING PROGRAM

I. Logbooks.

- A. Require shoreside processors to record landed weight of retained groundfish.
 - 1. Landed weights of retained groundfish (whole, bled, or headed and gutted fish) and catcher vessel and processor discard amounts will be used to monitor groundfish quotas.
 - 2. Existing requirements to record species product weights would be maintained for enforcement and other purposes.
- B. Delete shoreside processor requirement to record employee information in daily logs.
- C. Revise instructions and incorporate minor format changes to facilitate accurate recordkeeping.

II. Weekly Production Report

- A. Require shoreside processors to report landed retained product type and weight (round weight in most fisheries), catcher vessel and processor discard amounts, and finished product weights.
 - 1. Standard product recovery rates will be applied against landed product weights reported by shoreside processors and finished product weights reported by at-sea processors for purposes of quota monitoring.
- B. Require processors to indicate intended target species for the upcoming week.
 - 1. Indication of intended target operations will enhance inseason fishery effort and closure projections.
- C. Revise instructions and incorporate minor format changes to facilitate accurate recordkeeping.

III. Daily Production Report

- A. Require shoreside processors to report landed retained product type and weight (round weight in most fisheries), catcher vessel and processor discard amounts, and finished product weights for species for which daily reports are required.
- B. Revise instructions and incorporate minor format changes to facilitate accurate recordkeeping.

IV. Permit applications

- A. Require vessel owners to report vessel ADF&G registration number, telephone, fax, telex and COMSAT

2. Vessels that have engaged in joint venture operations in Soviet waters are required to comply with Soviet permit and logbook regulations. As such, these vessels will be required to submit copies of Soviet vessel permits and logbooks to NMFS Enforcement prior to entering U.S. EEZ waters.

VIII. Miscellaneous changes

- A. Redesignate GOA reporting areas as 3-digit reporting areas.
- B. Specify geographic coordinates for demarcation between BSA and GOA reporting areas.
- C. Designate new statistical areas for:
 - areas in Shelikof Strait west and east of 154° W. longitude
 - internal waters of the State of Alaska
 - international waters in the Bering Sea between the USSR and the USA (Donut hole)
 - other EEZ waters not off Alaska (e.g., Oregon, Washington, Hawaii,).
 - Areas of the U.S. EEZ north of area 522 (includes Chukchi Sea, Norton Sound, and Beaufort Sea).
 - Areas of the North Pacific Ocean and Bering Sea outside the US EEZ, including the seamounts in the Gulf of Alaska and Soviet waters
- D. Redefine the term "processing, or to process" to include fresh fish product after first transfer of fish from a catcher vessel.
 1. The intent of this change is to require processors to report all finished product, including fresh fish that is sold in retail outlets or flown out fresh. We do not intend to include catcher vessels operators who H&G or bleed fish under the definition of "processor."



UNITED STATES DEPARTMENT OF COMMERCE
 National Oceanic and Atmospheric Administration
 National Marine Fisheries Service
 P.O. Box 21668
 Juneau, Alaska 99802-1668
 October 31, 1991

Clarence G. Pautzke
 Executive Director
 North Pacific Fishery Management Council
 P.O. Box 103136
 Anchorage, Alaska 99510

Dear Clarence,

We are preparing a regulatory amendment regarding the demersal shelf rockfish (DSR) hook-and-line fishery in the Southeast Outside District of the Eastern Regulatory Area of the Gulf of Alaska. The Council should review this action at its December 1991 meeting. We request, therefore, that you include the regulatory amendment on the Council's December meeting agenda.

The regulatory amendment would provide the Secretary of Commerce authority to specifically apportion part of the hook-and-line Pacific halibut prohibited species catch (PSC) mortality limit to the DSR fishery in the SEO district. The Fishery Management Plan for Groundfish of the Gulf of Alaska already includes authority to apportion the halibut PSC to specific fisheries.

In 1990, the DSR hook-and-line fishery was exempt from PSC closures by emergency rule, which was implemented in response to a Council recommendation. We do not have information, however, to justify implementing a measure that would permanently exempt the DSR fishery. Rather than exempt the DSR fishery, we propose establishing a PSC allowance for the DSR fishery, which if reached during the fishing year, would result in closing the DSR fishery.

As proposed, the Council would specifically recommend a PSC allowance for the DSR fishery. It would be subtracted from the overall hook-and-line PSC. If the Council were to recommend an overall PSC allowance for the hook-and-line fishery of 750 metric tons (mt) for the 1991 fishing year, the DSR allowance would be subtracted from that amount. The DSR allowance likely will be small, for example 10 mt. The remainder of the hook-and-line PSC, therefore, would be 740 mt. If the overall hook-and-line allowance were reached, the allowance for the DSR fishery would still remain to support that fishery.

If the Council recommends that we proceed with this regulatory amendment, we would initiate proposed rulemaking in the Federal Register.

Sincerely,

for Steven Pennoyer
 Director, Alaska Region



DRAFT
-- ENVIRONMENTAL ASSESSMENT --

Management Measures Pertaining To the
Demersal Shelf Rockfish Hook-and-line Fishery
in the Southeast Outside District of the Eastern Regulatory Area
in the Gulf of Alaska

SUMMARY

NOAA proposes to establish a halibut bycatch allowance for the demersal shelf rockfish (DSR) hook-and-line fishery conducted in the Southeast Outside District of the Eastern Regulatory Area in the Gulf of Alaska. This action is necessary to make this fishery separately accountable for incidental catches of Pacific halibut. NOAA also proposes to define directed fishing standards for DSR. This action is necessary to limit the amounts of DSR that might be taken as bycatch in other fisheries. Both actions are intended to promote the goals and objectives of the North Pacific Fishery Management Council with respect to groundfish management off Alaska.

PURPOSE AND NEED

The domestic and foreign groundfish fisheries in the exclusive economic zone of the Gulf of Alaska (GOA) are managed by the Secretary of Commerce (Secretary) under the Fishery Management Plan (FMP) for Groundfish of the Gulf of Alaska. The FMP was prepared by the North Pacific Fishery Management Council (Council) under the Magnuson Fishery Conservation and Management Act (Magnuson Act) and is implemented by regulations for the foreign fishery at 50 CFR Part 611 and for the U.S. fishery at 50 CFR part 672. Additional regulations pertaining to U.S. fishermen are found at 50 CFR Part 620.

At times, amendments to the FMP and/or its implementing regulations are necessary to resolve problems pertaining to management of the groundfish fisheries. The structure of the FMP allows certain measures to be changed by regulatory amendments without amending the FMP itself. This action contains two regulatory amendments that already are authorized by the FMP. First, it proposes to establish authority for the Secretary, in consultation with the Council, to apportion a Pacific halibut bycatch allowance specifically to the DSR hook-and-line fishery in the Southeast Outside (SEO) District of the Eastern Regulatory Area of the Gulf of Alaska. Second, it proposes to establish directed fishing standards for DSR that would define allowable amounts of DSR that may be retained as bycatch in other directed fisheries.

A description of, and reasons for, the proposed regulatory amendments follow.

Establish authority to allocate a Pacific halibut bycatch allowance to the DSR fishery.

Regulations at 50 CFR 672.20(f) authorize the Secretary, in consultation with the Council, to establish annual halibut prohibited species catch (PSC) mortality limits for trawl and hook-and-line gear, and pot gear. These PSC limits may further be allocated seasonally. If the PSC limit or seasonal allocation of the PSC limit is reached by one of these gear types, then no further directed groundfish fishing by vessels using that gear type is allowed during the remainder of the fishing season or the fishing year. If the halibut PSC limit allocated to hook-and-line gear is reached, all directed fisheries for groundfish, including that for DSR, using hook-and-line gear are prohibited.

When the 1990 halibut PSC limit for hook-and-line gear was reached, the DSR hook-and-line fishery was exempted from closure by emergency rule. When the 1991 PSC limit was reached on July 8, 1991, however, the DSR fishery was not exempted. All hook-and-line fisheries were prohibited on that date for the remainder of the 1991. Part of the 1991 DSR total allowable catch (TAC) specification was not harvested as a result of the closure.

The FMP at section 4.2.3 contains authority to specify halibut PSC mortality limits for specific gear types and to specific target fisheries. Implementing regulations authorize such allocations to gear types but not to fisheries. Under this proposal, therefore, regulations at 50 CFR 672.20(f) would be amended to authorize the Secretary, in consultation with the Council, to apportion an amount of the halibut PSC limit specified for hook-and-line gear to the DSR hook-and-line fishery in the SEO District as a bycatch allowance. This bycatch allowance would be separate from the bycatch allowance apportioned to the other hook-and-line fisheries.

During the fishing year, therefore, the DSR hook-and-line fishery and the other hook-and-line fisheries would each be supported by a separate bycatch allowance. If the other hook-and-line fisheries reached their specified allowance, they would be closed but the DSR fishery would continue. Likewise, if the DSR fishery reached its allowance, it would be closed but the other hook-and-line fisheries would continue.

The 1990 DSR fishery was exempted from closure by emergency rule when the halibut bycatch allowance allocated to hook-and-line gear was reached, based on staff observations from the Alaska Department of Fish and Game. These observations suggested that fishing practices by DSR fishermen resulted in lower halibut mortality rate relative to other hook-and-line fisheries. These fishing practices include the use of snap-on gear with hooks widely spaced on the groundline, which promote a slower paced

fishery compared to other hook-and-line fisheries in which gangions are narrowly spaced allowing a faster paced fishery.

Although NMFS had no direct information to demonstrate lower mortality rates in the DSR fishery, it recognized that more information might become available if the fishery were exempted during 1990 and if independent observers were placed on board representative vessels to obtain information. NMFS implemented the emergency rule as recommended by the Council (55 FR 33715, August 17, 1990). The 1990 hook-and-line fishery was closed on May 29 upon reaching the halibut allowance. The DSR fishery continued for the remainder of the year. No independent observations were made to determine bycatch mortality rates. NMFS, therefore, was unable to justify exempting the DSR fishery after 1990.

Rather than exempt the DSR fishery, NMFS proposes, therefore, to amend regulations at 50 CFR 670.20(f), which would authorize the Secretary, in consultation with the Council to establish a halibut bycatch allowance for the DSR fishery in the SEO District. Procedures would be established by regulations in which the Council would recommend a halibut bycatch allowance for the DSR fishery during its September meeting. The Secretary would propose this allowance in the Federal Register and comments would be invited. The Council would recommend a final allowance for the DSR fishery during its December meeting. The Secretary would then implement the allowance to govern halibut bycatches in the DSR fishery for the upcoming fishing year. This is the same procedure contained in regulations that presently govern the specification of halibut PSC limits for hook-and-line and trawl gear fisheries.

Establish Directed Fishing Standards for the DSR Fishery

NMFS proposes to establish directed fishing standards for DSR in the SEO District. These standards would govern amounts of DSR considered to be the result of directed fishing for DSR. Amounts of DSR that are less than the specified directed fishing standards would be considered to be bycatch occurring in other directed fisheries. Regulations would be proposed to amend 50 CFR 672.20(g), which is the regulatory section containing directed fishing standards for target groundfish categories other than DSR.

With respect to DSR, directed fishing standards presently are governed by a State of Alaska regulation at 5 Alaska Administrative Code (AAC) 28.170, Possession and Landing Requirements. This regulation applies to vessels in waters off Alaska, including Federal waters, that are licensed under the laws of the State. It stipulates that no Commercial Fishery Entry Commission permit holder may have onboard a commercial

fishing vessel amounts of DSR in excess of 10 percent, by weight, of all other species of fish on board the vessel when the directed taking of DSR is prohibited, or when incidentally caught by gear other than longline, hand troll gear, or mechanical jigging machines. The purpose of the State's regulation is to prohibit directed fishing for DSR by vessels using trawl gear, and to limit amounts of DSR in hook-and-line fisheries when the DSR directed fishery is closed.

NMFS has reviewed bycatch rates of DSR in fisheries for other target species categories. Certain of these categories, e.g. deep water flatfish, "other rockfish", and thornyhead rockfish occur in water much deeper than where DSR typically are found. Unless vessels target on DSR to "top off" catches of other groundfish species, bycatch rates of DSR in fisheries for these target species categories typically are very small compared to bycatch rates in fisheries for other target species categories in shallower water. For example, the 1990 trawl catch of DSR in the SEO District was about 0.5 mt, whereas the reported trawl catch of slope rockfish was 1,500 mt. If all of the DSR catch occurred in the "other rockfish" fishery, the bycatch rate was about 0.03 percent. The State's allowable 10 percent rate is much higher than would be needed to support DSR bycatch needs in these deep water trawl fisheries. Although the natural bycatch rate of DSR associated with deep water fisheries is minimal, these fisheries could result in high bycatches of DSR if vessels "topped off" catches of other groundfish species with up to 10 percent DSR, which would be legal under present regulations governing permissible bycatch amounts (5 AAC 28.170). NMFS recommends, therefore, that the directed fishing standard for DSR be 1 percent of the aggregate amounts of deep water flatfish, "other rockfish", and thornyhead rockfish.

Bycatch rates of DSR would be expected to be higher in catches of other target species categories, e.g. arrowtooth flounder, shallow water flatfish, flathead sole, and Pacific cod, which occur in shallow water depths. Target fisheries by any gear type for these species in the SEO District have not been significant in 1991 or previous years. Empirical data, therefore, on DSR bycatch rates in these fisheries are lacking. Nonetheless, NMFS believes that trawl effort directed at these species could result in substantial bycatch amounts of DSR, because they commingle in the same water depths. NMFS recommends, therefore, that the directed fishing standard for DSR be 10 percent of the aggregate amounts of these species.

To monitor bycatches of DSR on board a vessel, management agencies would add the aggregate round weight equivalent amounts of deep water flatfish, "other rockfish", and thornyhead rockfish retained on board during a trip and multiply the sum times one percent. Then, management agencies would add the aggregate round weight equivalent amounts of other species retained on

board during a trip and multiply the sum by 10 percent. The two sums would then be added and compared to the amount of DSR on board. Amounts of DSR in excess of the cumulative sum would constitute a violation.

The Secretary had reviewed the proposed measures. He preliminarily has determined that they are necessary for fishery conservation and management.

ALTERNATIVES

Establish Authority to Allocate Pacific halibut bycatch allowance to the DSR fishery

Alternative 1 (status quo) - Under this alternative, halibut bycatch allowance would not be specifically apportioned to the DSR fishery in the Southeast Outside District. If the halibut PSC limit specified for the hook-and-line fishery were reached, all directed fisheries, including the DSR fishery in the SEO District, would be closed to vessels using hook-and-line gear.

Alternative 2 - Under this alternative, the Secretary of Commerce, in consultation with the Council, would be authorized to apportion part of the halibut PSC limit specified for hook-and-line gear directly to the DSR hook-and-line fishery in the SEO District as a separate bycatch allowance. The hook-and-line bycatch allowances for the DSR and other hook-and-line fisheries would be separately managed. If the halibut bycatch allowance allocated to hook-and-line gear were reached, the directed DSR fishery by vessels using hook-and-line gear would be prohibited.

Establish directed fishing standards for the DSR fishery.

Alternative 1 (status quo) - Under this alternative, the existing State of Alaska bycatch standard would remain 10 percent, as governed by 5 AAC 28.170 under State of Alaska regulations.

Alternative 2 - Under this alternative, directed fishing standards for DSR would be established in 50 CFR Part 672. 5 AAC 28.170 would no longer apply to vessels fishing for groundfish in the EEZ.

ENVIRONMENTAL IMPACTS OF THE ALTERNATIVES

This analysis considers environmental impacts of alternatives for the above management measures. Physical, biological, and socioeconomic impacts are addressed in this

analysis. Based on the analysis provided below, none of the alternatives are expected to have significant impacts on the environment within the meaning of the National Environmental Policy Act.

Establish Authority to Allocate Pacific halibut bycatch allowance to the DSR fishery.

Under Alternative 1, the directed DSR fishery would be closed if the halibut allowance apportioned to hook-and-line gear were reached. The potential exists, therefore, that the DSR fishery would not be allowed to open on October 1, which is the start of the DSR fishing year under State of Alaska regulations. Supply of fresh fish product to super markets and restaurants would be reduced. Under Alternative 2, the DSR fishery would be supported by a separate halibut bycatch allowance. The amount may be about 10 metric tons of halibut mortality to support a directed DSR fishery of about 450 mt. This fishery would not be closed prior to the opening date specified in State of Alaska regulations, even though the other hook-and-line fisheries may be closed upon reaching the halibut allowance allocated to the other hook-and-line fisheries.

Physical and biological impacts - Physical impacts on the environment that are associated with hook-and-line gear are considered negligible. No differences in impacts on the environment, therefore, are expected from the Alternative 1 relative to Alternative 2. Some loss of hook-and-line gear is expected as a result of normal fishing operations. Gear loss results in future entanglements with active gear, and can result in "ghost fishing", in which fish species are continually hooked until the hooks corrode. Reduced gear loss could be expected under Alternative 1 if the DSR fishery were prematurely closed. An estimated 127 vessels participate to some extent in the DSR fishery. Of these, 40 vessels substantially depend on the DSR fishery, deriving at least 75 percent of their annual fishing income.

Possible biological impacts on the environment by either Alternatives 1 and 2 are those caused by changes in predator/prey relationships among the living marine resources, including groundfish species, as well as marine mammals and birds. Each of these animals is either a predator, i.e., feed on other organisms, or a prey, i.e. is consumed by other organisms. Associated with the DSR fishery are bycatches of halibut, sablefish, other rockfish, and other species. Each of these target species categories prey on other fish species and other living marine life. They are also consumed by these animals. If the DSR fishery is prematurely closed under Alternative 1, larger numbers of these species would remain in the ecosystem as predators and prey. Less processing wastes resulting from DSR

harvests would be discharged into the environment if the DSR hook-and-line fishery is prematurely closed. Under Alternative 2, perhaps all of the DSR TAC would be harvested. Smaller numbers of predator and prey species would remain in the environment. Impacts on the biological environment would be expected, resulting from the continued directed DSR fishery. For example, more processing wastes from DSR harvests would be discharged into the environment.

While data are not available to quantify the above types of physical and biological impacts, NMFS believes they are insignificant and largely unmeasurable given perturbations that occur in the environment.

Socioeconomic impacts

Whether the DSR fishery would be closed under Alternative 1 depends on the time of year when the halibut bycatch allowance might be reached. Under State of Alaska regulations (5 AAC 28.110), the DSR fishing year occurs from October 1 of a calendar year through September 30 of the following calendar year. The first opening occurs during the period October 1 - November 30, or until 43 percent of the quota is harvested. A second opening occurs during the period December 1 - May 15 (of the following calendar year), or until an additional 42 percent of the quota is reached. A third opening occurs during July 1 through September 30, or until the remaining quota is reached.

Certain portions of the DSR TAC likely would have been harvested prior to a closure. Nonetheless, the DSR is economically important to the fishermen in Southeast Alaska, and even small harvest shortfalls represents significant losses.

Under Alternative 1, gross revenue for hook-and-line fishermen would be lost if the DSR fishery is prematurely closed. As an example, when all hook-and-line fisheries were closed on July 8, 1991, about 70 mt of DSR remained of the 425-metric ton TAC specified for DSR in 1991. Assuming an exvessel price of \$0.65 per pound (round weight), this amount would have been worth about \$100,000. Assuming a multiplier of 3 to account for additional earnings by other industries that depend on fishermen's earnings from the DSR harvest, 70 mt of DSR might have been worth \$300,000. This amount represents an amount foregone in 1991 as a result of premature closure caused by the attainment of the halibut PSC limit specified for a year. Each of forty vessels economically depending on the 1991 DSR fishery, might have lost \$2,500. The extent of economic loss varies in any one year depending on the amount of the DSR harvest prior to closure. The above estimate of \$2,500 per vessel probably represents a lower limit on gross revenue lost by each fisherman who participates in the DSR fishery. Conversely, under

Alternative 2, the above value represents a lower limit on gross revenue that might be earned by each fisherman.

Under Alternative 2, the Council might accommodate the need for a halibut bycatch allowance for the DSR fishery by first establishing an overall halibut bycatch allowance for the hook-and-line fisheries. The Council could subtract the amount for the DSR fishery from the overall hook-and-line allowance and recommend the balance for the other hook-and-line fisheries. The Council has recommended, and the Secretary has approved, a 750-mt halibut bycatch allowance for the hook-and-line fishery in 1990 and again in 1991. If this regulatory amendment is approved, and if the Council recommends this amount in the future, NMFS anticipates that the Council could subtract an amount for the DSR fishery. According to industry representatives, 10 mt of halibut mortality would support a directed DSR fishery of 450 mt. If the Council recommends a 10-mt halibut bycatch allowance for the DSR fishery, the balance, i.e., 740 mt would be specified for the other hook-and-line fisheries.

The amount of the PSC limit apportioned to the DSR hook-and-line fishery represents some cost to fishermen who participate in other hook-and-line fisheries if such fisheries are closed earlier as a result. In the example of a 10 mt difference, which is only 1 percent of 750 mt, the cost would be small.

Halibut bycatch allowances are implemented to minimize economic loss to halibut fishermen. If the Council recommends the same halibut bycatch allowance in 1992 and future years that it has recommended in 1990 and 1991, no costs would be imposed on halibut fishermen relative to those years assuming similar market values. The Council could, of course, recommend a halibut bycatch allowance to the DSR fishery that would be in addition to a 750-mt allowance allocated to the other hook-and-line fisheries. Alternative 2 would impose a cost to halibut fishermen to the extent that the DSR allowance exceeds 750 mt.

Establish directed fishing standards for the DSR fishery

Physical and biological impacts - Under Alternative 1, fishing for target species categories such as deep water flatfish, "other rockfish", and thornyhead rockfish that occur in deep water, trawl vessels could achieve a 10 percent bycatch rate of DSR only by targeting DSR. More biomass would be removed from the ecosystem as a result. More bottom trawling might occur if additional trawl effort were directed at additional amounts of DSR, increasing disturbance to the benthos. Additional harvests would cause increased deposition of fish wastes from processing activities. At a 10 percent bycatch rate, harvests may proceed too rapidly for NMFS to monitor the total harvest, which would increase the risk of overfishing DSR stocks. Under Alternative

2, the incentive to target on DSR when fishing for deep water species would be reduced. Less DSR biomass would be removed from the ecosystem as a result. Less directed trawl activity for DSR would occur causing reduced disturbance to the benthos.

Socioeconomic impacts - At an allowed 10 percent bycatch rate, the available DSR TAC could be caught as bycatch in trawl and hook-and-line fisheries. The sum of the 1991 TACs in the Eastern Regulatory Area for deep water flatfish, "other rockfish", and thornyhead rockfish is 10,210 mt. At a 10 percent bycatch rate, trawl vessels could catch and retain the entire DSR TAC. In 1991, the DSR TAC was 425 mt. The DSR TAC could have an exvessel value of \$609,000, assuming an exvessel price of \$0.65 a per pound, round weight. This amount could be foregone by DSR fishermen under Alternative 1. Using a multiplier of 3 as other industries benefit from fishermen's earnings, this about could be worth about \$1.8 million to fishermen and communities in Southeast Alaska. This amount represents potential gross earnings for operators of trawl vessels, assuming equal market prices. Under Alternative 2, NMFS anticipates that very few DSR would be caught while fishing for deep water flatfish, "other rockfish", and thornyhead rockfish. Most of the DSR TAC should be available to support the directed DSR hook-and-line fishery. Some retainable bycatch would be expected in other target fisheries. Opportunities for full utilization of the DSR TAC by hook-and-line vessels would be reduced by actual amounts of DSR bycatches in other target fisheries, which would be subtracted from the DSR TAC.

FINDINGS OF NO SIGNIFICANT ENVIRONMENTAL IMPACT

For the reasons discussed above, neither implementation of the proposed action nor any of the alternatives to that action would significantly affect the quality of the human environment, and the preparation of an environmental impact statement on the preferred action is not required by Section 102(2)(C) of the National Environmental Policy Act or its implementing regulations.

DATE _____

COORDINATION WITH OTHERS

North Pacific Fishery Management Council
P.O. Box 103136
Anchorage, Alaska 99510

LIST OF PREPARERS

Ronald J. Berg
Fishery Management Biologist
Box 21668
National Marine Fisheries Service
Alaska Region
Juneau, Alaska