PUBLIC REVIEW DRAFT

Regulatory Impact Review and Initial Regulatory Flexibility Analysis for Proposed Amendments to Halibut and Sablefish IFQ Fishery Regulations

Date: November 8, 2004

Lead Agency: National Marine Fisheries Service
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Responsible Official: Jim Balsiger, Alaska Regional Administrator

Abstract:

This document is a Regulatory Impact Review (RIR) and Initial Regulatory Flexibility Analysis (IRFA) for seven proposed actions to amend halibut and sablefish Individual Fishing Quota (IFQ) regulations under the authority of the National Marine Fisheries Service. The proposed actions are: (1) allow the use of medical transfers; (2) tighten the criteria allowing the use of hired skippers; (3) add vessel clearance requirements to the Bering Sea and Aleutian Islands sablefish fisheries; (4) amend the sablefish product recovery rate for bled sablefish; (5) amend the halibut block program; (6) amend halibut quota share categories; and (7) amend fish-down regulations.

RIR: None of the proposed actions are expected to have the potential to result in a "significant action" as defined in Executive Order 12866.

IRFA: The proposed actions are not expected to result in adverse impacts on directly regulated small entities.

NEPA: The proposed actions are categorically excluded from the requirement for preparing an environment assessment because they do not have the potential to significantly affect the human environment.

Comment Due Date: Public comments will be taken on this draft analysis through the December 2004 Council meeting. An additional comment period will be announced by NMFS in the proposed rule.

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Table of Contents

Tables and Figures

Acronyms and Abbreviations

ABC	acceptable biological catch
AD	Administrative Determination
AI	Aleutian Islands
BS	Bering Sea
BSAI	Bering Sea and Aleutian Islands
CDQ	Community Development Quota
CFEC	State of Alaska Commercial Fisheries Entry Commission
CFR	Code of Federal Regulations
Council	North Pacific Fishery Management Council
EEZ	exclusive economic zone
EMT	Emergency Medical Transfer
EO	Executive Order
FMP	Fishery Management Plan
FR	Federal Register
ft	feet
GOA	Gulf of Alaska
IFQ	Individual Fishing Quota
IPHC	International Pacific Halibut Commission
IRFA	Initial Regulatory Flexibility Analysis
lb	pound(s)
LOA	length overall
NMFS	National Marine Fisheries Service
NMFS RAM	National Marine Fisheries Service, Alaska Region, Restricted Access Management Program
NOAA Enforcement	National Oceanic and Atmospheric Administration, Enforcement Office
NPFMC	North Pacific Fishery Management Council
PRR	product recovery rate
QS	quota share
RA	Regional Administrator
RFA	Regulatory Flexibility Act
RIR	Regulatory Impact Review
TAC	total allowable catch
VMS	vessel monitoring system

Executive Summary

Proposed amendments to the halibut and sablefish fishery regulations would address several issues pertaining to the Individual Fishing Quota (IFQ) Program for fixed gear Pacific halibut and sablefish fisheries in and off Alaska. The seven actions proposed for this amendment are as follows.

(1) Allow the use of medical transfers.

Current regulations require catcher vessel quota share holders to be aboard the vessel during harvest and offloading of IFQ species. The IFQ program does not have medical transfer provisions. Quota share holders who experience a legitimate medical emergency that prevents them from fishing their quota are left without the ability to temporarily transfer quota shares. In light of loan repayment obligations and financial dependence on quota shares, fishermen who are not able to hire a skipper must often divest themselves of quota shares. This analysis reviews the status quo and an alternative to allow medical transfers. The proposed change requires a regulatory amendment for halibut and sablefish.

(2) Tighten the criteria allowing the use of hired skippers.

As stated above, current regulations require catcher vessel quota share holders to be aboard the vessel during harvest and offloading of IFQ species. An exception was created for persons who received initial allocations of catcher vessel quota share, provided that the person owns the vessel on which the fish are harvested. However, the Council continues to be concerned about alleged abuses of this regulatory provision. This analysis reviews the status quo and alternatives to further limit the use of the hired skipper exception. The proposed change requires a regulatory amendment for halibut and sablefish.

(3) Add vessel clearance requirements to the Bering Sea and Aleutian Islands sablefish fisheries.

Current regulations require fishing location in the sablefish fishery to be self-reported. Concerns about mis-reporting have prompted a need to evaluate options to verify fishing locations. This analysis reviews the status quo and alternatives to add either check-in/check-out or vessel monitoring system requirements. The proposed change requires a regulatory amendment for sablefish.

(4) Amend the sablefish product recovery rate for bled sablefish.

Under the current regulations, a statutory product recovery rate of 0.98 is applied to all intentionally bled sablefish upon landing. This rate is used to calculate the equivalent 'round' weight to be attributed to a harvest allocation. However, industry has proposed that the product recovery rate is inaccurate and therefore may be compromising accurate catch accounting and may provide a disincentive for fishermen to bleed fish, thereby reducing the quality of fish delivered. This analysis reviews the status quo and alternatives to change the product recovery rate from 0.98 to either 0.99 or 1.0 for bled sablefish. The proposed change requires a regulatory amendment for sablefish.

(5) Amend the halibut block program.

At initial implementation, all halibut quota share holdings in a regulatory area that yielded less than 20,000 lb, based on the 1994 total allowable catch levels (TACs), were issued as an indivisible block. The regulations limit the ownership of halibut quota share to two blocks per person in a regulatory area (or one block and any amount of unblocked quota share.) Small blocks may be consolidated into one, up to a maximum quota share limit. However, halibut quota share holders have indicated that existing block and sweep-up restrictions are cumbersome, and changing the restrictions could improve flexibility and efficiency in fishing operations. This analysis reviews the status quo and four alternatives to the existing requirements. One alternative would

increase block limits, two alternatives ease restrictions on blocks yielding greater than 20,000 lb based on the 2003 TACs, and a fourth increases sweep-up limits for halibut in Areas 2C and 3A. The proposed change requires a regulatory amendment for halibut.

(6) Amend halibut quota share categories.

The IFQ program was designed with quota share categories that restrict the harvest of IFQ derived from a particular category of quota share to a specific vessel size class. The regulations currently require that category D quota shares be fished on a vessel of 35 ft LOA or less. However, halibut fishermen in western Alaska have identified safety concerns when fishing in those areas on small vessels, which could be alleviated by relaxing the restrictions on category D quota share. This analysis reviews the status quo and three alternatives to the existing requirements. Two alternatives allow category D quota share to be fished on vessels less than or equal to 60 ft LOA, and one alternative allows category D quota share to be fished on vessels of any size. The proposed change requires a regulatory amendment for halibut.

(7) Amend fish down regulations.

In 1996, the Council adopted a regulatory change that allowed category B quota share to be fished on vessels under 60 ft LOA. At that time, certain quota share holdings in the Southeast Outside District sablefish and Area 2C halibut fisheries were identified as ineligible for "fish down." This was an attempt to ensure category B quota share would be available to vessels 60 ft LOA or greater. However, some fishermen have recently identified this prohibition as unnecessary. This analysis reviews the status quo and an alternative to allow category B quota share to be fished on a vessel of any length. The proposed change requires a regulatory amendment for halibut and sablefish.

1.0 Introduction

This document contains the Regulatory Impact Review (RIR) and Initial Regulatory Flexibility Analysis (IRFA) for seven proposed amendments to regulations that describe management of Pacific halibut Individual Fishing Quota (IFQ) fisheries in and off North Pacific Halibut Convention waters of Alaska, and sablefish IFQ fisheries in the Bering Sea and Aleutian Islands (BSAI) and Gulf of Alaska (GOA) Federal waters off Alaska.

The proposed actions are the result of two solicitations by the North Pacific Fishery Management Council (Council) for proposals from the public in 1999 and 2003. Proposals were reviewed by the IFQ Implementation Team in 1999 and 2003, and recommendations were forwarded to the Council. Seven proposed actions to amend the halibut and sablefish IFQ program were approved for analysis in December 2003. The proposed actions are: (1) allow the use of medical transfers; (2) tighten the criteria allowing the use of hired skippers; (3) add check-in/check-out or vessel monitoring systems to the Bering Sea and Aleutian Islands sablefish fisheries; (4) amend the sablefish product recovery rate for bled sablefish; (5) amend the halibut block program; (6) amend halibut quota share categories; and (7) amend fish down regulations. Each action is addressed individually by chapter, with the RIR analysis preceding the IRFA.

1.1 Management Authority

Management of the Alaska halibut fishery is based on an international agreement between Canada and the United States and is given effect by the Northern Pacific Halibut Act of 1982. The Act provides that, for the halibut fishery off Alaska, the Council may develop regulations, including limited access regulations, to govern the fishery, provided that the Council's actions are in addition to, and not in conflict with, regulations adopted by the International Pacific Halibut Commission (IPHC).

Regulations implementing the commercial IFQ fishery for Pacific halibut and sablefish may be found at 50 CFR 679: Fisheries of the Exclusive Economic Zone Off Alaska, Subpart D – Individual Fishing Quota Management Measures, Sections 679.40 through 679.45.

1.2 Requirements of a Regulatory Impact Review

The RIR is required under Presidential Executive Order (EO) 12866 (58 FR 51735; October 4, 1993). The requirements for all regulatory actions specified in EO 12866 are summarized in the following statement from the order:

> In deciding whether and how to regulate, agencies should assess all costs and benefits of available regulatory alternatives, including the alternative of not regulating. Costs and benefits shall be understood to include both quantifiable measures (to the fullest extent that these can be usefully estimated) and qualitative measures of costs and benefits that are difficult to quantify, but nonetheless essential to consider. Further, in choosing among alternative regulatory approaches agencies should select those approaches that maximize net benefits (including potential economic, environmental, public health and safety, and other advantages; distributive impacts; and equity), unless a statute requires another regulatory approach.

EO 12866 requires that the Office of Management and Budget review proposed regulatory programs that are considered to be "significant." A significant regulatory action is one that is likely to:

- Have an annual effect on the economy of $100 million or more or adversely affect in a material way the economy, a sector of the economy, productivity, competition, jobs, local or tribal governments or communities;

- Create a serious inconsistency or otherwise interfere with an action taken or planned by another agency;
- Materially alter the budgetary impact of entitlements, grants, user fees, or loan programs or the rights and obligations of recipients thereof; or
- Raise novel legal or policy issues arising out of legal mandates, the President's priorities, or the principles set forth in this Executive Order.

1.3 Requirements of a Regulatory Flexibility Analysis

The Regulatory Flexibility Act (RFA), first enacted in 1980, and codified at 5 U.S.C. 601, et. seq., was designed to place the burden on the government to review all regulations to ensure that, while accomplishing their intended purposes, they do not unduly inhibit the ability of small entities to compete. The RFA recognizes that the size of a business, unit of government, or nonprofit organization frequently has a bearing on its ability to comply with a Federal regulation. Major goals of the RFA are: 1) to increase agency awareness and understanding of the impact of their regulations on small business; 2) to require that agencies communicate and explain their findings to the public; and 3) to encourage agencies to use flexibility and to provide regulatory relief to small entities.

The RFA emphasizes predicting significant adverse impacts on small entities as a group distinct from other entities and on the consideration of alternatives that may minimize the impacts, while still achieving the stated objective of the action. When an agency publishes a proposed rule, it must either, 1) "certify" that the action would not have a significant adverse effect on a substantial number of small entities, and support such a certification declaration with a "factual basis", demonstrating this outcome, or, 2) if such a certification cannot be supported by a factual basis, prepare and make available for public review an Initial Regulatory Flexibility Analysis (IRFA) that describes the impact of the proposed rule on small entities.

Based upon a preliminary evaluation of the seven proposed IFQ actions, it appears that "certification" would not be appropriate. Therefore, an IRFA has been prepared for each action. Analytical requirements for the IRFA are described below in more detail.

The IRFA must contain:

1. A description of the reasons why action by the agency is being considered;
2. A succinct statement of the objectives of, and the legal basis for, the proposed rule;
3. A description of, and where feasible, an estimate of the number of small entities to which the proposed rule will apply (including a profile of the industry divided into industry segments, if appropriate);
4. A description of the projected reporting, record keeping, and other compliance requirements of the proposed rule, including an estimate of the classes of small entities that will be subject to the requirement and the type of professional skills necessary for preparation of the report or record;
5. An identification, to the extent practicable, of all relevant Federal rules that may duplicate, overlap, or conflict with the proposed rule;
6. A description of any significant alternatives to the proposed rule that accomplish the stated objectives of the Magnuson-Stevens Act and any other applicable statutes, and that would minimize any significant adverse economic impact of the proposed rule on small entities. Consistent with the stated objectives of applicable statutes, the analysis shall discuss significant alternatives, such as:
    a. The establishment of differing compliance or reporting requirements or timetables that take into account the resources available to small entities;

b. The clarification, consolidation or simplification of compliance and reporting requirements under the rule for such small entities;

c. The use of performance rather than design standards;

d. An exemption from coverage of the rule, or any part thereof, for such small entities.

The "universe" of the entities to be considered in an IRFA generally includes only those small entities that can reasonably be expected to be directly regulated by the proposed action. If the effects of the rule fall primarily on a distinct segment, or portion thereof, of the industry (e.g., user group, gear type, geographic area), that segment would be considered the universe for purposes of this analysis.

In preparing an IRFA, an agency may provide either a quantifiable or numerical description of the effects of a proposed rule (and alternatives to the proposed rule), or more general, descriptive statements if quantification is not practicable or reliable.

Definition of Small Entities

The RFA recognizes and defines three kinds of small entities: 1) small businesses; 2) small non-profit organizations; and 3) and small government jurisdictions. Only small businesses are affected by the seven proposed IFQ actions.

Section 601(3) of the RFA defines a "small business" as having the same meaning as a "small business concern," which is defined under Section 3 of the Small Business Act. A "small business" or "small business concern" includes any firm that is independently owned and operated and does not dominate in its field of operation. The U.S. Small Business Administration (SBA) has established size criteria for all major industry sectors in the U.S., including fish harvesting and fish processing businesses. A business "involved in fish harvesting" is a small business if it is independently owned and operated and not dominant in its field of operation (including its affiliates), and if it has combined annual receipts not in excess of $3.5 million for all its affiliated operations worldwide. A seafood processor is a small business if it is independently owned and operated, not dominant in its field of operation (including its affiliates) and employs 500 or fewer persons, on a full-time, part-time, temporary, or other basis, at all its affiliated operations worldwide. A business involved in both the harvesting and processing of seafood products is a small business if it meets the $3.5 million criterion for fish harvesting operations. A wholesale business servicing the fishing industry is a small business if it employs 100 or fewer persons on a full-time, part-time, temporary, or other basis, at all its affiliated operations worldwide.

National Marine Fisheries Service (NMFS) has defined all halibut and sablefish vessels as small businesses, for the purpose of this analysis. In 2003, 1,338 unique vessels made IFQ halibut landings, and 409 unique vessels made sablefish landings. The number of small entities operating as fishing vessels in the IFQ Program may be deduced from certain restrictions the program places on those vessels. The IFQ program limits the amount of annual IFQ that may be landed from any individual vessel. A vessel may be used to land up to a half percent (0.5%) of all halibut IFQ TAC or up to one percent (1.0%) of all sablefish TAC. In 2003 these limits were 295,050 lb of halibut (headed and gutted weight) and 348,635 lb of sablefish (round weight).

NMFS annually publishes "standard prices" for halibut and sablefish that are estimates of the ex-vessel prices received by fishermen for their harvests. NMFS uses these prices for calculating permit holder cost recovery fee liabilities. In 2003, these price data suggest that the price of halibut might have been about $2.92 per pound of halibut (headed and gutted weight) and $2.36 per pound of sablefish (round weight) (68 FR 71036). In combination, these harvest limits and prices imply maximum vessel revenues of about $1,684,325 for halibut and sablefish taken together. Thus, no vessel subject to these restrictions could have been used to land more than $3,500,000 worth of halibut and sablefish combined in 2003 (the maximum gross revenue

threshold for a "small" catcher vessel, established under RFA rules). Therefore all halibut and sablefish vessels may be assumed to be small entities, for purposes of the IRFAs. These estimates are likely to overestimate the numbers of small entities since they do not take account of income that might have been earned by the vessel in other fisheries or activities, and they do not take account of vessel affiliations.

1.4 Structure of the IFQ Program

The IFQ Program is a limited access system for managing the fixed gear Pacific halibut (*Hippoglossus stenolepis*) and sablefish (*Anoplopoma fimbria*) fisheries in waters of the Exclusive Economic Zone off Alaska.

The North Pacific Fishery Management Council (Council), under authority of the Magnuson-Stevens Fishery Conservation and Management Act and the Northern Pacific Halibut Act of 1982, adopted the IFQ Program in 1991, and implementing regulations were published in the *Federal Register* on November 9, 1993 (58 FR 59375). Fishing began under the program in 1995.

The program was designed to reduce excessive fishing capacity, while maintaining the social and economic character of the fixed gear fishery and the coastal communities where many of these fishermen are based; to allocate specific harvesting privileges among U.S. fishermen; to resolve management and conservation problems associated with "open access" fishery management; and to promote the development of fishery-based economic opportunities in western Alaska. The IFQ approach was chosen to provide fishermen with the authority to decide how much and what type of investment they wished to make to harvest the resource. By guaranteeing a certain amount of catch at the beginning of the season, and by extending the season over a period of eight months, those who held the IFQ could determine where and when to fish, how much gear to deploy, and how much overall investment in harvesting they would make. The development and design of the halibut and sablefish IFQ fishery is described in Pautzke and Oliver (1997), Hartley and Fina (2001a, b), and the annual *Report to the Fleet* (NMFS 2003a, in prep.).

Design of the IFQ Program

The purpose of the program was to provide for improved long-term productivity of the sablefish and halibut fisheries, by further promoting the conservation and management objectives of the Magnuson-Stevens Act and the Halibut Act, and to retain the character and size of the fishing fleets as much as possible. The Council needed to address the issue of protecting small producers, part-time participants, and entry-level participants who may tend to disappear because of potential excessive consolidation under the IFQ program. For this reason the system includes restrictions designed to prevent too many quota shares from falling into too few hands (ownerships caps) or from being fished on too few vessels (vessel use caps).

Other restrictions are intended to prevent the fishery from being dominated by large boats or by any particular vessel class. Quota shares (QS) were initially assigned to vessel categories based on vessel size and kind of fishery operation (Table 1.1). QS are issued specifically to a vessel class and to an IFQ regulatory area. There are eight areas (Figure 1.1) and four vessel categories for halibut, and six areas (Figure 1.2) and three vessel categories for sablefish.

Table 1.1 Vessel categories at initial allocation

Category	Vessel type	Vessel length
A	freezer vessels	any length
B	catcher vessels	> 60 ft
C	catcher vessels	sablefish: ≤ 60 ft halibut: ≤ 60 ft but > 35 ft
D	catcher vessels	halibut: ≤ 35 ft

Figure 1.1 IFQ regulatory areas for Pacific halibut

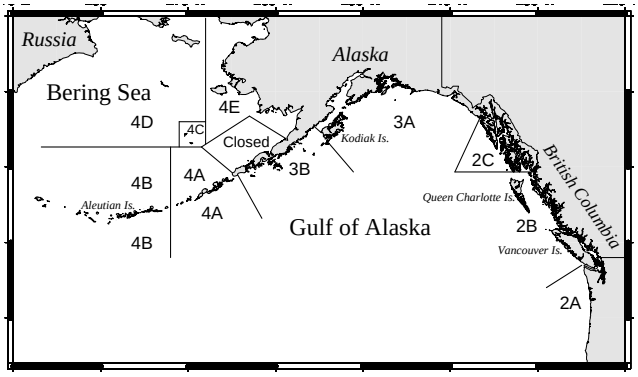
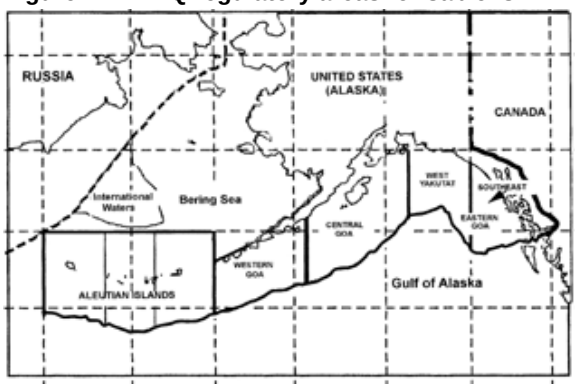


Figure 1.2 IFQ regulatory areas for sablefish



The Council also designed a "block program" to further guard against excessive consolidation of QS and consequent social impacts on the fishery and dependent communities. The block program reduced the amount of QS consolidation that could have occurred under the IFQ program, and slowed consolidation by restricting QS transfers. The following are provisions of the block program.

- All initial QS allocations for both halibut and sablefish that would yield less than 20,000 lb of IFQ in 1994, were placed permanently in a block. Blocks are not divisible and can only be bought or transferred in their entirety.
- A sweep-up provision allows very small blocks to be combined into a fishable amount. For halibut, blocks could be combined if the sum total would not exceed an amount of QS equal to 1,000 lb of IFQ in 1994. The same provision applies to sablefish, except that the poundage cap was set at 3,000 lb. In 1996, the sweep-up consolidation levels for small QS blocks were increased to 3,000 lb for Pacific halibut and to 5,000 lb for sablefish. The base year for determining the pound equivalents was revised to 1996 and the poundages were fixed as QS units equivalents. This was to eliminate any confusion as to the appropriate sweep up level in pounds, which otherwise would fluctuate with changes in the annual TAC.
- Ownership restrictions apply to both halibut and sablefish. A QS holder may hold up to two blocks of QS per IFQ regulatory area. However, if a QS holder holds any amount of unblocked QS for an area, he or she may hold only one block of QS for that area.

An amendment to the IFQ program in 1996 relaxed the restrictions on using QS across vessel categories. The 'fish down' amendment allowed QS deriving from larger catcher vessels to be fished on smaller vessels, with an exception in Southeast Alaska:

Category B	authority to harvest IFQ species on a vessel of any length (except in halibut Area 2C or sablefish Southeast Outside District, unless the IFQ derives from blocked QS units that result in less than 33,321 halibut or 33,271 sablefish QS units)
Category C	authority to harvest IFQ species on a vessel less than or equal to 60 ft LOA
Category D	authority to harvest IFQ halibut on a vessel less than or equal to 35 ft LOA

Another design feature of the IFQ program was to require that most vessels in the fishery remain operated by their owners. To maintain this predominantly "owner-operated" nature of the fishery, the program provides that:

- Only QS holders who received their quota upon initial issuance may hire skippers to fish the resulting IFQ. In Southeast Alaska (for halibut, Area 2C and for sablefish, east of 140 degrees west longitude), only corporations or partnerships may hire masters.

- When QS is transferred, it may only be transferred to an entity that received an initial award of QS or to an individual who is a qualified crew member. If QS is transferred to an individual, that individual must be on board while the IFQ is being fished.

History of IFQ Amendments

Since initial implementation, the Council has made numerous amendments to the halibut and sablefish IFQ program which have relaxed the restrictions that enacted the Council's policy. This may be reasonable given that the Council, in adopting the IFQ program, recognized the need to place tight restrictions on what was then a revolutionary approach to fisheries management with unknown economic and social consequences. As the fishery adjusted to the new program, the design was modified to maximize efficiency without compromising the overall goals. However, the Council should remain aware of the cumulative effects of each incremental adjustment on its original intent for the program.

Community Development Quota (CDQ) Compensation. This regulatory amendment authorized a one-time trade of QS/IFQ received under the CDQ compensation formula between parties in different regulatory areas. The Council subsequently exempted the CDQ compensation "pieces" of QS/IFQ from the provisions of the Block amendment, accept for freezer/longline vessels, and allowed for a one-time trade of these pieces exempt from the vessel category designations. Final rule was effective in February 1996.

Catch Sharing Plan. In December 1995 the Council approved a Catch Sharing Plan for the IPHC subareas of Area 4 in the BSAI. The action allowed shifts, without plan or regulatory amendment, in the percentages of halibut distributed to the various areas. Final rule took effect in March 1996. In 1998, the Catch Sharing Plan was amended to remove Areas 4A and 4B, and to apply an annual framework for allocations to Areas 4C, 4D, and 4E, based on historic apportionment. Due to lack of stock separation among the areas, the IPHC sets a catch limit for combined Areas 4C, 4D, and 4E. Final rule took effect in March 1998. In 2001, the Council blurred the boundary between Areas 4D and 4E by allowing CDQ halibut allocations in Area 4D to be harvested in Area 4E. Final rule took effect in March 2003.

Multiple Area Fishing. An interim rule effective August 25, 1995, allowed vessels to fish IFQs in multiple areas without offloading, so long as there is an observer onboard.

Catcher Vessel QS Use on Freezer Boats. Council reaffirmed in June 1994 that catcher vessel QS/IFQ for sablefish (but not halibut) can be used on freezer vessels so long as no processed IFQ product is on board for that trip. This allowed freezing of non-IFQ species such as Pacific cod and rockfish, while harvesting sablefish catcher vessel QS on a freezer vessel. Final rule became effective in July 1996.

Fish down of QS. In January 1996, the Council approved an amendment wherein catcher vessel QS could be used on vessels of the same size class or smaller. It addresses the need for increased flexibility of halibut and sablefish QS transfers for Category B, C, and D vessels to alleviate a scarcity of large to medium block sizes in some areas. It allows the use of larger vessel (Category B and C) QS on smaller category vessels (vessels 60 ft LOA and smaller), except that in halibut Area 2C and sablefish Southeast Outside, fish down of category B QS is allowed only for blocks less than 5,000 lbs (based on 1996 TACs). Final rule became effective August 1996.

Sweep-up of QS Blocks. In April 1996, the Council increased the sweep-up levels of halibut and sablefish QS blocks to 3,000 lbs for halibut and 5,000 lbs for sablefish. The increased level of consolidation of very small, blocked QS was approved to provide economically fishable amounts for small QS holders, crew members, and new entrants to the fishery, without overly increasing consolidation or creating large blocks. Final rule became effective for December 1996.

Slime and Ice Deduction. In December 1996, the Council approved a regulatory amendment to create standard deductions for ice and slime for halibut and sablefish, to standardize accounting of harvests. The Council recommended standard deductions for halibut and sablefish of 0% (washed) and 2% (for ice and slime). Final rule became effective December 1997.

Longlining of Pots for Sablefish in Bering Sea. In April 1996, the Council approved a regulatory amendment to allow the use of pot longlines in the Bering Sea for sablefish. Pots no longer have to be on single buoyed lines, and are compatible with the regulations as they exist in the Aleutians Islands. Final rule became effective in September 1996.

Emergency Transfers to Heirs. In September 1995, the Council approved authorization for immediate transfer of IFQ to a surviving spouse, with leasing provisions for a period of three years. Final rule took effect September 9, 1996. In June 1997, the Council amended the provision to allow transfer of QS, upon death of the QS owner, to any heir of the deceased's estate under a 3-year emergency provision.

Hired Skipper Requirements. In October 1997, the Council required a 20% minimum interest in vessels for QS holders wishing to hire skippers. The Council also grandfathered QS holders who had employed a hired skipper on or before April 17, 1997 to continue to use a hired skipper at the ownership level they had used prior to April 17, 1997. Any QS holder grandfathered under this provision will lose their right to hire a skipper if they purchase or otherwise acquire ownership or control of additional QS after September 23, 1997. Final rule was effective June 1999. In November 1998, the Council modified the hired skipper provisions to allow QS holders wishing to hire skippers to establish indirect vessel ownership through corporate ties. Final rule became effective May 2002.

Increased Quota Share Use Level in BSAI. In June 1996, the Council approved a regulatory amendment to increase the BSAI halibut QS use cap to 1.5%, from the existing limit of 0.5% of the total amount of halibut QS for regulatory areas 4A, 4B, 4C, 4D, and 4E, combined. Final rule became effective in March 1997.

Halibut Charter IFQ Program. In April 2001, the Council approved a program that would incorporate the charter sector into the commercial halibut IFQ program. Among its many provisions and restriction, QS would have limited transferability between the charter and commercial sectors. The proposed rule is under development by NMFS.

Community QS Purchase. In April 2002, the Council approved 42 Gulf of Alaska coastal communities as eligible to hold commercial halibut and sablefish catcher vessel QS in Areas 2C, 3A, and 3B, for lease to community residents. Specified rural, coastal communities with no road access, populations of less than 1,500, and documented participation in the halibut and/or sablefish fisheries, would be allowed to hold a maximum of 3% of the Area 2C, 3A, or 3B halibut QS and 3% of the Southeast Outside, West Yakutat, Central GOA, or Western GOA sablefish QS in each of the first seven years of the program, with a 21% total cap by area, unless modified earlier through a review process specified by the Council. Final rule became effective in April 2004.

1.5 Description of the Fishery

A detailed description of the fishery can be found in the *Report to the Fleet*, prepared annually by the Restricted Access Management Program at NMFS Alaska Region (NMFS 2003a, in prep.). The information below is taken from these reports.

In 2003, approximately 59 million pounds of halibut were allocated among halibut QS holders in the eight halibut IFQ regulatory areas. 29 million pounds of sablefish were allocated among sablefish QS holders in the six sablefish IFQ regulatory areas. 97% of the halibut harvest was achieved across all areas, and 88% of

the sablefish harvest. Table 1.2 shows the number of unique QS holders by regulatory area, for halibut and sablefish. While 102 persons hold Area 4E halibut QS, no IFQs are awarded to this area as the entire Area 4E allocation is made to the western Alaska Community Development Quota Program.

Table 1.2 Number of Persons holding halibut and sablefish QS in 2004. NOTE: Counts are not additive across areas. Data as of September 15, 2004. Source: NMFS RAM.

Halibut	Area	Number of Persons
	2C	1,413
	3A	1,885
	3B	558
	4A	275
	4B	107
	4C	62
	4D	49
	4E	102
	TOTAL	**3,349**

Sablefish	Area	Number of Persons
	Southeast Outside	461
	West Yakutat	281
	Central GOA	421
	Western GOA	172
	Aleutian Islands	97
	Bering Sea	112
	TOTAL	**874**

1,338 vessels participated in the halibut fishery in 2003, and 409 sablefish vessels participated in the sablefish fishery (some of these vessels may have participated in both fisheries). Table 1.3 illustrates the relative size of participating vessels in the halibut and sablefish fisheries, across the regulatory areas. In the halibut fishery, less than 10% of the annual harvest in any regulatory area is allocated to vessels that are allowed to process onboard (i.e., those with category A QS). In the sablefish fishery, 38-56% of QS is allocated to freezer longliner vessels in the Bering Sea, Aleutian Islands, and western GOA, although in the central and eastern GOA, only 7-16% of sablefish IFQ may be processed onboard.

Table 1.3 Vessels participating in the halibut and sablefish fisheries in 2003, by size and area. NOTE: Counts are not additive across areas. Source: NMFS RAM.

Halibut	Area	Number of Vessels			
		0-35'	36-60'	61-125'	126' or higher
	2C	257	427	22	0
	3A	175	437	96	2
	3B	37	208	78	5
	4A	29	45	36	4
	4B	3	17	21	3
	4C	5	10	7	0
	4D	0	9	16	1

Sablefish	Area	Number of Vessels			
		0-35'	36-60'	61-125'	126' or higher
	Southeast Outside	6	204	38	2
	West Yakutat	1	87	46	1
	Central GOA	7	129	63	5
	Western GOA	2	36	29	7
	Aleutian Islands	4	15	19	6
	Bering Sea	4	20	14	6

Relevant details of the halibut and sablefish fisheries are also discussed under the analyses of the individual actions, in the following chapters.

2.0 Action 1: Amend regulations to allow medical transfers

Numerous appeals for medical hardship have been raised with the Council and NMFS since the IFQ program was implemented in 1995. Stories of injured or sick IFQ holders being transported on and off fishing vessels to meet "owner-on-board" requirements have been reported. Without the allowance to temporarily transfer their IFQs, injured QS holders often must sell their QS to generate income. Creative accounting has been reported anecdotally whereby an injured QS holders will sell his QS to a friend or family member, with the understood provision that those QS would be sold back to the original QS holder once he recuperated to where he could be aboard the fishing vessel. Such activity is believed to circumvent the intent of the program.

A proposal to allow medical transfers was adopted for analysis by the Council in December 2003. The proposed action would also assist the fleet in achieving optimum yield of the halibut resource (National Standard 1), whereby halibut or sablefish IFQs would not be left unharvested because of regulatory prohibition.

2.1 Problem and management objectives for the action

The Council adopted the following problem statement for this action in June 2004.

The IFQ program does not have medical transfer provisions. Quota share holders who experience a legitimate medical emergency that prevents them from fishing their quota are left without the ability to temporarily transfer quota shares. In light of loan repayment obligations and financial dependence on quota shares, fishermen who do not have the ability to hire a skipper are left with no option but to divest themselves of quota shares.

2.2 Management Action Alternatives

Alternative 1. No action.

The regulations currently allow only a very narrow exemption allowing for the transfer of QS in an emergency medical situation that occurs at sea during a fishing trip. An emergency transfer only allows the permit to be temporarily fished by someone other than the permit holder. Typically, the exception applies to a situation requiring a medical evacuation or other rescue scenario where an IFQ cardholder must be transferred from the vessel during fishing. The pertinent regulations at 50 CFR 679.42(d) read as follow:

> (d) Emergency waiver. The requirement of paragraph (c) of this section for an individual IFQ card holder to be aboard the vessel during fishing operations and to sign the IFQ landing report may be waived in the event of extreme personal emergency involving the IFQ user during a fishing trip. The waiving of these requirements shall apply only to IFQ halibut or IFQ sablefish retained on the fishing trip during which such emergency occurred.

Emergency medical transfers (EMT) were originally prohibited due to the overarching IFQ policy of maintaining a fishing fleet of owner-operators by narrowly restricting leasing provisions. Initial proposals for a medical transfer provision were rejected based on the potential for abuse and the lack of technical expertise at NMFS to determine medical disability.

During the implementation of the IFQ program, affected parties petitioned for an emergency transfer provision analogous to the State of Alaska's program found at 20 AAC 05.1740. The State provision sets up an elaborate system requiring a qualitative determination of "illness, disability, or other unavoidable hardship" under the administrative authority of the Commercial Fisheries Entry Commission (CFEC). The

State also allows for further qualitative determinations of severity of injury, "good faith," and "extraordinary circumstances."

The Council and some affected parties generally agreed that the State system had been subject to abuse and required an inordinate amount of administrative resources to maintain. Nonetheless, advocates argued compellingly that emergency transfers were necessary to address situations where QS holders would be unable to be on board a vessel during fishing due to serious medical conditions such as cancers, broken bones, etc.

The IFQ Implementation Team expressed great concern that flagrant abuses of the State system should be avoided under the IFQ program; however, they recognized that genuine emergencies do arise. In April 1995, the Team unanimously recommend the following policy statement to the Council. The Team also unanimously recommended that the emergency transfer involve IFQ and not QS.

> "If a person can demonstrate to the Regional Director that due to some unforeseen accident, injury, or illness, he has been rendered incapacitated in his ability to longline, he may be allowed a one-time medical transfer provided the RD feels there is insufficient time before the season's closure for recovery to harvest all or part of his quota share. Consideration by the RD will take into account vessel size and fall weather limitations, accordingly.
>
> Medical documentation shall be satisfactory to NMFS in making impairment determination. Chronic injuries such as "bad backs," or aging ailments such as arthritic crippling, loss of vision or hearing, do not constitute grounds for medical transfer. Incarceration does not constitute grounds for medical transfer. The onetime transfer provision may last for a period of no more than two fishing seasons. Decisions by the RD to allow transfers are final and not subject to further appeal.
>
> Justification: The integrity of the IFQ system. If we can not produce a mechanism for medical transfer that has clear legitimacy, then the Council should consider either no transfer of QS or revisit leasing as a provision."

In September 1995, the Council recommended that the Regional Administrator framework a number of regulatory changes, including allowing the use of medical transfers. The Council recommendation was to request that the RA use his discretionary authority to grant medical transfers. Proposed regulatory language stipulated that ". . . the Regional Director may approve the application for transfer of a person's IFQ if it can be demonstrated that the person is presently unable to participate actively in the IFQ fisheries because of illness, disability, or other unavoidable hardship of a temporary, unexpected, and unforeseen nature." The draft regulation would have provided that the "transfer" will remain "effective until the circumstance that made the transfer necessary are over. . ." The RA disapproved the action in March 1996, because NMFS did not have the expertise or the resources to make emergency transfer provisions a viable part of the IFQ program using discretionary authority.

Alternative 2. Allow medical transfers.

Policy Element	Comment
Eligibility for Benefit: Only individual halibut or sablefish QS holders to whom one or more catcher vessel IFQ permit(s) have been issued for any given fishing year, and only those who may not retain the services of a master (hire a skipper) to fish his/her annual IFQ permits, may apply for an Emergency Medical Transfer (EMT).	*Benefit is intended only for those who have no other options for getting their IFQ permit fished; e.g. "2nd Generation" QS/IFQ holders, individuals holding QS/IFQ in Area 2C and SE, and IFQ Loan Program borrowers.*
Nature of Benefit: Upon approval of an application to receive an EMT, an eligible individual QS/IFQ permit holder may transfer his/her annual IFQ permit to an eligible recipient; i.e., only an individual who is otherwise eligible to receive catcher vessel QS/IFQ by transfer (individuals who received QS upon initial issuance and individuals who are "IFQ Crewmembers").	*Transferee must be eligible to receive catcher vessel IFQ by transfer*.
Limitation: Approval of an application for an EMT will be valid only during the calendar (permit) year for which the permit(s) is issued. An application for an EMT in subsequent years, for the same medical condition, will not be approved unless the medical professional attests that there is a reasonable likelihood of recovery. An individual halibut or sablefish quota share holder will not be granted an emergency medical transfer if the individual has been granted an emergency medical transfer in: Option 1. three of the previous six years Option 2. two of the previous five years	*The maximum three-year limit is consistent with the "surviving spouse" language; chronic or irreversible conditions may not justify an EMT for more than one year.*
Justification for an EMT: An application for an EMT will not be approved unless the applicant demonstrates that: • s/he is unable to participate in the IFQ fishery(ies) for which s/he holds IFQ permit(s) because of a severe medical condition that precludes such participation; or, • s/he is unable to participate in the IFQ fishery(ies) for which s/he holds IFQ permit(s) because of a severe medical condition involving a family member that necessitates the IFQ permit holder's full-time attendance.	*The EMT will only be approved for a <u>medical</u> condition; no other situation (e.g., economic hardship, required government service, family obligations, etc.) will suffice.*
Evidence of Qualifying Medical Condition: An application for an EMT must contain information required by NMFS and be submitted on a form provided by NMFS. To be approved, the application must be accompanied by an affidavit presented by a certified medical practitioner. The affidavit must describe the medical condition affecting the applicant and must attest to the inability of the applicant to participate in the IFQ fishery(ies) for which s/he holds IFQ permit(s) during the IFQ season, or (in the case of a family member) that describes the necessity for the IFQ permit holder to tend to an immediate family member who suffers from the medical condition. It must include acknowledgment of the requirements precedent to approval of an application for an EMT. An affidavit so executed will be assumed to be dispositive. Option 1. licensed medical doctor (including local representatives) Option 2. State or Federal certified medical professional	*NMFS would prepare an affidavit form for the medical practitioner" to review and sign; the form would explain the rule and the consequences of the professional's assertions. "Medical Professional" suggests that the practitioner need not be a physician – but s/he must be certified as a medical professional (e.g., a village Health Aide would qualify). This section will benefit from a regulatory definition of "Certified Medical Professional" for these purposes, if selected.*
Consideration of Applications: Applications for EMTs, together with appropriate evidence (described above), must be submitted to the Regional Administrator (RA) or his/her designee on a form provided by the RA. The RA/designee may request additional information before taking action on the application. If the application is approved, the applicant and the transferee will be so notified and the IFQ permit(s) will transfer. If the application is not approved, the applicant will receive an Administrative Determination (AD) that sets out the reason(s) the application is not approved. An applicant whose application is denied by an AD may request reconsideration of the AD and submit additional evidence. Action taken by the RA on an applicant's Request for Reconsideration is the Final Agency Action.	

Policy Element	Comment
Consideration of Appeals: Any time an EMT application is denied by RAM, such denial would be formally set out in an Initial Administrative Determination. As with all such determinations, it could be appealed to the NMFS office of Administrative Appeals.	

This proposed action addresses IFQ program policy to have owner/operators holding and fishing QS and IFQs. National Standard 1 (achieve optimum yield of the halibut resource, while preventing overfishing) is also a factor in this proposed action.

Experience in the management and prosecution of the IFQ fisheries suggests that a medical transfer system could be implemented that would avoid the unnecessary administrative burden and minimize the potential for abuse associated with the initial proposals. Revising the EMT requirements would allow QS holders to retain possession of their QS during brief periods of disability where they might otherwise have to sell their QS to meet financial obligations.

In October 2003, the IFQ Implementation Team reviewed proposals to amend the IFQ program and reiterated its 1995 recommendation that provisions for medical transfers be examined for inclusion in the halibut and sablefish IFQ program. The team noted that short term emergency situations are not likely to result in abuse. NMFS, NOAA Enforcement, and IPHC staff worked with interested team members and industry in October 2003 to develop language for the Council to consider for this provision. The Council adopted further Advisory Panel refinements in June 2004.

Proposed criteria for medical transfers no longer includes the use of discretionary authority by the Regional Administrator, but would require a signed affidavit by a medical professional who attests to a particular medical situation. The following draft language, adopted by the Council for review in June 2004, blends the need for medical transfer provisions with policy and enforcement needs to limit the potential for abuse that could otherwise undermine the program (e.g., *de facto* leasing under the guise of medical transfers).

During initial review in October 2004, the Council added options to two elements of the proposed EMT program. One added an option for a more restrictive period during which an EMT would be allowed. The second added option addresses the degree of flexibility the Council wishes to allow for the type of medical expertise it wishes to accept for the affidavits of medical necessity. and legal guidance regarding the type of medical practitioner that should be required to affirm the nature of the medical condition. At issue is Council intent regarding the flexibility allowed in the medical transfer provisions, i.e., legitimate emergency applications may not be granted if the provisions are too tight and abuse may occur if the provisions are too broad.

Staff suggests consideration of the following change to one of the EMT elements, which requires that the medical expert certify that the family member's condition warrants care taking, and not that. the IFQ holder is <u>the</u> person who should be the caretaker:

Evidence of Qualifying Medical Condition: An application for an EMT must contain information required by NMFS and be submitted on a form provided by NMFS. NMFS will not approve an application unless it is accompanied by the declaration of a certified medical practitioner. The declaration must include acknowledgment of the requirements precedent to approval of an application for an EMT. A declaration so executed will be assumed to be dispositive.

In the case of a medical condition affecting the applicant, the declaration must document the medical condition and must verify that the applicant is unable to participate in the IFQ fishery(ies) for which he or she holds IFQ permit(s) during the IFQ season because of the medical condition.

In the case of a medical condition affecting an immediate family member of the applicant, the declaration must document the medical condition and describe the care that the family member requires. In addition, the applicant must verify that he or she will provide care for that individual and that the applicant is unable to participate in the IFQ fishery(ies) for which he or she holds IFQ permit(s) during the IFQ season because of the medical condition.
Option 1. licensed medical doctor (including local representatives)
Option 2. certified medical professional

2.3 Expected effects of Alternative 1

Alternative 1 would make no allowance for temporary transfers of halibut or sablefish IFQs due to medical emergencies. Under the status quo, QS holders must either sell their QS or forego the economic benefits of those QS for the duration of their medical injury. Private arrangements to sell and then repurchase the "same" QS may be viewed as circumventing Council intent.

2.4 Expected effects of Alternative 2

Alternative 2 would implement a procedure for allowing temporary transfer of annual IFQ permit(s) by injured QS holders to an eligible recipient. That recipient ostensibly would pay an amount of money for that privilege, thus recouping potential economic losses to the original QS holder which were associated with the inability of the injured QS holder to fish that year. Alternative 2 would benefit the injured QS holder and the temporary recipient. It would result in higher utilization of the halibut or sablefish IFQ allocation than under the status quo.

While the CFEC allows medical transfers, using its program as a proxy for the IFQ program should be done with caution; State fisheries are only a few weeks long and State medical transfers are of a more limited duration than the more than nine month commercial IFQ season. However, its system is informative to the development of a proposed EMT program for the IFQ program.

During 2002, the CFEC approved 686 out of 719 emergency transfer requests. The requests and approvals each represent less than two percent of 36,000 annual fishing permits and vessel licenses issued by the CFEC. Emergency transfer hearings are held and decided by paralegals. CFEC commissioners review each paralegal and hearing officer decision and may order further review and hearings on their own motion or upon the request of an affected party, and may subsequently modify, reverse or affirm the decisions. CFEC staff advised that a more "liberal" law/regulation providing for emergency transfers would lead to higher numbers of emergency transfer requests and approvals and a less "liberal" law/regulation would lead to fewer (Source: K. Schelle).

The CFEC website describes the details of the program (http://www.cfec.state.ak.us/faq/transfer.htm). Limited entry permits may be emergency transferred if the permit holder is prevented from fishing due to illness, disability, required government service, or other unavoidable hardship of a temporary, unexpected, and unforseen nature. If the permit holder chooses to work at another job or do something else rather than fish, it is usually not grounds for an emergency transfer. Emergency transfers of permanent permits may also be granted while the estate of a deceased permit holder is being settled.

If the basis for an approved emergency transfer continues into the following year, the Commission may grant an emergency transfer for the second year. Requests to emergency transfer interim-use permits in limited

fisheries are subject to slightly more lenient standards of hardship since their holders do not have the option of permanently transferring the permits. There are no special provisions in the law authorizing emergency transfer of permits due to old age or chronic medical problems.

Administrative, Enforcement and Information Costs

There are no additional enforcement costs for the proposed action. The caseload of appeals has been identified as a potential issue for NMFS.

2.5 Conclusions

Table 2.1 summarizes the net benefits of the alternatives. Alternative 2 is expected to increase the optimum yield of halibut and sablefish by allowing additional IFQ allocations to be harvested, which are currently lost due to injuries that do not allow the QS holder to physically be aboard the fishing vessel. Lost fishing income to temporarily injured QS holders would be mitigated from income from leased annual IFQ permits.

Beneficiaries of the proposed action would include those injured fishermen who are unable to physically board a fishing vessel to harvest their IFQs for the duration of their injury. Other beneficiaries are those eligible recipients of QS transfers who would temporarily harvest those IFQs during that recovery time.

Minor administrative costs of the program would be recovered by annual cost recovery fees for the entire program. Alternative 2 best meets the objectives of the proposed action. None of the proposed actions are expected to have the potential to result in a “significant action” as defined in Executive Order 12866.

Table 2.1 Summary of the cost and benefit analysis of Action 1.

	Alternative 1	**Alternative 2** Allow medical transfers
Impacts to the resource	None	None
Benefits	No change in benefits.	This amendment may help to achieve full utilization of the optimum yield of halibut and sablefish by allowing IFQ allocations to be taken through the transfers of IFQs by injured IFQ holders. Nearly 4,300 halibut and sablefish QS holders would be eligible for these temporary transfers. Under the amendment, lost fishing income for temporarily injured QS holders could be partially mitigated by income from leased annual IFQ permits. The number of requested transfers is not known, but is expected to be relatively infrequent, given the requirement of medical certification. The potential benefits from this amendment will be far short of the level of significance under EO 12866. In addition to the direct economic benefits to injured fishermen making use of the transfers, the amendment will serve to promote stable, owner-operated businesses in the halibut and sablefish IFQ fisheries.
Costs	No change in costs.	The administrative costs for this amendment are anticipated to be negligible. If allowed to become misused, the transfers could be used as a loophole to bypass owner-on-board requirements.
Net benefits	No change in net benefits.	Net benefits are expected to increase.
Action objectives	Does not address issue of lost revenues.	Would meet the objectives of the proposed action better than the status quo.
E.O. 12866 significance	Does not appear to be significant.	Does not appear to be significant.

2.6 Initial Regulatory Flexibility Analysis

This IRFA describes the impact of the proposed alternatives for allowing the use of medical transfers on small entities. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

Numerous petitions to NMFS and the Council have been received since initial implementation of the halibut and sablefish IFQ program in 1995 to allow the temporary transfer of IFQs due the inability of the IFQ holder to physically be onboard the vessel due to medical reasons as those IFQs were being fished. The Council previously recommended that NMFS administer such a program, but this did not occur due to legal reasons. A proposal to allow medical transfers was received again in 2003 and was adopted for analysis. A new approach is being developed. The problem statement is discussed in detail in Section 6.1, above.

Description and estimate of small entities

This action could directly affect 3,350 halibut QS holders and 875 sablefish QS holders (Table 1.2). At present, NMFS does not have sufficient ownership and affiliation information to determine precisely the number of small entities in the IFQ program or the number that would be adversely impacted by the present action. While no records have been kept over the years, NMFS and Council staff are contacted by roughly 12 QS holders each year for information on medical transfers in the IFQ program. However, staff can not

estimate, or even guess, how many QS holders did not contact staff and would have requested a medical transfer should such a provision have been available. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Alternatives considered and their impact on small entities

This analysis reviews the status quo and an alternative to allow medical transfers. The alternatives are explained in Section 2.2, and the following summary of impacts on small entities is from the discussion in Sections 2.3 and 2.4.

Alternative 1 is the no action alternative and would not have any associated adverse economic impacts on directly regulated small entities. Alternative 2 would allow medical transfers by requiring an applicant to document his medical emergency with NMFS. A medical professional also would be required to file an affidavit that describes the medical condition affecting the applicant and attests to the inability of the applicant to participate in the IFQ fishery(ies) for which s/he holds IFQ permit(s) during the IFQ season. In the case of a family member, the affidavit would describes the necessity for the IFQ permit holder to tend to an immediate family member who suffers from the medical condition.

Description of compliance requirements

An Emergency Medical Transfer form would be required.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

3.0 Action 2: Amend hired skipper provisions

A proposal to tighten the regulations for the use of hired skippers was adopted for analysis by the Council in December 2003 because NMFS continues to see abuse of the hired skipper provisions through informal transactions. Action 2 would require documentation of vessel ownership upon which IFQs would be harvested by a hired skipper for a period of time to be specified under four options. As described in NMFS (2003), a central policy of the IFQ program is that those who hold catcher-vessel QS and receive annual IFQ permits should, in time, exercise the harvest privilege themselves. This is the "owner-on-board" policy[1]. The IFQ program is designed so that eventually all catcher-vessel IFQ eventually will be fished by the QS/IFQ holders.

An element of the program is that, during a transitional period, some persons may (and others must) designate a "master" (or "hire a skipper") to actually do the fishing authorized by their annual IFQ permit. Under the current regulations, the IFQ permit holder may not hire a skipper unless the IFQ permit holder holds an ownership interest of at least 20% of the vessel upon which the IFQ is to be fished by that skipper (an exception to this rule results in a small number of IFQ permit holders allowed to hold less than 20%). One way of looking at this provision is that it is a "grandfather" provision for B vessel owners who were able to hire someone else to run the boats they owned before the IFQ program was implemented. However, the new entrants who take their place must be on board when the fish are caught as individuals depart from the fishery, and as corporations and partnerships dissolve over time.

3.1 Problem and management objectives for the action

The Council adopted the following problem statement in June 2004.

A key element of the IFQ program is the requirement for catcher vessel QS holders to be on board the vessel during harvest and offloading of IFQ species. The Council intended this requirement to assure that catcher vessel QS would continue to be held by professional fishermen after the initial allocation process instead of being acquired by investment speculators. While sole proprietor commercial fishing businesses were unlikely to have difficulty complying with this restriction, the Council recognized that many fishing firms may use hired masters to operate their vessels. The Council did not wish to constrain this option for small businesses and therefore created an exception (codified at 50 CFR 679.42(i) and (j)) for individuals who received initial allocations of catcher vessel QS, provided that such an individual (a) owns the vessel on which the IFQ halibut or sablefish are harvested and (b) is represented on the vessel by a master in his employment. The Council continues to be concerned about alleged abuses of the regulatory provision that allows vessel owners who received QS at initial allocation to hire skippers to harvest their IFQs without having to be onboard the vessel.

3.2 Management Action Alternatives

Alternative 1. No action.

The ability to hire a skipper to fish catcher vessel IFQ remains an important, if controversial, element of the IFQ program. The Fishery Management Plan for Groundfish of the Gulf of Alaska and the Fishery Management Plan for the Groundfish Fishery of the Bering Sea and Aleutian Islands Area (FMPs) and IFQ implementing regulations prohibit all leasing of IFQ derived from QS in categories B, C, and D (QS that authorizes the harvest but not the processing of IFQ species on board the vessel). Further, regulations require that holders of such QS be aboard the vessel harvesting IFQ species during all fishing operations.

[1] The policy does not apply to "freezer vessel" (category A) shares, which may be leased without restriction.

An exception to this owner-aboard provision allows initial recipients of B, C, or D category QS to employ a hired skipper to fish his or her IFQ provided that the QS holder can document ownership of at least 20% of the vessel on which the IFQ is being fished. This exception was created to allow fishermen who had operated their fishing businesses in this manner before the IFQ Program was implemented to have some flexibility to continue operating this way under the IFQ Program. While the IFQ Program promotes an owner-operator fixed gear fishery for sablefish and halibut, this exception allows initial recipients of QS to remain ashore while a hired skipper harvests their IFQ. By limiting this exception to initial recipients, the Council designed the hired skipper provision to expire with the eventual transfer of all QS out of the possession of initial recipients.

Revised regulations at CFR 679.42 Limitations on use of QS and IFQ, require an initial recipient of certain categories of QS who wishes to hire a skipper to fish the IFQ derived from that QS to own a minimum of 20 percent interest in the harvesting vessel. This 20 percent minimum ownership requirement does not apply to a QS holder who hired a skipper prior to April 17, 1997, continues to own that vessel at no less percentage of ownership interest than was held on April 17, 1997, and has not acquired additional QS through transfer after September 23, 1997. This action was necessary to promote the Council's intent to provide for an owner-operator catcher vessel fleet in the halibut and sablefish fixed gear fisheries off Alaska and is intended to further the objectives of the IFQ program.

The rationale for setting the minimum percentage of vessel ownership at 20 percent was to allow for most equal interest partnerships, such as those between spouses. The Council included a grandfather provision only to pre-existing arrangements regarding levels of both vessel ownership and QS holdings.

Under existing regulations, the practice will eventually disappear as current QS/IFQ holders are replaced by new entrants who are required to be on board when the IFQ is harvested. Until that happens, however, it appears that an increasing percentage of the annual IFQ will be harvested by persons other than the QS/IFQ holder (even though many such persons are either owners of the entities that "hire" them, or are IFQ holders in their Individual capacity). The larger issue of hired skippers addresses how the Council wishes to affect the demographics of the fleet - as active participant ("owner on board") vs. passive owner ("absentee landlord").

The following information is excerpted from NMFS (2003). Hired Skipper activities are reported as the total amount of landings by Hired Skippers, expressed in absolute numbers and as a percent of the TAC. For 2002, halibut Hired Skippers harvested 21,683,000 pounds (or 36% of the overall TAC) and sablefish Hired Skippers harvested 9,848,000 pounds (33% of the overall TAC). Note that there are two types of entities that hire skippers to harvest their catcher vessel IFQ, including:

- "Non-Individual QS Holders" who must designate a master (hire a skipper) to fish their annual IFQ permit. In 2002, these entities held 25% of the halibut catcher vessel quota, and 30% of the sablefish catcher vessel quota.

- "Individual QS Holders" who may hire a skipper to fish their annual catcher vessel IFQ permit (except in halibut Area 2C and sablefish Area SE) . In 2002, these individuals held 42% of the halibut catcher vessel quota (not including Area 2C), and 33% of the sablefish catcher vessel quota (not including SE).

Table 3.1 (NMFS (2003a) reports the percent of catcher vessel quota that held by Individual QS holders and their hired skipper category. QS holders (who were corporations and who must hire a skipper to harvest IFQs) held 25% of halibut and 30% of sablefish QS. QS holders who may hire a skipper totaled 42% of halibut and 33% of sablefish QS. QS holders who may not hire skippers (i.e., must fish the IFQ themselves as "owners-on-board") totaled the remaining 33% of halibut and 37% of sablefish QS. Because all Non-Individual QS Holders whose IFQ permits were fished were required to hire skippers to do the fishing,

the focus of this proposed action is on the Individual QS holders. These individuals hold 42% of halibut and 33% of sablefish QS.

Table 3.1 Type of QS Holder and Percent of Catcher Vessel Quota Held - Year-end 2002.

Type of QS Holder	Halibut (% of Catcher-Vessel Quota)	Sablefish (% of Catcher-Vessel Quota)
Non-Individual QS Holders (who must hire a Skipper to fish IFQ)	**25%**	**30%**
Individual QS Holders (who may hire a Skipper to fish IFQ)	**42%**	**33%**
Individual QS Holders (who may not hire a Skipper to fish IFQ)	**33%**	**37%**

Note to table: Catcher vessel Quota includes category B, C, and D shares

Table 3.2 displays those numbers for Individuals QS Holder with IFQ permit landings, and who were eligible to hire skippers. Two clear trends are evident from the following tables:

- the numbers of both Non-Individual and Individual QS Holders who may Hire Skippers has been declining;

- the numbers of Hired Skippers (and the amount of IFQ harvested by them) is increasing.

Table 3.2 Individual QS Holders who were Eligible to Hire Skippers, had IFQ Landings, and Hired Skippers; and Number of Skippers Hired.

	1998	1999	2000	2001	2002	% change (1998-2002)
Halibut						
Individual QS Holders with IFQ Permit Landings	1005	982	942	849	845	-16%
Individual QS Holders with Landings who Hired Skippers	110	116	125	137	135	+23%
Number of Skippers hired by Individual QS Holders	98	110	135	147	143	+46%
Sablefish						
Individual QS Holders with IFQ Permit Landings	232	214	195	185	179	-23%
Individual QS Holders with Landings who Hired Skippers	46	53	56	64	65	+41%
Number of Skippers hired by Individual QS Holders	45	55	71	80	82	+82%

NOTES:
- In any given year, a significant number (30% to 40%) of QS holders do not fish their IFQ permit (but the amount of Quota held by these "non-fishers" is very small – less than ½ of 1% of the TAC)
- Individuals "eligible to hire skippers" hold catcher vessel QS other than 2C halibut or SE sablefish

Regulations that govern the IFQ program require that all "new" catcher vessel QS holders must be on board the vessel when the IFQ is being fished; they may not hire a skipper. Further, individuals who purchase (or refinance) QS using the IFQ loan program administered by NMFS Financial Services lose their ability to hire skippers (to date, there have been 78 individuals who have forfeited their ability to hire skippers by becoming borrowers under the program). These regulatory requirements make it inevitable that, over time, there will be an increasing number of individual QS holders who may not hire skippers to fish their IFQ. In the long term, all catcher vessel QS/IFQ held by individuals will be fished by those individuals.

Tables 3.3 and 3.4 present information about the use of hired skippers during the 2002 halibut and sablefish IFQ seasons and as an average for the five seasons, 1998 - 2002.

Table 3.3 Halibut - Hired Skipper Information. Weights are in thousands of pounds. Halibut pounds are expressed in net (headed and gutted) weight. Source: NMFS 2003a.

	2002	Average (1998 - 2002)[1]
Total IFQ TAC[2]	59,010	56,943
Amount and Percent of TAC Harvested by Skippers hired by Non-Individual IFQ Permit Holders, with IFQ landings	13,970 (23.7%)	13,468 (23.6%)
Amount and Percent of TAC Harvested by Skippers hired by Individual IFQ Permit Holders, with IFQ landings	7,713 (13.1%)	6,129 (10.8%)
Number of Non-Individual Entities with IFQ Permit Landings (by one or more Hired Skippers)	121	128
Number and Percent of Eligible Individual Catcher Vessel IFQ holders with IFQ Landings who chose to Hire Skipper(s)[3]	135 (16.0%)	125 (13.5%)

[1] Skipper data for 1995 through 1997 are excluded because hired skipper rules and policies in effect prior to 1998 are inconsistent with later years.
[2] Total IFQ TACs include all QS categories but do not include allocations to the Community Development Quota (CDQ) Program or pounds from adjustments from prior year fishing.
[3] "Eligible Individual" IFQ permit holders are persons who hold catcher vessel IFQ other than Southeast Outside sablefish, which must be fished by the permit holders.

Table 3.4 Sablefish - Hired Skipper Information. Weights are in thousands of pounds. Sablefish pounds are expressed in round weight. Source: NMFS 2003a.

	2002	Average (1998 - 2002)[1]
Total IFQ TAC[2]	29,388	29,087
Amount and Percent of TAC Harvested by Skippers hired by Non-Individual IFQ Permit Holders, with IFQ landings	6896 (23.4%)	2,580 (11.1%)
Amount and Percent of TAC Harvested by Skippers hired by Individual IFQ Permit Holders, with IFQ landings	6,575 (22.4%)	7,185 (24.7%)
Number of Non-Individual Entities with IFQ Permit Landings (by one or more Hired Skippers)	72	82
Number and Percent of Eligible Individual Catcher Vessel IFQ holders with IFQ Landings who chose to Hire Skipper(s)[3]	65 (36.3%)	57 (28.4%)

[1] Skipper data for 1995 through 1997 are excluded because hired skipper rules and policies in effect prior to 1998 are inconsistent with later years.
[2] Total IFQ TACs include all QS categories but do not include allocations to the Community Development Quota (CDQ) Program or pounds from adjustments from prior year fishing.
[3] "Eligible Individual" IFQ permit holders are persons who hold catcher vessel IFQ other than Southeast Outside sablefish, which must be fished by the permit holders.

Table 3.5 demonstrates that, a large number of "Non-Individual Entities" that were required to hire a skipper to fish their IFQ hired one or more individuals who were, in whole or in part, owners of the entity.

Table 3.5 Non-individual entities with catcher vessel QS/IFQ whose hired skipper(s) are owners of the hiring entity in 2002. 'Non-individual' ownership data[1] as of May 2003. Source: NMFS 2003a.

A.	Number of Non-Individual Catcher Vessel QS Holders with IFQ Halibut Permit(s)	167
	• Number of Skippers Hired by (A)	190
	• Number and Percent of Skipper(s) that were also an Owner of the Entity in (A)	82 (43%)
B.	Number of Non-Individual Catcher Vessel QS Holders with IFQ Sablefish Permit(s)	112
	• Number of Skippers Hired by (B)	110
	• Number and Percent of Skipper(s) that were also an Owner of the Entity in (B)	56 (51%)

[1] NOTE: These data represent a minimum percentage of skipper "ownership" in the QS Holding entity; "ownership" was checked only to the direct, first level of shareholders, partners, etc. Additional skipper ownership interests may be "hidden" under second, third, or deeper "levels" of ownership.

Table 3.6 shows that a large number of the Skippers (49% of halibut skippers and 61% of sablefish skippers) that were hired by Non-Individual QS holders during 2002 were participants in the fisheries as Individual QS holders.

Table 3.6 Skippers hired by non-individual QS holders who, in 2002, hold IFQ permits in their individual capacity. Data on skipper QS holdings as of year-end 2002. Source: NMFS 2003a.

		Halibut	Sablefish
A.	Number of Non-Individual catcher-vessel QS Holders	166	109
B.	Number of Skippers hired by (A)	190	110
C.	Number and percent of Skippers in (B) who held QS in their Individual Capacity	93 (49%)	67 (61%)

Alternative 2. To use the hired skipper exception, a QS holder must demonstrate at least a 20% vessel owner interest in the vessel to be used and have continuously owned the vessel as documented by the contemporary abstract of title for the previous:

a. 6 months
b. 12 months
c. 24 months
d. year to date plus previous calendar year

Option. Allow for replacement of vessel in case of a constructive loss

Action 2 was prompted by an apparent concern that the ownership "loophole" that allowed a QS holder to acquire a nominal ownership interest in a vessel was not completely closed by the Council when it decided in 1998 that a QS holder must demonstrate a vessel ownership interest of at least 20 percent before NMFS/RAM would issue an IFQ landing card to a person other than the named QS/IFQ holder. Current regulations do not require documentation of ownership.

Alternative 2 would revise the regulations to add a restriction on the QS holders who would hire a skipper to harvest their IFQs. That restriction would place a minimum time period for which the QS holder must have continuously owned the vessel in which he/she has a 20 percent owner interest. This additional restriction is intended to eliminate the opportunity for QS holders to form short-term agreements which transfer vessel ownership for the duration of a fishing trip(s), thus circumventing Council intent for having an owner-operator fleet.

During initial review, the Council added an option to address commercial fishing vessels that are lost at sea, using regulatory language specifically addressing those vessels lost to fire or sinking. The language was adapted from regulatory language implementing the American Fisheries Act for lost vessels, under §679.4.

During its October 2003 meeting to review proposals, the IFQ Implementation Committee reconfirmed its 1999 recommendation as follows. "The committee recognized the merit of addressing fairness issues, and recommended that leasing restrictions are fundamental to the IFQ program and recommended no change to expanding leasing/hired skipper allowances." The committee recommended that criteria be established to tighten compliance with the 20 percent ownership requirement.

3.3 Expected effects of Alternative 1

Alternative 1 would not provide additional limits on opportunities for QS holders to form short-term agreements to transfer vessel ownership temporarily, which allows the use of hired skippers on those vessels. No data is available to distinguish the number of temporary transfers specifically intended to circumvent Council intent compared with other vessel ownership transfers.

3.4 Expected effects of Alternative 2

Alternative 2 would implement tighter restrictions for the use of hired skippers in the halibut and sablefish IFQ fisheries. These restrictions would limit the number of QS holders who could hire a skipper. It does not place additional restrictions of who may be hired as a skipper. Alternative 2 would encourage the owner-operator component of the fleet, as has been identified as a main feature of the IFQ program.

The Council identified four options for tightening the hired skipper regulations under Alternative 2. The proposed actions would require that to use the hired skipper provision, a QS holder would be required to have continuously owned the vessel as documented by the contemporary abstract of title for the previous:

a. 6 months
b. 12 months
c. 24 months
d. year to date plus previous calendar year.

No data is available to analyze the expected effects of each of the above options. However, one may assume that more QS holders would be restricted from hiring skippers on their vessels as the period of documented ownership of a vessel increases. A longer time period would lessen the opportunities for "absentee owners" and result in more QS being put on the market. A smaller time period would allow owners who hire skippers to extract annual rent from their QS rather than sell the QS.

NMFS has no data at present to indicate how many QS holders own their own vessels for the four proposed options. Nor does NMFS have data to analyze the amount of financial burden that would occur under any of the four proposed time periods for which QS owners must have continuously owned their vessels in order to hire a skipper to harvest their QS.

During initial review in October 2004, the Council added an option to address replacement of lost vessels, as a result of public testimony. The effect of the option would be to continue to allow the use of hired skippers by QS owners who lose their vessels due to fire or sinking. This a rare circumstance, but the Council has made similar provisions in other programs.

Administrative, Enforcement and Information Costs

NMFS staff has identified that Alternative 2 (under any option) would provide an enforcement tool (documentation of ownership) to curb abuse because it has been difficult to verify ownership under current regulations. Nearly all vessels in the IFQ fisheries are Federally licensed. For those vessels, there is a US Abstract of Title issued by the US Coast Guard that will be required to be filed with RAM under Alternative 2. This is not the same as the Certificate of Documentation that is issued through the National Vessel Documentation Center, and the latter may not substitute for the abstract of title.

For those vessels that are not Federally licensed, the IFQ holder may provide the State of Alaska vessel registration, although this document does not contain a list of owners or their percentage of ownership. Ownership information may be obtained from the bill of sale, although information provided in the bill of sale can not be verified. Further, the ownership requirement would be applied through the period for which the hired skipper privilege is used. In summary, regulatory requirements for documenting ownership could be intrusive and difficult to provide if the Council intends the program to be limited so as to prevent abuse. If the Council intends the program to be more loosely designed, then the current regulations may suffice.

3.5 Conclusions

Table 3.7 summarizes the net benefits of the alternatives. Action 2 addresses IFQ program policy. As noted in Section 3.1, a key element of the IFQ program is the requirement for catcher vessel QS holders to be on-board the vessel. By tightening the regulations for the use of hired skippers through this amendment, the Council goal of on-board QS holders in the halibut and sablefish fisheries will be advanced. The direct economic benefits to be achieved under this alternative are unknown, but will certainly not meet the level of significance under EO 12866.

Those most directly affected by the proposed action would include those QS holders hiring skippers and the hired skippers themselves. The amendment is likely to enhance the halibut and sablefish IFQ fisheries by furthering achievement of the Council's stated goals of favoring an owner-operated fleet. Owner-operators and crew may benefit from QS placed on the market due to a tightening of the hired skipper provision if some current QS holders lose the privilege of hiring a skipper and have to divest themselves of QS. Increased administrative costs associated with determining whether the 20 percent ownership requirement comports with the selected time period would be recovered in the annual fee. Despite the attempt at providing a greater enforcement tool, documentation requirements, depending on how they are specified, may continue to be used as a loophole to owner-on-board requirements.

No data are available to analyze the effects of the four specific time periods proposed under Alternative 2. The Council may select from among them based on public testimony and personal judgement as to which option best meets its management objectives.

None of the proposed actions are expected to have the potential to result in a "significant action" as defined in Executive Order 12866.

Table 3.7 Summary of the cost and benefit analysis of Action 2.

	Alternative 1	**Alternative 2** QS holder must have continuously owned the vessel for: a) 6 months; b) 12 months; c) 24 months; d) year to date plus previous calendar year to hire a skipper.
Impacts to the resource	None	None
Benefits	No change in benefits.	The economic benefits resulting from this amendment are unknown. However, it is likely to further the Council goal of owner-operated vessels in the halibut and sablefish IFQ fisheries. Owner-operators and crew may benefit from QS placed on the market due to a tightening of the hired skipper provision.
Costs	No change in costs.	Some QS holders could lose the privilege of hiring a skipper and may have to divest themselves of QS. Despite this amendment, hired skippers may be continue to be used by a portion of QS holders, circumventing the owner-on-board requirements.
Net benefits	No change in net benefits.	Net benefits are expected to increase.
Action objectives	Does not address issue of lost revenues.	Would meet the objectives of the proposed action better than the status quo.
E.O. 12866 significance	Does not appear to be significant.	Does not appear to be significant.

3.6 Initial Regulatory Flexibility Analysis

This IRFA describes the impact of the proposed alternatives for tightening the criteria allowing the use of hired skippers on small entities. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

NMFS staff are not able to effectively administer and enforce current regulations that stipulate a specific level of ownership in a vessel upon which a skipper would be hired to harvest IFQs. The problem statement is discussed in detail in Section 6.1, above.

Description and estimate of small entities

This action could directly affect 4,300 halibut and sablefish QS holders who hold category B, C, or D QS (Table 1.2). Additional crew would also be affected by the proposed action. At present, NMFS does not have sufficient ownership and affiliation information to determine precisely the number of small entities in the IFQ program or the number that would be adversely impacted by the present action. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Alternatives considered and their impact on small entities

This analysis reviews the status quo an alternative to further limit the use of the hired skipper exception. The alternatives are explained in Section 3.2, and the following summary of impacts on small entities is from the discussion in Sections 3.3 and 3.4.

Alternative 1 would maintain the current 20 percent ownership requirement to hire a skipper to harvest IFQs. Current regulations do not require legal documentation of ownership in the vessel.

Alternative 2 would amend the regulations to require documentation of ownership of the vessel to use the exception. Options are under consideration that would require continuous ownership between 6 months and two years to hire a skipper.

Description of compliance requirements

No additional recordkeeping and reporting requirements are associated with this action.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

4.0 Action 3: Add vessel clearance requirements

A proposal to implement vessel clearance requirements for the sablefish IFQ fishery in the Bering Sea (BS) and Aleutian Island (AI) management areas was adopted for analysis by the Council in December 2003. The rationale for requiring check-in/check-out or a vessel monitoring system is that killer whale depredation, increased costs of traveling to the BSAI, and relatively low catch rates in the BSAI may result in harvesters fishing in the western Gulf of Alaska (GOA) and claiming harvests occurred in the BS or AI are likely to result in misreporting. The proposal suggests that, if widespread, misreporting may affect the sablefish stock assessment and the resulting total sablefish ABC, and area apportionments of ABCs. However, there is no evidence that suggests widespread misreporting is: (1) occurring; (2) affecting sablefish biomass estimates; or (3) compromising the total sablefish allowable biological catch (ABC) or quotas.

4.1 Problem and management objectives for the action

A number of management issues relate to the proposed action to implement vessel clearance requirements in this fishery. The IFQ fleet has been unable to harvest the sablefish TAC in the BS and AI; 2003 landings were the lowest relative to the total allowable catch (TAC) in the 9 year history of the IFQ program (Table 4.1).

Killer whale depredation has been recognized as one reason for low sablefish harvests in the BSAI. NMFS amended the program in 1996 to allow the use of longline pots in the BS because of whale depredation on longline sablefish vessels engaged in directed fishing for sablefish. Sablefish hook-and-line fishermen in the BS faced increasing predation of hooked sablefish by killer whales.

Killer whale depredation has not been identified as a biological issue for the sablefish stocks by NMFS. Dr. Michael Sigler, senior author of the sablefish stock assessment, reported to the analyst that sablefish mortality due to killer whale depredation has not been quantified, and would be difficult to accurately estimate. A measure of depredation frequency is the average number of sablefish longline survey stations affected by killer whale depredation. From 1996-2003, 6 of 16 stations (38 percent) in the eastern BS and 1 of 14 stations (7 percent) in the AI had evidence of sablefish depredation.

A second issue is how misreporting may affect the methodology for setting sablefish TACs in the BS and AI. Dr. Sigler concluded that if misreporting occurred, it would not affect biomass estimates or the ABC for sablefish in the Alaska EEZ as long as the total amount of catch is reported correctly. Misreporting, however, might affect area apportionments of ABCs. Area allocation of ABC is based on survey and fishery catch rates by area. Catch rates are higher in the western GOA than the BS and AI, so misreporting area would inflate nominal catch rates for the BS and AI and affect the area ABCs. Misreporting of GOA catches as BSAI may increase the area apportionment for BSAI and decrease the apportionment for the GOA. For example, even if 30 percent of western GOA catch was misreported as BSAI catch during 1999-2003, the 2004 ABC would have been 4.3 percent higher for the BSAI and 1.7 percent lower for the GOA than the recommended

Table 4.1 Sablefish quotas and landings (1995-2003) (Source: NMFS)

BS Year	Total Catch lb	Allocation lb	Percent Landed
2003	1,207,792	2,557,336	47
2002	1,169,896	1,701,951	69
2001	796,729	1,375,670	58
2000	685,682	1,296,305	53
1999	626,749	1,181,666	53
1998	579,861	1,146,392	51
1997	572,775	970,024	59
1996	703,905	970,024	73
1995	998,319	1,410,944	71
AI Year	**Total Catch lb**	**Allocation lb**	**Percent Landed**
2003	1,966,385	4,100,556	48
2002	1,710,000	3,373,920	51
2001	1,749,556	3,306,900	53
2000	1,774,827	3,215,189	55
1999	1,095,189	1,825,409	60
1998	882,172	1,825,409	48
1997	1,137,282	1,587,312	72
1996	1,168,272	1,587,312	74
1995	1,917,783	2,910,072	66

ABCs. A very high level of misreporting would result in less than a 5 percent error.

A third issue relates to enforcement challenges in the remote fishing areas of the BSAI. For over 30 years, the International Pacific Halibut Commission (IPHC) has implemented vessel clearance requirements for the halibut hook-and-line fishery in Area 4 (comprising much of the BS and AI sablefish management areas) (Figure 1.1). Area management for halibut is a finer scale than for sablefish in the BSAI (i.e., the BSAI is divided into more and smaller geographic areas).

The following is excerpted from IPHC (1996). Vessel clearance procedures were implemented in Area 4 (BSAI) during the 1960s and 1970s to help assure that vessels were, in fact, in the BSAI rather than fishing in the GOA and claiming their catch from the BSAI. This enforcement device was needed because the BSAI required longer running time from major ports of landing and because fishing conditions tended to be more difficult in the BSAI. This was particularly important in Area 4B (AI).

Clearance requirements for halibut in the BSAI are listed in Appendix 1. The IPHC has added ports, required clearances within an regulatory area, and most recently allowed the use of vessel monitoring systems (VMS). The IPHC has a voluntary arrangement with processing plants to FAX the clearance forms to the IPHC offices. Enforcement uses those clearance reports as an after-the-fact enforcement tool. VMS reports are monitored by NOAA Enforcement.

Vessel clearance requirements have not been implemented for the halibut IFQ fishery in the GOA because there are fewer incentives to misreport. Killer whale depredation occurs less than in the BSAI, GOA sablefish TACs are more frequently taken, and enforcement has a greater presence in the GOA.

Price differentials between sablefish prices in the BS and AI and in the GOA has been cited by industry as another reason for misreporting of BSAI sablefish as having been taken in the GOA. Table 4.2 demonstrates the higher price for sablefish paid in the GOA than in the BSAI. Representative QS prices also show a potential higher value of GOA QS transfer price in 2003 (see Table 6.3 and the text in Section 6.3 for more explanation).

Table 4.2. Ex-vessel prices in the fixed gear sablefish fisheries, 1997-2001 ($/lb, round weight).

Year	GOA	BSAI
1997	2.437	2.358
1998	1.680	1.619
1999	2.014	1.945
2000	2.659	2.037
2001	2.248	1.842

In June 2004, the Council adopted the following problem statement for Action 3.

Due to killer whale depredation, increased costs, and relatively low catch rates, the sablefish fisheries in the BSAI offer unique challenges to harvesters. Due to concerns over harvest occurring in other regulatory areas, options to verify fishing locations need to be developed.

4.2 Management Action Alternatives

Alternative 1. No action.

Alternative 1 would not implement additional reporting or monitoring requirements in the Bering Sea and Aleutian Island sablefish fisheries.

Alternative 2. Add vessel clearance requirements to the BS and AI sablefish regulations.

Option 1. Add check-in/check-out for the Aleutian Islands and Bering Sea sablefish fishery (e.g., in Dutch Harbor, Adak, St Paul, St George, Akutan, and Atka)

Option 2. Require VMS when fishing in the Aleutian Islands and Bering Sea sablefish fishery

Alternative 2 would implement reporting and/or monitoring requirements in the BSAI sablefish fisheries to decrease the likelihood of misreporting of sablefish harvests from the GOA as BSAI landings. During Initial review, the Council added Akutan and Atka to the list of communities in which check-in and check-out would be required

4.3 Expected effects of Alternative 1

The expected effects of Alternative 1 are unknown, because the level of misreporting of GOA sablefish harvests as having been taken in the BS or AI is unknown. However, there is no evidence that misreporting is occurring and there are no known impacts associated with taking no action.

4.4 Expected effects of Alternative 2

The expected effects of Alternative 2 are unknown, because the level of misreporting of GOA harvests as BS or AI harvests is unknown. However, it is known that vessel clearance requirements are burdensome to both the IFQ fleet and management agencies. It is expected that costs for BS and AI sablefish QS holders would increase under either Option 1 (check-in/check-out) or 2 (VMS) from increased compliance with requirements to harvest sablefish from the area for which the IFQs are assigned by those fishermen currently fishing out of compliance with those requirements. Check-in/check-out requirements for halibut include transiting to the port where clearance will be obtained and allowing the person contacted to confirm visually the identity of the vessel. If applied to sablefish, the IFQ holder would incur additional time, fuel, and opportunity costs for his/her next best use (e.g., more fishing).

Costs associated with VMS (Option 2) may be greater than under Option 1 (check-in/check-out). Generally, a VMS unit costs $2,000 and $5/day to transmit. Those costs may be incurred by the vessel owner, QS holder, the plants, and NMFS depending on whether Option 1 or 2 would be selected. If both are selected such that either one may be used to clear an area, VMS is likely to cost more. VMS is a better method for enforcing vessel clearances, but is more expensive.

Table 4.3. Federal Fishery Permitted Vessels with VMS Endorsements (2004)

Area	FFP Number	VMS Number	Percent
AI	33	9	27
BS	33	17	52

Some of the participants in the sablefish IFQ fishery already have a VMS endorsement on their Federal Fisheries Permits (FFP) to comply with Steller sea lion avoidance measures in the groundfish fisheries. Table 4.3 shows the numbers of BS and AI IFQ sablefish vessels that currently possess an FFP and VMS endorsements. of 33 sablefish IFQ vessels with a BSAI FFP in the AI, 9 (or 27 percent) already have a VMS endorsement. Of 33 sablefish IFQ vessels with a BSAI FFP in the BS, 17 (or 52 percent) already have a VMS endorsement. These vessels would not have an additional cost associated with Alternative 2, assuming that they elect to use VMS instead of transiting to a port for visual confirmation of clearance from or to another fishing area. Actual costs are not known.

Some of the participants in the sablefish IFQ fishery also participate in the Area 4 halibut IFQ fishery. Table 4.4 shows that 85 unique BS and AI IFQ sablefish holders also hold Area 4 QS. These participants already are subject to vessel clearance requirements for the halibut fishery. Their costs for clearing areas for their sablefish IFQ harvests would be mitigated to the degree that they already must clear the halibut IFQ harvests. Actual costs are not known.

Table 4.4. Number of BSAI sablefish QS holders who also hold halibut QS in Area 4 (Source: NMFS)

QS Category	BSAI Sablefish Number	BSAI Sablefish+Area4 Halibut Number	Percent
A	38	13	34
B	79	47	60
C	59	35	59
Total	85		

Administrative, Enforcement and Information Costs

NOAA Enforcement supports Alternative 2 and recommends that vessel clearance requirements also be implemented for sablefish in the GOA. Vessel clearance is an effective monitoring and enforcement tool that has been implemented in the halibut fisheries since the 1960s. The IPHC has not identified an enforcement problem with misreporting in Areas 2C or 3 halibut fisheries which warrant vessel clearance requirements in those areas. While the halibut vessel clearance program has voluntary compliance by fishing plants and dedicated IPHC staff to monitor the associated paperwork, NMFS does not have the personnel at this time to handle the paperwork associated with check-in/check-out requirements. From a staffing perspective, NMFS would prefer VMS as a vessel clearance requirement.

4.5 Conclusions

Table 4.5 summarizes the net benefits of the alternatives. The economic benefits from Alternative 2 are unknown, although there is no obvious potential for economic significance under EO 12866. The management benefits are likely to result from an effective enforcement tool for the regulatory requirement that sablefish landings come from the area to which the associated IFQs are assigned. As noted in Section 4.1, misreporting the area of sablefish catch may affect area apportionment of ABC's.

Vessel clearance requirements would increase costs to approximately 100 QS holders who do not already have VMS endorsements for other groundfish fisheries. Costs of implementation, administration, and enforcement to NMFS would be covered by the IFQ fee. Alternative 2 would meet the objectives of the proposed action better than the status quo, but it is unclear whether an enforcement problem (misreporting) is occurring.

None of the proposed actions are expected to have the potential to result in a "significant action" as defined in Executive Order 12866.

Table 4.5 Summary of the cost and benefit analysis of Action 3.

	Alternative 1	**Alternative 2**
Impacts to the resource	None	None
Benefits	No change in benefits.	The economic benefits from Alternative 2 are unknown since the magnitude of misreporting is also unknown. Management benefits are likely to result from an effective enforcement tool for the sablefish IFQ fishery. Misreporting the area of sablefish catch may affect area apportionment of ABC's and the amendment would resolve concern over this management issue.
Costs	No change in costs.	Vessel clearance requirements would increase costs to approximately 100 QS holders. Costs to NMFS would be covered by the IFQ fee.
Net benefits	No change in net benefits.	Net benefits are expected to increase because of more effective enforcement of current regulations.
Action objectives	Would not enhance enforcement.	Would meet the objectives of the proposed action better than the status quo, but it is unclear whether an enforcement problem (misreporting) is occurring.
E.O. 12866 significance	Does not appear to be significant.	Does not appear to be significant.

4.6 Initial Regulatory Flexibility Analysis

This IRFA describes the impact of the proposed alternatives for adding check-in/check-out or vessel monitoring systems to the Bering Sea and Aleutian Islands sablefish fisheries on small entities. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

The BS and AI sablefish fixed gear TACs have not been fully harvested during the ten years of the IFQ program. A number of reasons fo harvest shortfalls are described in more detail in Section 6.1, above. The industry has expressed concern that a lack of enforcement may have resulted in misreporting of harvests taken in the GOA as having come from the BSAI.

Description and estimate of small entities

There are 163 unique persons that hold QS in the AI and/or BS and GOA (Table 4.6). Of these, 42 unique persons hold QS in all three areas, 34 unique persons hold QS in the AI and GOA, and 43 unique persons hold QS in both the BS and GOA for a total of 119 directly affected small entities under Alternative 2. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Table 4.6 Sablefish QS holders by area.

Total	**AI**	**BS**	**GOA**
42	X	X	X
7	X	X	
34	X		X
15	X		
43		X	X
22		X	
163	98	114	119

Note: AI/BS/GOA columns not additive

Alternatives considered and their impact on small entities

This analysis reviews the status quo and alternatives to add either check-in/check-out or vessel monitoring system requirements. The alternatives are explained in Section 4.2, and the following summary of impacts on small entities distilled is from the discussion in Sections 4.3 and 4.4.

Alternative 1would result in no change to the regulations.

Alternative 2 would implement either or both check-in/check-out or VMS requirements to the sablefish IFQ fishery in the BSAI as a disincentive to misreporting of catch areas.

Description of compliance requirements

The operator of any vessel that fishes for sablefish in the BS or AI management area must obtain a vessel clearance before fishing. An operator obtaining a vessel clearance must obtain the clearance in person from the authorized clearance personnel and sign the NMFS form documenting that a clearance was obtained, except that when the clearance is obtained via VHF radio, the authorized clearance personnel must sign the form documenting that the clearance was obtained. Any vessel that carries a transmitting VMS transmitter while fishing for sablefish in the BS or AI management area and until all sablefish caught in any of these areas is landed is exempt from the clearance requirements, provided that: (a) The operator of the vessel complies with NMFS' vessel monitoring system regulations. The operator of the vessel notifies NOAA Fisheries Office for Law Enforcement within 72 hours before fishing and receives a VMS confirmation number. Appendix I identifies the type of regulations in place for halibut that are envisioned under this action.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

5.0 Action 4: Amend sablefish product recovery rate

A proposal for a regulatory change to the product recovery rate (PRR) for bled sablefish from 0.98 to 1.00 was adopted for analysis by the Council in 2003. In October 2004, the Council added an alternative to change the PRR from 0.98 to 0.99. A product recovery rate is the ratio expressed as a percentage of the weight of processed product divided by the round weight. The proposal suggested that the current PRR for sablefish is not reasonable, has no conservation benefit, is a disincentive to improved quality (i.e., to bleeding sablefish), and is an unfair reduction in sablefish IFQs. The proposed action would effectively eliminate the PRR for bled sablefish. However, NMFS staff reports that accurate catch reporting is the main objective in applying PRRs to landed fish, and that no action is needed because the PRR of 0.98 is accurate.

5.1 Problem and management objectives for the action

In June 2004, the Council adopted the following problem statement for Action 4.

Inaccurate product recovery rate provisions may be a disincentive for fishermen to bleed fish thereby reducing the quality of fish delivered and accurate catch reporting may be compromised under the current application of the product recovery rate for bled sablefish.

5.2 Management Action Alternatives

Alternative 1. No action.

Accurate catch accounting is a critical component of determining appropriate levels of allowable biological removals. The 0.98 PRR for bled fish has been in regulation since the mid-1980s. Some processors may have been incorrectly reporting bled fish as "round" fish for years by not applying the PRR to those landings. To the extent that past misreporting by processors who reported bled sablefish as "round" weight has occurred, then sablefish harvest has been under-reported, both in the general recordkeeping and reporting system and IFQ accounting. A few years ago, some buyers began applying the required PRR to bled sablefish resulting in concern by sablefish QS holders of lost revenues associated with the 2 percent of the IFQs that were being deducted from landed weights. For example, NMFS would apply the 0.98 PRR on 100 lb of bled sablefish, resulting in an IFQ deduction of 102 lb round weight from an IFQ account.

The sablefish PRR is based on research by the Observer Program in the 1980s. At the request of NMFS AKRO, NMFS AFSC-Auke Bay Lab scientists recently conducted a cooperative study with sablefish fishermen to determine the blood loss that could be expected for sablefish being bled onboard and delivered in the round. Sigler et al. (2004) reported the following (emphasis added):

> "Accurate catch estimates are necessary for successful fishery management. Catch weights may be affected by fish bleeding; a practice fishermen use to ensure product quality. We conducted field experiments during July 2002 and July 2003 in the Gulf of Alaska to estimate the change in fish weight due to blood loss for sablefish. Fish weights were compared before and after bleeding. Sablefish lost more weight when bled without seawater (2.0%) than when immersed in flowing seawater (1.6%). Sablefish lost more weight when carefully brought aboard (2.0%) than when gaffed aboard (1.7%) (bled without flowing seawater). Gaffed sablefish lost weight even when not intentionally bled (1.0%) because of blood loss at the gaff wound. **The product recovery rate (PRR) currently applied by fishery managers to estimate catch weight for bled sablefish (2.0%) slightly overestimates "blood loss" for fish gaffed aboard (1.7%).** The PRR applied by fishery managers for unbled sablefish (0.0%) underestimates "blood loss" for fish gaffed aboard (1.0%). Estimating the actual change in weight due to blood loss for a commercial fishing trip is difficult because it requires accounting for storage methods and handling practices."

In summary, the researchers recognized that their results may not match blood loss during commercial fishing because of variations in fishing gear and handling field testing of the 2 percent deduction resulted in findings of a 1.7 percent blood loss during research trials. NMFS AKRO interpreted the results to confirm the 0.98 PRR and recommend no action. The full report is appended to this analysis under Appendix 2.

Alternative 2. Change product recovery rate from 0.98 to 1.0 for bled sablefish.

Alternative 2 would effectively eliminate the PRR for bled sablefish, by revising the rate from 0.98 (2 percent deduction) to 1.0 (no deduction). An industry organization recommended the proposed action because application of the PRR has resulted in some fishermen no longer bleeding sablefish, thus lowering its quality.

During its review of IFQ proposals in December 2003, the IFQ Implementation Team agreed that a .98 product recovery rate for sablefish is not reasonable, has no conservation benefit, and is a disincentive to improved quality.

NMFS (Sigler et al. 2004), however, continue to recommend its application for accounting purposes, as follows.

Table 3 to Part 679--Product Recovery Rates for groundfish species and conversion rates for Pacific halibut *(Updated 5/2/02)*

FMP Species / Species Code		Product Code											
		1, 2, 41, 86, 92, 93, 95 Whole Fish	3, 42 Bled	4 Gutted Head On	5 Gutted Head Off	6 H&G with Roe	7 H&G West Cut	8 H&G East Cut	10 H&G w/o Tail	11 Kirimi	12 Salted & Split	13 Wings	14 Roe
Pacific Cod	110	1.00	0.98	0.85	---	0.63	0.57	0.47	0.44	---	0.45	---	0.05
Arrowtooth Flounder	121	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Flathead Sole	122	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Rock Sole	123	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Dover Sole	124	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Rex Sole	125	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Yellowfin Sole	127	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Greenland Turbot	134	1.00	0.98	0.90	---	0.80	0.72	0.65	0.62	0.48	---	---	0.08
Thornyhead Rockfish	143	1.00	0.98	0.88	---	0.55	0.60	0.50	---	---	---	---	---
Sculpins	160	1.00	0.98	0.87	---	---	0.50	0.40	---	---	---	---	---
Atka Mackerel	193	1.00	0.98	0.87	---	0.67	0.64	0.61	---	---	---	---	---
Pollock	270	1.00	0.98	0.80	---	0.70	0.65	0.56	0.50	0.25	---	---	0.07
Smelts	510	1.00	0.98	0.82	---	---	0.71	---	---	---	---	---	---
Eulachon	511	1.00	0.98	0.82	---	---	0.71	---	---	---	---	---	---
Capelin	516	1.00	0.98	0.89	---	---	0.78	---	---	---	---	---	---
Sharks	689	1.00	0.98	0.83	---	---	0.72	---	---	---	---	---	---
Skates	700	1.00	0.98	0.90	---	---	---	0.32	---	---	---	0.32	---
Sablefish	710	1.00	0.98	0.89	---	---	0.68	0.63	0.50	---	---	---	---
Octopus	870	1.00	0.98	0.81	---	---	---	---	---	---	---	---	---
Squid	875	1.00	0.98	0.69	---	---	---	---	---	---	---	---	---
Rockfish	---	1.00	0.98	0.88	---	---	0.60	0.50	---	---	---	---	---
PACIFIC HALIBUT Conversion rates to Net Weight	200	---	---	0.90	1.0	---	---	---	---	---	---	---	---

"The National Marine Fisheries Service applies an adjustment to landings of bled sablefish that implies blood loss is 2% of body weight (PRR = 0.98, bled fish, product code 03). Gaffing fish is the normal method of bringing fish aboard during longline fishing. We found that blood loss is slightly less, 1.7% of body weight for bled sablefish that are gaffed aboard. The implied PRR is 0.983 rather than the current 0.98. No adjustment currently is applied for sablefish not deliberately bled (PRR = 1.0, whole fish, product code 01) (Low et al. 1989); however, we found that blood loss is 1.0% of body weight for sablefish that are gaffed aboard. The implied PRR is 0.99 rather than the current 1.0.

Historic catch estimates represent the weight of sablefish after gaffing, rather than live weight, because most sablefish were gaffed aboard, classified as whole fish, and the PRR of 1.0 was applied. Fishery catches as well as catches from sablefish longline surveys are affected. Thus, historic catches underestimate the live weight of the catch by 1%."

Alternative 3. Change product recovery rate from 0.98 to 0.99 for bled sablefish.

During initial review, the Council added an alternative to change the sablefish PRR from 0.98 to 0.99 to address an underlying issue of the proposal related to the 1 percent loss of blood from fish gaffed and unintentionally bled in the field experiment by Auke Bay Lab scientists. The Council recommended that the analysis be expanded to discuss how the lack of a PRR for unintentionally or "unbled" sablefish masks the effectiveness and accuracy of the PRR for bled sablefish.

Public testimony suggested that the PRR for bled sablefish was implemented two years ago; however, it was initially implemented in the 1980s. Two years ago, Sitka buyers began applying the rate for sablefish intentionally bled due to contacts with NOAA Enforcement Division. The proposers suggest that the recent application of the existing PRR for bled sablefish has resulted in the loss of the 2 percent correction of the weight of every landing and acts as a disincentive for fishermen to bleed sablefish at sea, a practice that enhances product quality.

The proposers suggested that the 1.7 percent blood loss minus the 1 percent blood loss from sablefish not intentionally bled, but which have suffered a blood loss through the gaff wound, results in a difference between bled and unbled sablefish of 0.7 percent. They suggested that since the experimental results do not accurately reflect actual fish handling techniques in the commercial fishery. They proposed that either the sablefish quota be increased by 1 percent or the PRR for bled sablefish be eliminated. During testimony, the proposers notified the Council that they did not support changing the PRR from 0.98 to 0.99.

Table 5.1 Results of Sigler et al. bleeding study

1.7 percent	blood loss in intentionally bled sablefish under experimental fishing conditions
1.0 percent	blood loss in unintentionally bled sablefish under experimental fishing conditions
0.7 percent	difference between intentionally and unintentionally bled sablefish under experimental fishing conditions

The Council requested that the analysis be expanded to address the issue of the difference between intentionally and unintentionally bled sablefish, and the lack of a PRR for unintentionally bled sablefish. A response by NMFS staff follows:

> "At the request of the Alaska Longline Fisherman's Association and with the endorsement of the Alaska Region Office of NMFS, the Alaska Fisheries Science Center staff conducted a study of the product recovery rates for sablefish that are reported as round or bled products. The study was conducted in two sessions in 2002 and 2003 and examined the effects of different types of handling on weight loss. The treatments in the experiment were intended to simulate typical processes on fishing vessels.
>
> Product recovery rates allow fisheries managers to estimate the round weight equivalent of groundfish that are accounted for at a product level. For example a product that in general results in the removal of half the weight of a fish will have a product recovery rate of one-half. If the product weighs one pound it is calculated to have a round weight equivalent of two pounds. Accurate determination of round weight is an important component of the algorithm fisheries managers use to determine total harvest removals so that quotas are accurately managed and fishing mortality is determined for population modeling. Product recovery rates can affect the revenues fishermen realize and are important to the industry to determine retention amounts for species that are closed to directed fisheries, but can be retained at a particular rate.
>
> In 2002, Alaska Fisheries Science Center staff examined carefully released sablefish to compare the loss of body weight from bleeding by cutting gills with and without flowing seawater. In 2003 the study compared fish boarded with a gaff with the gills either subsequently cut or not cut, both treatments in the absence of flowing seawater. The median weight loss in the 2002 study indicated a lower loss in the flowing sea water or a product recovery rate of 0.984 vs 0.980 for loss in the absence of flowing sea water. The median weight loss in the 2003 study for the gaffed fish with cut gills indicated a product recovery rate of 0.983 and for fish that are gaffed and not intentionally bled, a rate of 0.990.

The table of product recovery rates in regulation indicates fish that are gaffed aboard the vessel without intentional bleeding are considered whole fish and are assigned a product recovery rate of 1.0. Intentionally bled fish are assigned a product recovery rate of 0.98. The study indicates gaffed fish that are not intentionally bled lose 1% of their weight or a product recovery rate of 0.99 rather than the current rate of 1.0. The three different treatments that included intentionally bled fish had product recovery rates of 0.980, 0.983 and 0.984. The two higher rates compare favorably with, and under most rules of rounding would translate into, the current regulatory rate of 0.98.

Given the information gained from this study NMFS endorses consideration of changing the product recovery rate for gaffed sablefish from 1.0 to 0.99. NMFS further suggests that this rate be applied to all species that are currently gaffed and delivered as round fish.

If the product recovery rate for gaffed sablefish were changed from 1.0 to 0.99 about 15% of the total sablefish catch across the BSAI and GOA would be affected. In 2003, sablefish were predominately delivered as a "headed and gutted" product (80% BSAI/GOA wide) followed by round fish (15%) and bled fish (2%). In 2003, the total catch was about 17,400 mt. Fifteen percent of that amount is 2,600 mt. One percent of 2,600 mt is 26 mt, indicating the catch is under estimated by that amount.

NMFS does not endorse changing the bled fish rate from 0.98 to 0.99 as suggested by public testimony. The change is not supported by the study nor if it were accepted, have much effect on the estimate of total catch.

In the three treatments that involved intentionally bled fish, the group of fish that were not gaffed aboard but carefully released and bled were calculated to have exactly the same product recovery rate as the regulatory rate. The other two treatments showed rates that indicated .003 and .004 percent less weight loss than the current regulatory product recovery rate of 0.98. If the rate were changed from 0.98 to 0.99, given the 2003 reported products, the change in total catch would be negligible. About 350 mt round weight of bled fish were delivered in 2003, which was generated by applying a rate of .98 to the original product weight of 343 mt. Applying a rate of 0.99 to the product weight results in a round weight estimate of 346 mt or a total difference of 4 mt."

The recommendation to create a PRR for unintentionally or "unbled" sablefish is a new action that has not been analyzed or noticed to the public. A separate regulatory amendment could be initiated by the Council.

5.3 Expected effects of Alternative 1

The bled sablefish PRR of 0.98 would be maintained. This application results in a 2 percent deduction of IFQs for blood loss to correct landed weight to round weight. Six percent of 2002 landings were reported to be bled. Taking no action may result in fishermen changing their fish handling procedures (to not bleed sablefish) so as not to incur the deduction for blood loss and associated IFQ deduction and loss of income. Such loss of income may be mitigated by ex-vessel price for a higher quality landed product as a result of better handling.

5.4 Expected effects of Alternative 2

Action 2 would eliminate the bled sablefish PRR by changing it from 0.98 to 1.0 (no deductions made). The proposed action would address an alleged overestimation of IFQ catch reports, which result from the application of the PRR for bled sablefish to account for the loss in weight of sablefish (in the round) from blood loss. Bleeding and handling practices on individual vessels and setting time affect delivery weight. The proposer suggests that the PRR overestimates blood loss in bled sablefish. However, research results suggests that the discrepancy between the applied rate (2 percent) and the research rate (1.7 percent) was small.

The proposer also notes that handling of "unbled" sablefish still results in blood loss from the gaff wound but NMFS does not correct for that weight loss. They argue that research results from bled sablefish (1.7 percent) are similar to unbled sablefish (1.0 percent) and should be treated the same.

Alternative 2 would be expected to effect the six percent of sablefish landings in 2002 that were reported to be bled. Assuming the 2002 rate of bled sablefish occurred in 2003 (6% of total 2003 sablefish landings of 1,850,334 lb) results in a (corrected) round weight sablefish landings of 1,888,096 lb. The difference between the two landings is 37,762 lb, or 0.12 percent of total landings. This discrepancy in catch accounting has a value of approximately $3.50 per pound ex-vessel or $132,200.

The expected effect of Alternative 2 is reduced catch accuracy. The Council requested that the analysis expand the discussion of the effect of the proposed change on the sablefish stock assessment. Dr. Sigler noted that: (1) accurate stock assessments depend on accurate data, including catches, therefore the data should be as accurate as practically possible and (2) "small" levels of inaccuracy have "small" effects on stock assessment results.

5.5 Expected effects of Alternative 3

Action 3 would change the PRR for bled sablefish to account for blood loss from unintentionally bled sablefish. As described in Section 5.4, the effect of Alternative 3 may be half that estimated for Alternative 2. That is, the industry will benefit by $66,100 and the cost of reduced catch accuracy.

Administrative, Enforcement and Information Costs No additional costs were identified under Action 4.

5.6 Conclusions

Table 5.2 summarizes the net benefits of the alternatives. The estimated benefits are approximately $132,000 (all things being equal), based on the 2 percent difference applied to the weight of 6 percent of 2002 sablefish landings. The costs associated with inaccurate catch statistics can not be quantified but are expected to occur. Net benefits may decrease as a result of inaccurate catch statistics. None of the proposed actions are expected to have the potential to result in a "significant action" as defined in Executive Order 12866.

Table 5.2 Summary of the cost and benefit analysis of Action 4.

	Alternative 1	**Alternative 2** Eliminate the PRR for bled sablefish	**Alternative 3** Change the PRR for bled sablefish from 0.98 to 0.99
Impacts to the resource	None	None	None
Benefits	No change in benefits.	The estimated direct benefits are approximately $132,000 to sablefish fishermen.	Estimated benefits are approximately half of Alternative 2, or $66,000.
Costs	No change in costs.	Costs associated with inaccurate catch statistics can not be quantified.	Costs associated with inaccurate catch statistics can not be quantified.
Net benefits	No change in net benefits.	The direct benefits to sablefish fishermen result at a cost of under reporting catch. The net effect is unknown.	The direct benefits to sablefish fishermen result at a cost of under reporting catch. The net effect is unknown.
Action objectives	Does not address issue of lost revenues.	Does not address issue of inaccurate catch statistics.	Does not address issue of inaccurate catch statistics.
E.O. 12866 significance	Does not appear to be significant.	Does not appear to be significant.	Does not appear to be significant.

5.7 Initial Regulatory Flexibility Analysis

This IRFA describes the impact of the proposed alternatives for amending the sablefish product recovery rate for bled sablefish on small entities. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

Accurate catch reporting is the main objective in applying PRRs to landed fish. The problem statement is discussed in detail in Section 6.1, above. However, the proposal's claim that the PRR applied to bled sablefish is inaccurate has not been corroborated by NMFS.

Description and estimate of small entities

This action could directly affect 876 sablefish QS holders (Table 1.2), although only an unknown subset of these IFQ holders land their catch as bled fish. At present, NMFS does not have sufficient ownership and affiliation information to determine precisely the number of small entities in the IFQ program or the number that would be adversely impacted by the present action. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Alternatives considered and their impact on small entities

This analysis reviews the status quo and an alternative to change the product recovery rate from 0.98 to 1.0 for bled sablefish. The alternatives are explained in Section 4.2, and the following summary of impacts on small entities distilled is from the discussion in Sections 4.3 and 4.4.

Alternative 1 would not revise the PRR for bled sablefish.

Alternative 2 proposes to eliminate the PRR for bled sablefish because proponents of Alternative 2 have suggested that it is inaccurate. NMFS disputes this claim.

Description of compliance requirements

No additional recordkeeping and reporting requirements are associated with this action.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

6.0 Action 5: Amend the halibut block program in Areas 2C, 3A, 3B, 4A, 4B, 4C, and 4D

Prior to the implementation of the IFQ program, the Council adopted a block proposal in order to prevent excessive consolidation in the halibut and sablefish fisheries. Another goal was to maintain the diversity of

the IFQ longline fleet, comprising small producers, part-time participants, and entry-level participants, without compromising the flexibility and economic efficiency of the program as a whole. All initially issued QS that resulted in less than 20,000 lb (9 mt) of IFQ was "blocked," that is, issued as an inseparable unit. Also, no person is allowed to own more than two QS blocks per species in any regulatory area, or one QS block if unblocked QS is also held for that area.

In order to avoid an excess of small blocks that would be economically unfishable (i.e., the value of the harvest would not exceed the costs of the fishing trip) in the fishery, the "sweep-up" provision was included. This allows small blocks of QS to be permanently consolidated, as long as the resulting block does not exceed a set limit. The sweep-up level was originally set at 1,000 lb for halibut and 3,000 lb for sablefish, based on the 1994 TACs. However, after the completion of the first season, the IFQ longline industry reported that the established sweep-up levels were still lower than the harvest amount of a worthwhile fishing trip, and the sweep up levels were consequently increased to 3,000 lb and 5,000 lb for Pacific halibut and sablefish, respectively, based on the 1996 TACs.

6.1 Problem and management objectives for the action

The halibut vessel size classes and block plan were designed to maintain a diverse, owner-operated fleet and provide entry-level opportunity in the IFQ fisheries. However, many halibut QS holders have indicated that the existing block and sweep up restrictions are cumbersome when arranging changes in fishing operations and that increased flexibility may be desirable. Large quota increases, consolidation, and changing use patterns within the fleet suggest that the block and sweep-up provisions should be reviewed to determine whether changes are necessary.

6.2 Management Action Alternatives

Five alternatives are considered with respect to this management action. Alternatives 2-5 are not mutually exclusive.

Alternative 1 No action

Under this alternative, the halibut QS remains blocked or unblocked as currently issued, and the number of blocks that may be held by a person is limited to 2 (or 1 block and any amount of unblocked QS) for each regulatory area. The maximum sweep-up levels continues as specified in regulations under 50 CFR 679.41(e).

Alternative 2 Increase block limits to 3 or 4 blocks

a) limit is 3 blocks unless unblocked QS is held, in which case the limit is 1 block
b) limit is 3 blocks unless unblocked QS is held, in which case the limit is 2 blocks
c) limit is 4 blocks unless unblocked QS is held, in which case the limit is 2 blocks
d) limit is 4 blocks unless unblocked QS is held, in which case the limit is 3 blocks

This alternative increases the limit on the number of blocks that can be held by a person in each regulatory area.

Alternative 3 Unblock all QS blocks that yield more than 20,000 lb

Alternative 3 unblocks QS blocks yielding larger than 20,000 lb, based on the 2004 TACs, in all halibut IFQ areas.

Alternative 4 Allow blocked QS greater than 20,000 lb to be divided into smaller blocks

Under this alternative, holders of QS blocks yielding larger than 20,000 lb, based on the 2004 TACs, in all halibut IFQ areas, may choose to divide the block, with the resulting parcels to remain blocked.

Alternative 5 Increase the Areas 2C and 3A halibut sweep-up level to the 5,000 lb equivalent in 1996 QS units

This alternative increases the sweep-up level provision of the halibut block program in Areas 2C and 3A to a not-to-exceed consolidation level of 5,000 lb, based on the 1996 TACs . The maximum number of QS units that may be consolidated into a single block increases from 19,992 to 33,320 in Area 2C, and from 27,912 to 46,520 QS units in Area 3A.

6.3 Alternative 1 - No action

Under this alternative, halibut QS holders are subject to transfer and use limitations under the IFQ program as currently implemented. These restrictions are described in 50 CFR 679 Subpart D.

Under the block program, a person may not hold more than 2 blocks of each IFQ species in any IFQ regulatory area, or if the person holds unblocked QS for a species in an IFQ regulatory are, may hold only one QS block for that species [50 CFR 679.42 (g)(1)]. The majority of QS in each regulatory area is blocked (see Table 6.1). However, small block holdings may be consolidated or 'swept up' into a single block holding, as long as the resulting block does not exceed 3,000 lb, based on the 1996 TACs. The maximum number of QS units that may be consolidated in each regulatory area is identified in 50 CFR 679.41(e)(3).

Table 6.1 QS Holdings by area. Data as of 7/27/2004. Source: NMFS RAM.

Area	Total QS	% Blocked QS	% Unblocked QS	Total Number of Blocks	Total Number of QS Holders
2C	59,556,591	90%	10%	1667	1,426
3A	184,928,542	93%	7%	2055	1,928
3B	54,203,176	89%	11%	626	567
4A	14,587,099	88%	12%	276	284
4B	9,284,774	86%	14%	115	107
4C	4,016,352	70%	30%	66	63
4D	4,958,250	85%	15%	55	49

In addition to the block program, QS holdings are also limited by overall halibut ownership limits that constrain the total number of QS units held by a person. There are three ownership caps identified, limiting QS holdings by regulatory area(s). The QS units are calculated based on the 1996 TACs. In Area 2C, no person may own more than 1% of the QS pool, or 599,799 QS units. A person's QS holdings for Areas 2C, 3A, and 2B combined may not exceed 0.5% of the QS pool, or 1,502,823 QS units. For the combined Areas 4A, 4B, 4C, 4D, and 4E, no person may own more than 1.5% if the QS pool, or 495,044 QS units. Additionally, vessel limits constrain the amount of QS that may be caught onboard a vessel. In a given fishing year, no vessel may harvest more than 0.5% of the combined halibut TAC for Areas 2C, 3A, 3B, 4A, 4B, 4C, 4D, and 4E, and more than 1% of the combined fixed gear sablefish TAC for the BSAI and GOA management areas. Also, no vessel may harvest more than 1% of the halibut TAC for Area 2C, and more than 1% of the sablefish TAC in that portion of the GOA management area east of 140° W. longitude.

Determining the market value of halibut QS is difficult. Various attributes of the QS holding influence its price, including regulatory area, category of QS, whether it is blocked or unblocked, and for Area 2C, whether it can be fished down. Additionally, the size of the QS holding for sale, and how many fishable pounds remain associated with the QS for the current year also affect price. Table 6.2 contains data from the NMFS

Restricted Access Management Program of all 2003 priced QS transfers for halibut in which the transferor and transferee are not the same person. The table averages the price per lb (based on 2003 lb equivalent to the total QS units transferred) by regulatory area, QS category, and blocked versus unblocked status. However, the data does not necessarily give an accurate market value of QS because other, non-monetary factors may have been a part of a transfer, and their value is not reflected in the averages below. For example, in a dual transfer (QS trade), the party with the less valuable holding may make up the difference in money. This would be reflected as a priced transfer in the database, although the monetary value of the transfer does not represent the full value of the holding.

Table 6.2 **Average QS transfer price in 2003, and number of transfers, by regulatory area, category, and blocked versus unblocked status, in US dollars.** Amount indicated is the equivalent price per lb, based on 2003 TACs, of the actual QS units transferred. Number of transfers is indicated in parentheses. Data averaged from all priced transfers. Source: NMFS RAM.

Area	Category A		Category B		Category C		Category D	
	Blocked	Unblocked	Blocked	Unblocked	Blocked	Unblocked	Blocked	Unblocked
2C	–	–	9.89 (4)	10.20 (4)	11.11 (71)	13.15 (6)	8.87 (56)	– (1)[1]
3A	– (1)[1]	– (1)[1]	11.36 (7)	12.69 (18)	9.87 (28)	14.24 (10)	7.38 (60)	8.49 (3)
3B	– (1)[1]	–	7.14 (10)	9.01 (9)	8.06 (39)	– (1)[1]	– (2)[1]	– (1)[1]
4A	–	– (1)[1]	8.06 (10)	7.58 (7)	5.76 (13)	–	3.66 (13)	– (1)[1]
4B	–	– (1)[1]	3.70 (11)	6.78 (4)	4.53 (8)	– (1)[1]	–	–
4C	–	–	–	– (1)[1]	– (2)[1]	– (2)[1]	–	–
4D	–	–	6.53 (7)	– (1)[1]	– (2)[1]	–	not applicable[2]	not applicable[3]

[1] Average price not shown for fewer than three transfers.
[2] There is no category D QS in Area 4D.

Another perspective on the price of halibut QS is evident from examining the market offerings of QS holdings. Table 6.3 contains data from eight brokerage websites, from September 2004, and illustrates the range of sellers' offers for each type of QS holding. This does not necessarily indicate the price at which the QS will actually sell. The table also does not reflect the variation in price that results from the size of the holding.

Table 6.3 **Representative QS prices based on market offerings, September 2004, in US dollars.** Amount indicated is the equivalent price per lb, based on 2004 TACs, of the actual QS units offered. Data represents the range of offerings for a given QS type. "–" indicates that no QS was advertised with a price for that QS type. Source: ifqalaska.com, ifq.gsiboat.com, www.alaskabroker.com, www.dockstreetbrokers.com, www.ifqbrokers.com, www.permitmaster.com, www.thissen.com, www.tidewater-bkg.com.

Area	Category A		Category B		Category C		Category D	
	Blocked	Unblocked	Blocked	Unblocked	Blocked	Unblocked	Blocked	Unblocked
2C	–	–	14.00	–	12.00-16.50	16.00-18.00	11.00-14.00	–
3A	–	–	13.00-15.00	18.50-20.00	11.00-18.00	20.00	9.00-13.00	–
3B	–	17.00	11.00-13.00	11.50-15.00	9.50-13.50	14.00	9.00-11.00	–
4A	–	–	8.50-10.50	12.75	9.00-12.00	–	7.50-9.50	–
4B	–	14.00	6.50-6.75	7.50-8.50	6.00-8.00	8.50	3.50-5.00	–
4C	–	–	5.00-6.25	–	4.00-5.75	6.75	4.50-7.00	7.00
4D	–	–	7.25-7.50	–	–	–	not applicable[1]	not applicable[1]

[1]There is no category D QS in Area 4D.

Although the specific prices may not be reliable, the tables illustrate the general trends in halibut IFQ prices. For example, unblocked QS is generally more valuable than blocked QS. QS in southeast Alaska is more valuable than QS in the western areas, particularly for QS that must be fished on smaller vessels.

The block program intentionally constrains the transferability of certain QS holdings in order to preserve the availability of small holdings in the fishery (Hartley and Fina 2001b). Through the Council process[2], three problems with these constraints have been suggested by IFQ fishermen.

A potential problem with the block program is that in some instances, the QS holdings that were blocked based on 1995 TACs are no longer small holdings. Halibut TACs have increased significantly in some areas since 1995. QS are units that are converted to fishable IFQ based on the annual TAC. While in Areas 2C and 3A, the TACs are roughly similar to their 1995 levels, in the western areas (Areas 3B, 4A, 4B, 4C, and 4D), TACs have increased considerably. Table 6.4 illustrates the number of QS units that constituted 20,000 lb in 1995 for each regulatory area, and the corresponding IFQ lb in 2004. In the most extreme case, Area 3B, TACs have increased over 300%. The result is that many blocked holdings in the western areas now constitute relatively large holdings. This is contrary to the intent of the block program. Difficulties of transfer ensue, as a blocked holding cannot be severed, and the larger holdings are now only available to those with access to large sums of capital.

Table 6.4 QS/IFQ conversion rates in 1995 and 2004. Source: NMFS RAM.

Area	1995 IFQ lb	1995 QS/IFQ conversion	QS units	2004 QS/IFQ conversion	2004 IFQ lb
2C	20,000	6.650	133,000	5.6721	23,448
3A	20,000	9.291	185,820	7.3795	25,181
3B	20,000	14.712	294,240	3.4746	84,683
4A	20,000	7.622	152,440	4.2038	36,262
4B	20,000	4.998	99,960	4.1302	24,202
4C	20,000	10.310	206,200	4.6702	44,152
4D	20,000	8.694	173,880	4.1181	42,223

A different problem has also been indicated in the western areas. For these fishermen whose holdings are small regardless of the increases in TAC, it may not be economically viable to harvest the holdings as the overhead costs of a fishing trip may equal or exceed the income that can be generated. The ability of a fisherman to increase his or her QS holding by purchase is constrained by the two block limit and a purported scarcity of unblocked QS. QS block holders could minimally be limited to a 6,000 lb (based on 1996 TACs) halibut QS holding, as under the sweep-up provisions, halibut QS blocks may each be consolidated to a maximum of 3,000 lb (based on 1996 TACs). Table 6.5 illustrates that the number of distinct QS holders with unblocked QS is much smaller in the western areas than in Areas 2C and 3A. Larger vessels that may support more crew members may increase their vessel harvest if each crew member controls IFQ. A small vessel, however, is physically restricted as to crew size, and has a limited capacity for the number of blocks that may be harvested on a trip.

[2]The Council called for and received proposals for amendments to the IFQ program in 1999 and 2003.

Table 6.5 **Distinct halibut QS holders by holdings block type.** NOTE: Counts are not additive across areas. Data as of 7/27/04. Source: NMFS RAM.

Area	Number of Holders				Total Distinct Number of Holders	Percent of total QS holders with two blocks
	with 1 block only	with 2 blocks	with 1 block + unblocked QS	with unblocked QS only		
2C	816	377	93	140	1,426	26.44%
3A	1,082	409	153	284	1,928	21.21%
3B	302	141	39	85	567	24.87%
4A	102	80	14	88	284	28.17%
4B	46	28	13	20	107	26.17%
4C	28	12	14	9	63	19.05%
4D	22	15	3	9	49	30.61%

Some indication of the viability of a holding size can be gleaned from the degree to which consolidation has occurred in the fishery, by area and holding size. This information is compiled annually in the NMFS Report to the Fleet (NMFS 2003a, in prep.). Table 6.6 summarizes the number of persons holding QS at initial issuance, and those at the end of 2003. The greatest amount of consolidation has occurred among those with holdings of 3,000 lb or less, implying that for many fishermen, it was more profitable to sell out of the fishery than to fish the small holding. Consolidation is much reduced in the larger categories, and the number of holders of QS over 25,000 lb has increased across the board.

In the western areas, the number of fishermen participating in the halibut fishery with holdings of between 3,001 and 10,000 lb has decreased by approximately 50-75% since initial issuance. Participants with between 10,001 and 25,000 lb holdings have decreased by about 15% in Areas 3B and 4A, by 35-45% in Areas 4B and 4D, and have increased by about 15% in Area 4C.

Table 6.6 Consolidation of halibut QS between initial issuance and year-end 2003, by area. NOTE: Size of holdings is expressed in 2003 IFQ pounds. Source: NMFS, in prep.

Size of holding (lb)	Area	Number of initial issuees	Holders as of end of 2003	Area	Number of initial issuees	Holders as of end of 2003
3,000 or less	2C	1,551	744	4A	266	88
3,001-10,000		619	456		124	54
10,001-25,000		197	216		82	68
over 25,000		20	50		57	72
TOTAL		2,387	1,466		529	282
3,000 or less	3A	1,819	894	4B	31	13
3,001-10,000		657	486		40	21
10,001-25,000		342	323		47	31
over 25,000		252	261		34	43
TOTAL		3,070	1,964		152	108
3,000 or less	3B	435	127	4C	20	12
3,001-10,000		253	81		29	14
10,001-25,000		182	153		22	23
over 25,000		185	216		11	14
TOTAL		1055	577		80	63
3,000 or less				4D	9	2
3,001-10,000					20	11
10,001-25,000					23	13
over 25,000					16	23
TOTAL					68	49

A final problem identified with the block program is that it imposes logistical complexity on the transfer process which prevents active fishery participants from incrementally increasing their holdings. While unblocked QS holders may gradually increase their QS, assuming unblocked QS is available for purchase, blocked QS holders are constrained by the 2 block limit. As of late July 2004, 20-30% of QS holders in each regulatory area are unable to purchase further QS without divesting themselves of their existing QS (i.e., they own 2 blocks; Table 6.5). Consequently, a small QS holder at the block limit, in order to increase his or her holding, must first transfer a block of QS before s/he is able to increase his or her holding. The complexity involved in this dual transaction may provide a substantial obstacle to growth for active fishery participants.

6.4 Effects of Alternatives 2-5

None of the alternatives are likely to change fishing patterns or harvest amounts to an extent that would result in an impact on the halibut stock, bycatch amounts, or other environmental impacts. A summary of benefits and costs is detailed in Table 6.10 below.

Alternative 2

Alternative 2 increases the limit on the number of blocks of halibut QS that may be held by a person. This alternative directly affects halibut QS block holders, representing approximately 80-90% of QS holders in all areas except Area 4C (Table 6-5). All 3,349 persons holding halibut QS in all IFQ areas (Table 1.2) may be indirectly impacted. The actual effect is likely to be concentrated on the 20-30% of QS holders who are currently constrained by holding 2 blocks (Table 6.5), and those QS holders who hold one block and unblocked QS.

The likely effect of this alternative is that some QS holders will expand their operations and purchase additional QS blocks. Consolidation of QS will continue to be limited by the vessel and ownership caps, however.

Increasing the halibut block limits to 3 or 4 blocks will increase the flexibility of QS holders in arranging transfers of QS. For those at the block limit, this alternative allows them to purchase blocked QS without first having to sell QS. Currently, approximately one third of QS holders in each regulatory area are directly affected by the limits on block ownership (i.e., they currently own either 2 blocks or 1 block plus unblocked QS).

This alternative is likely to increase the value of blocked QS, which may consequently decrease the value of unblocked QS. Tables 6.2 and 6.3 give an indication of the value of blocked and unblocked halibut QS, across categories. It is apparent that blocked QS is consistently less valuable than unblocked QS. This is caused in part by the increased restrictions, such as ownership limits, imposed upon blocked shares. Relaxing the ownership limit on blocks is likely to diminish the price differential between otherwise similarly categorized QS holdings.

Alternative 2 may provide some benefit to small vessels in the western areas, who face high overhead costs in fishing their IFQ. Increasing block limits would permit these fishing operations to accumulate larger amounts of IFQ on their vessel, which would increase the potential for generating income on a fishing trip.

Implementing this alternative weakens an intent of the block program, namely to prevent excessive consolidation and maintain a diverse fleet. Although small holdings would still be available in the fishery, increasing the block limits allows increased consolidation of halibut QS. This may impact the availability of entry-level opportunities in the fishery.

Distinguishing impacts among the suboptions is difficult. Increasing the block limit to four versus three blocks would amplify the benefits and costs discussed above. The suboptions also distinguish between those QS holders who hold only blocks, and those who hold unblocked QS and may also hold a block. Limited data is available to distinguish between these groups. Suboption (a) is the only suboption that would only affect one group, namely QS holders who only hold blocked QS.

Table 6.5 indicates that 20-30% of QS holders are at the two block limit, and 5-8% of QS holders in most areas have one block and unblocked QS. In Area 4B and 4C, 12% and 22% of QS holders respectively have one block and unblocked QS. This would seem to indicate that there are likely more QS holders who hold only blocked QS who would benefit from this alternative.

Table 6.1 illustrates that 85-93% of QS is blocked in most regulatory areas. Additionally, the proportion of unblocked QS is far lower in category D (vessels less than or equal to 35 ft LOA) than for larger vessels (Table 6.7), in all areas except Area 4C. Due to the way in which the QS/IFQ accounts are set up, it is difficult to correlate the block characteristic of QS directly with vessel size used for IFQ landings. However, limiting the data to QS holders who hold only blocked QS and those who hold only unblocked QS, who have not transferred QS in a regulatory area during 2003, it is possible to draw some inferences as to their relative characteristics. For vessels less than or equal to 35 ft LOA, the IFQ derived from blocked QS greatly exceeded the IFQ derived from unblocked QS. For vessels between 36 and 60 ft LOA, IFQ derived from blocked QS exceeded that derived from unblocked QS in Areas 2C, 3B, 4A, and 4C. In the other areas, IFQ derived from unblocked QS was most prevalent in the landings. For vessels greater than 60 ft LOA, IFQ deriving from blocked or unblocked QS was fairly comparable in Areas 2C, 3B, 4A, and 4C. In Areas 3A, 4B, and 4D IFQ derived from unblocked QS greatly exceeded that from blocked QS.

Table 6.7 **Percent blocked versus unblocked halibut QS, by category and regulatory area.** NOTE: Category A QS can be fished on any vessel, category B QS can be fished on any vessel except in Area 2C, category C QS can be fished on vessels ≤60 ft LOA, and category D QS can be fished on vessels ≤35 ft LOA. Data as of July 1, 2004. Source: NMFS RAM.

Area	Category A		Category B		Category C		Category D	
	Blocked	Unblocked	Blocked	Unblocked	Blocked	Unblocked	Blocked	Unblocked
2C	49%	51%	38%	62%	67%	33%	99%	1%
3A	16%	84%	10%	90%	47%	53%	90%	10%
3B	60%	40%	48%	52%	89%	11%	99%	1%
4A	70%	30%	58%	42%	92%	8%	99%	1%
4B	33%	67%	27%	73%	71%	29%	100%	0%
4C	100%	0%	48%	52%	59%	41%	52%	48%
4D	49%	51%	45%	55%	90%	10%	na	na

Overall, the alternative should increase the economic efficiency of halibut blocked QS holders by relaxing block program restrictions. This allows individual fishermen the flexibility to increase revenues and decrease costs. For the most part, halibut blocked QS holders would benefit from this alternative, as the value of their blocked holdings is likely to increase and as is their ability to fish their holdings efficiently. Unblocked QS holders may experience an attendant decrease in the value of their QS holding. Although this alternative may lead to increased consolidation, small holdings will remain blocked. While entry-level opportunities in the fishery may become more scarce, they are not necessarily precluded.

From a management perspective, increasing the block limit to either 3 or 4 blocks does not pose any difficulties with regard to implementation. To the extent that consolidation occurs, and the number of participants in the IFQ fisheries decrease, the cost of administering the program may decrease slightly. Transfer activity will probably increase after implementation of the alternative. There are no additional administrative, enforcement, or information costs that would be incurred under this alternative.

Alternative 3

Alternative 3 unblocks all QS blocks that yield more than 20,000 lb of IFQ, based on 2004 TACs. This alternative would only affect QS holders in the western areas (Areas 3B, 4A, 4B, 4C, and 4D),where TACs have increased substantially since 1996, resulting in QS blocks exceeding 20,000 lb. Unblocking the QS would be a one-time change that would take place between IFQ years.

Holders of large QS blocks (yielding IFQ greater than 20,000 lb, based on the 2004 TACs) will be most directly affected. The number of large block holdings in each regulatory area is listed in Table 6.8, below. Area 3B contains the most large holdings, and many of the holdings are considerably larger than in the other IFQ areas (30 of the holdings exceed 60,000 lb). The alternative may indirectly affect holders of small blocks and holders of unblocked QS in these areas, to the degree that the value of their QS holdings changes. A maximum of 1,070 halibut QS holders in the western areas (Table 6.5) are potentially affected by this action.

Table 6.8 Effects of Alternative 3 on the proportion of blocked holdings. Data as of 7/1/04. Source: NMFS RAM.

Area	2004				Under Alternative 3		
	Number of Large Blocks[1]	Total Blocks	Blocked QS as % of Total QS	Unblocked QS as % of Total QS	Total Blocks	Blocked QS as % of Total QS	Unblocked QS as % of Total QS
3B	156	626	89%	11%	470	26%	74%
4A	33	276	88%	12%	243	46%	54%
4B	2	115	86%	14%	113	34%	66%
4C	2	66	70%	30%	64	47%	53%
4D	7	55	85%	15%	48	35%	65%

[1]QS blocks that yield IFQ greater than 20,000 lb, based on 2004 TACs.

This alternative is likely to benefit holders of large blocks of halibut QS. Reassigning the QS as unblocked removes ownership restrictions and limits on the severability of the QS holding. As a result, QS holders will have increased flexibility to transfer QS. As discussed in Alternative 2 above, unblocked QS generally commands a higher price than blocked QS, as it is subject to fewer restrictions.

However, this alternative considerably changes the proportion of blocked versus unblocked QS in these areas. Table 6.8 illustrates that in most areas, 85-90% of all QS is blocked. Under Alternative 3, this proportion would change to only 26-46% of total QS remaining blocked. Tables 6.2 and 6.3 give an indication of the current value of blocked and unblocked QS. Due to increased availability, the current value of unblocked QS is likely to decrease. The value of blocked QS could decrease further, or could increase if these blocks were now the only source of small holdings in the western areas.

This alternative has the potential to be beneficial to those small vessels in western areas that are struggling to make economically viable fishing trips, as it would presumably make available more unblocked QS for purchase. In the same manner, the increased availability of unblocked QS would benefit buyers in the marketplace, particularly if it is accompanied by a decrease in the price of unblocked QS. If in the long run, however, there are no small lots available, this could adversely affect those seeking entry-level opportunities in the fishery.

Alternative 3 permanently adjusts the proportion of blocked versus unblocked QS in western areas. This alternative responds to the considerable increase in the halibut TACs since the initiation of the block program, reportedly resulting in operational difficulties due to large block size. The 2004 TACs are 20-320% greater in Areas 3B, 4A, 4B, 4C, and 4D, as compared to 1995. Halibut exploitable biomass in the western areas reached historically high abundance levels in the years following the implementation of the IFQ program. However, the biomass has been decreasing since 1999 (Clark and Hare 2004). Should TACs decrease in the future, fewer QS will be blocked in these areas, and the block sizes will all be smaller. It has already been reported that fishing small blocks in these areas is difficult, under the current block limits. For example, should TACs decrease by 30% in Area 3B, from 2004 levels, the largest block holding would be equivalent to only 12,600 lb, and most blocks would be considerably smaller. This alternative would be difficult to reverse, should changes in TAC occur requiring different management.

Overall, the alternative increases the economic efficiency in the western areas by expanding the holdings of unblocked halibut QS. By reversing the proportion of unblocked versus blocked QS available in these areas, this alternative gives individual fishermen flexibility to increase revenues and decrease costs. Existing holders of unblocked QS may experience some decrease in the value of the holdings as more unblocked QS is created.

With regard to the impacts on management, implementing Alternative 3 would require a one-time change to the database to reassign QS as unblocked. QS holding certificates would then be reissued to all affected QS holders. The change would need to take place in between IFQ years, and would increase management costs for that year. Although short-term transfer activity is likely to increase following the change, the alternative is not likely to have any sustained adverse impacts. No additional administrative, enforcement, or information costs would be incurred.

Alternative 4

Alternative 4 is similar to Alternative 3, in that it addresses large QS blocks, i.e., those yielding more than 20,000 lb, based on the 2004 TACs. These QS block holders have the option to divide their large QS block into smaller blocks. This division can be made at any point in the future, although for ease of management, would likely need to occur between IFQ years. At present, as with Alternative 3, all QS holders in the western areas are affected, although those most directly impacted are holders of large QS blocks. Should TAC levels increase substantially in Areas 2C and 3B in the future, QS block holders in those areas could also be affected. Table 6.8 lists the number of large block holdings in each regulatory area. As written, there is no restriction on the size or number of smaller blocks to be created.

Large QS holders are likely to benefit from this alternative. Those halibut QS holders who, now or in the future, want to transfer some or all of their QS holding, are able to divide their holding in order to do so. The increased flexibility should alleviate the current reported difficulty of transferring large, blocked QS holdings. The alternative may also benefit buyers looking for smaller holdings in the western areas, by increasing the potential availability of such holdings.

With the two block limit still in place, some complexity may be involved in dividing and transferring QS holdings while remaining within the block limit. There seems little advantage to be gained from dividing a block that is to remain within a person's possession, however, so it seems likely that all divisions would be made in conjunction with a transfer. Therefore this may not prove to be a difficulty.

The long-term impacts should the TACs decrease in the future would depend on the degree to which QS holders took advantage of this option. If all the large holdings were divided, and the TACs decreased, there would be an abundance of small blocked holdings in the western areas. This may prove difficult if the block limit is still in place, and overhead costs for a fishing trip continue to be high in this area. The Council may need to take mitigative management action should TACs decrease substantially, to reconsolidate small blocks. As the divided holdings remain blocked, the Council's intent to provide entry-level opportunities would still be met.

Block divisions would likely occur at the time of transfer, requiring no additional staff time and resources would be involved in the changes to the database and the re-issuance of the QS certificate. Transfer activity would likely increase in the short-term as a result of this alternative. The division of the large QS blocks is voluntary and may be undertaken at any time in the future. No additional administrative, enforcement, or information costs would be incurred.

Alternative 5

This alternative increases sweep-up levels for halibut, exclusively in Areas 2C and 3A. There are a maximum of 3,354 halibut QS holders in these areas (Table 6.5). Of these, holders of QS blocks equivalent to less than 5,000 lb, based on the 1996 TACs, are affected by this alternative.

Sweep-up levels were established in regulation as a maximum number of QS units, based on the 1996 QS/lb conversion, that may be consolidated. Table 6.9 below indicates that, under this alternative, multiple blocks

may be consolidated into a larger block that does not exceed 33,320 or 46,520 QS units in Areas 2C and 3A, respectively. The table shows the equivalent poundage based on the 2004 TACs.

Table 6.9 Halibut sweep-up levels. Source: NMFS RAM.

	Current regulations		Alternative 5	
	QS units	Equivalent lb, based on 2003 TACs	QS units	Equivalent lb, based on 2003 TACs
Area 2C	19,992	3,525	33,320	5,875
Area 3A	27,912	3,782	46,520	6,304

Under this alternative, 1,194 blocks in Area 2C and 1,535 blocks in Area 3A would be eligible for sweep-up. Holders of these blocks could benefit as they would be able to consolidate their block holding to an increased level.

As of July 1, 2004, 930 blocks in Area 2C and 1,262 blocks in Areas 3A were eligible for sweep-up under the current regulations. RAM maintains a list of these QS holdings on their website (www.fakr.noaa.gov/ram), although it is unknown how many are available for purchase. While some of these blocks are approaching the consolidation limit, over 60% of the holdings are smaller than half the maximum consolidation size. There are, therefore, a considerable number of QS holdings that are below the 3,000 lb threshold level, even factoring out those that are close to the threshold, that have not been consolidated. A total of 18 sweep-ups occurred in Area 2C in 2003, and 23 in Area 3A (NMFS 2003). It is unknown how many QS holders would take advantage of the increased sweep-up limit. The alternative does provide increased flexibility to the transfer process, however, allowing some QS holders who are currently at both the threshold limit and the block limit, to incrementally increase their QS holding without first selling one of their blocks.

The alternative may allow increased consolidation, which is contrary to the intent of the block program. In increasing the sweep-up levels in 1996, the Council responded to information from the IFQ industry that the previous sweep-up levels were lower than the harvest amount of a worthwhile fishing trip (NPFMC 1996b). There does not appear to be any evidence for such a justification in this instance.

From a management perspective, the alternative requires a simple change to the database. It is likely that the alternative would engender an increase in sweep-up transfers to be processed. No additional administrative, enforcement, or information costs would be incurred.

Alternatives 2-5 in combination

Alternative 2 (increasing the block limits) and Alternative 3 (unblocking QS blocks yielding greater than 20,000 lb in 2004 TACs) address different issues in the halibut fishery. Alternative 2 increases the flexibility of QS block holders in all areas, allowing them to increase their holding beyond the current block ownership limits. Alternative 3 addresses the subset of QS holders in the western areas with large QS blocks that are permanently indivisible and exceed 20,000 lb based on the 2004 TACs, and are consequently difficult to transfer. For these QS holders, implementing both alternatives simultaneously would increase their ability to consolidate QS as they would be able to purchase unlimited unblocked QS (pursuant to availability) and also one to three more blocks, depending on their current QS holding. However, these QS holders would still be limited by the ownership and vessel caps, as outlined under Alternative 1 in Section 6.3.

As with Alternatives 2 and 3, Alternative 2 and Alternative 4 (which allows QS holders with blocks yielding greater than 20,000 lb in 2004 TACs to divide their block into smaller blocks) address different issues in the fishery. The subset of QS holders that would be affected by both alternatives is wider because the action to

divide large blocks can take place at any time in the future. Currently, this would only affect large QS block holders in the western areas, however if TACs change, the subset of affected participants could be broader. There are unlikely to be cumulative impacts from implementing these alternatives simultaneously, as a QS holder is most likely to take advantage of Alternative 4 by dividing his or her holding in order to transfer a resulting block. No additional impacts are likely to occur that are distinguishable from implementing them in isolation.

Alternative 5 increases sweep-up limits in Areas 2C and 3A. The alternative directly affects small QS block holders (those with blocks yielding less than 5,000 lb based on 1996 TACs) in those areas. The alternative is intended to facilitate incremental increase of QS for these fishermen. Implementing Alternative 2, which affects all QS block holders in all areas, with Alternative 5 is likely to be redundant as the incremental growth could occur through block acquisition instead of block consolidation through the sweep-up limits. However, it is possible that a QS holder owning four small blocks (under Alternative 2) could increase his or her consolidation level by up to 8,000 mt (based on the 1996 TACs) under the simultaneous implementation of Alternative 5.

Alternative 5 primarily affects fishermen in a different geographical area (Areas 2C and 3A) than those impacted by Alternatives 3 and 4 (the western areas), and so the cumulative impacts would be the those discussed under the individual alternatives above. Alternative 4 does have the potential to affect QS holders in Areas 2C and 3A in the future, should TAC levels increase in those areas. Depending on the degree of TAC increase, implementing the alternatives simultaneously could increase the number of small blocks available for sweep-up.

Alternatives 3 and 4 cannot be implemented simultaneously.

Table 6.10 Summary of the benefits and costs of Action 5

	Alternative 1	Alternative 2	Alternative 3	Alternative 4	Alternative 5
Who is affected	• none	• all halibut fishermen, all areas	• western areas only (Areas 3B, 4A-D) • direct: all large (>20,000 lb) halibut block holders • indirect: all halibut fishermen	• potentially all areas; immediately, western areas only • direct: all large (>20,000 lb) halibut block holders • indirect: all halibut fishermen	• Areas 2C and 3A • halibut fishermen holding QS blocks yielding less than 5,000 lb (based on 1996 TACs)
Impacts to the resource	• baseline	• none	• none	• none	• none
Benefits	• baseline	• allows QS holders at the block limit more freedom to transfer QS • may help small vessel owners in western areas make trips more economically viable	• removes block restrictions from large blocks • may increase availability of QS by increasing unblocked holdings • increases value of former large block QS holdings	• increases ability to transfer large blocks • may increase availability of small holdings	• allows QS holders at the block limit to increase their QS without selling a block
Costs	• baseline	• may reduce value of unblocked QS • may increase consolidation, which may reduce entry-level opportunities in the fishery	• increases proportion of unblocked QS in western areas and may decrease its value • permanently reassigns blocked QS; if TACs decrease, there may be fewer small holdings	• if TACs decrease, there will be many small blocks	• may increase consolidation
Net benefits	• baseline	• increases efficiency by reducing block restrictions	• increases efficiency by expanding the holdings of unblocked QS	• increases efficiency by reducing restrictions on large blocks	• increases efficiency by allowing further small block consolidation
Action objectives	• does not increase flexibility	• increases flexibility in transfer and ownership restrictions	• increases flexibility in transfer of large, blocked holdings	• increases flexibility in transfer of large, blocked holdings	• increases flexibility, but only for small block holders in Areas 2C and 3A

The total "standard" ex-vessel value taken in the commercial halibut fishery off Alaska in 2003 was approximately $167 million (NMFS, in prep.). The proposal under consideration will make minor changes in these fisheries. Although it has not been possible to monetize the benefits and costs from these proposed program changes, their total net impact on the economy will be far below $100 million, annually. These proposals generally have little cost and are expected to produce benefits for industry. For these reasons, they are unlikely to adversely and materially affect the economy, a sector of the economy, productivity, competition, jobs, the environment, public health or safety, or State, local, or tribal governments or communities. These programs are not likely to meet the economic criterion for significance under EO 12866.

6.5 Initial Regulatory Flexibility Analysis

This IRFA describes the impact of the proposed alternatives for amending the halibut block program in Areas 2C, 3A, 3B, 4A, 4B, 4C, and 4D on small entities. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

Since implementation of the IFQ program, the halibut fleet has experienced large quota increases, consolidation, and changing use patterns. Halibut QS holders have indicated that existing block and sweep-up restrictions are cumbersome, and changing the restrictions could improve flexibility and efficiency in fishing operations. The problem statement is discussed in detail in Section 6.1, above.

Description and estimate of small entities

This action directly impacts holders of halibut QS blocks in all IFQ areas. There are 3,205 persons, both individual and collective entities, who hold at least one block of halibut QS in all IFQ areas. These persons represent 80-90% of all halibut QS holders in all regulatory areas except Area 4C, where only 69% of QS holders own at least one block (Table 6.5). At present, NMFS does not have sufficient ownership and affiliation information to determine precisely the number of small entities in the IFQ program or the number that would be adversely impacted by the present action. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Alternatives considered and their impact on small entities

This analysis review the status quo and four alternatives to the existing requirements. One alternative would increase block limits, two alternatives ease restrictions on blocks yielding greater than 20,000 lb based on the 2004 TACs, and a fourth increases sweep-up limits for halibut in Areas 2C and 3A. The alternatives are explained in Section 6.2, and the following summary of impacts on small entities distilled is from the discussion in Sections 6.3 and 6.4.

Alternative 1 is a no action alternative and would not have any associated adverse economic impacts on directly regulated small entities.

Alternative 2 increases the block ownership limit to 3 or 4 blocks. As discussed in Section 6.4 above, QS block owners that are currently constrained by the block limits would benefit from the increased flexibility. This may decrease the value of unblocked QS in relation to blocked QS, by relaxing the ownership constraint on blocked QS. Blocked QS would become relatively more marketable as a result. There are no data available to determine whether and how the alternative would change QS value. However, there would be no differential impacts on the basis of size of the regulated entity attributable to this proposed action, because all are “small” on the basis of RFA criteria.

Alternative 3 unblocks all large QS blocks, those yielding greater than 20,000 lb based on 2004 TACs. This alternative may also impact the value of unblocked shares in Areas 3B, 4A, 4B, 4C, and 4D, by increasing the proportion of unblocked QS available in those IFQ areas. Benefits would accrue to holders of large QS blocks, alleviating a potential difficulty in their ability to transfer the large, restricted blocks. In any case, there would be no differential impacts on the basis of size of the regulated entity attributable to this proposed action, because all are “small” on the basis of RFA criteria.

Alternative 4 allows large QS block holders to divide their holding into smaller blocks, potentially increasing efficient use of the QS holding. Data are unavailable to determine the extent to which QS holders would be

likely to take advantage of this option. Should all large holdings be divided, the alternative may impact the price of block holdings.

Alternative 5 increases the sweep-up levels in Areas 2C and 3A from the 1996 3,000 lb equivalent to the 1996 5,000 lb equivalent in QS units. This alternative would allow small QS block holders to incrementally increase their holdings. There are no apparent adverse impacts on small entities.

Description of compliance requirements

No additional recordkeeping and reporting requirements are associated with this action.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

7.0 Action 6: Amend Area 3B, 4A, 4B, 4C, and 4D halibut quota share categories

The Council included a number of elements in the design of the IFQ program that were intended to preserve the diversity of the fleet and maintain entry-level opportunity in the fisheries. One of these measures is to permanently attribute QS holdings to halibut vessel categories A, B, C, and D, that restrict how the resulting IFQ is fished. The QS vessel category determines both whether harvested fish may be processed onboard (category A QS only), and the size of vessel on which the IFQ may be harvested.

As implemented, each halibut QS category determined the length of the catcher vessel (i.e., a vessel not authorized to process IFQ fish onboard) on which the resulting IFQ could be fished: category B, >60 ft LOA; category C, >35 ft but ≤60 ft LOA; category D, ≤35 ft LOA. At the request of industry, and in order to facilitate flexibility and efficiency in the fishery, however, a regulatory amendment in 1996 allowed halibut IFQ derived from category B or C QS to be fished on smaller vessels, in all halibut areas except Area 2C[3] (see NPFMC 1996a for further detail).

7.1 Problem and management objectives for the action

The halibut vessel size classes and block plan were designed to maintain a diverse, owner-operated fleet and provide an entry-level opportunity in the IFQ fisheries. Halibut fishermen in western Alaska have identified significant safety concerns when fishing in those areas on small vessels. Therefore, vessel size class restrictions in those areas should be reconsidered.

[3] The Council excluded Area 2C (and Southeast Outside District for sablefish) from the fish down amendment because there is proportionally less category B QS available in these areas. The Council was concerned that vessels over 60 ft LOA, who can only use category B QS onboard, would be disadvantaged.

7.2 Management Action Alternatives

Four alternatives are considered under this management action. A different alternative may be applied to each regulatory area under consideration.

Alternative 1 No action

Alternative 1 retains the existing restrictions regarding the use of halibut IFQ derived from a particular category of QS. Category D QS must be fished on vessels less than or equal to 35 ft LOA.

Alternative 2 Allow IFQ derived from D category QS to be fished on C category vessels

Under this alternative, halibut IFQ resulting from category D QS in Areas 3B, 4A, 4B, 4C, and 4D can be fished on vessels less than or equal to 60 ft LOA.

Alternative 3 Allow IFQ derived from D category QS to be fished on C or B category vessels

Under this alternative, halibut IFQ resulting from category D QS in Areas 3B, 4A, 4B, 4C, and 4D can be fished on vessels of any length.

Alternative 4 Combine C and D category QS

This alternative eliminates category D halibut QS in Areas 3B, 4A, 4B, 4C, and 4D, and reassign all category D QS as category C QS. Category C QS can be fished on vessels less than or equal to 60 ft LOA.

7.3 Alternative 1 - No action

The IFQ program, as currently regulated, constrains the use of IFQ derived from a particular category of QS The use restrictions are described in 50 CFR 679.40(a)(5)(ii) and are listed in Table 7.1 below.

Table 7.1 QS/IFQ use restrictions by category

Category A	authority to harvest and process IFQ species on a vessel of any length (freezer/longliners)
Category B	authority to harvest IFQ species on a vessel of any length (except in halibut Area 2C or sablefish Southeast Outside District, unless the IFQ derives from blocked QS units that result in less than 33,321 halibut or 33,271 sablefish QS units)
Category C	authority to harvest IFQ species on a vessel less than or equal to 60 ft LOA
Category D	authority to harvest IFQ halibut on a vessel less than or equal to 35 ft LOA

Table 7.2 illustrates the relative proportion of QS by category in each of the western areas. There is no category D QS issued in Area 4D.

Table 7.2 QS Units by category and area. Data from end of 2003. Source: NMFS RAM.

Area	Total QS units	Equivalent IFQ (lb) in 2004	Category A % of total	Category B % of total	Category C % of total	Category D % of total
3B	54,203,176	15,600,000	2.9%	55.3%	38.7%	3.1%
4A	14,587,099	3,470,000	4.2%	58.6%	30.0%	7.2%
4B	9,284,774	2,248,000	6.0%	76.6%	14.5%	2.9%
4C	4,016,352	860,000	0.5%	40.4%	21.6%	37.6%
4D	4,958,250	1,204,000	8.3%	82.7%	9.0%	0%

In 1999, industry members suggested, through the Council process[4], that the restrictions governing the use of IFQ derived from category D QS present a serious safety issue in Areas 3B and 4A. Reportedly, due to weather conditions, a 35 ft LOA vessel can only safely fish between May 15 and September 15. Additionally, fishing during the safest part of the summer window may not be possible for small vessels as processors may not be accepting halibut during the peak of the salmon fisheries. Category D vessels may thus be limited to a substantially shortened season, and forced to fish in less safe conditions in order to harvest their IFQ. As a result of these adverse conditions, it is reported that category D vessel owners would prefer to increase their QS holding by purchasing category B and C QS, rather than category D, with a view to increasing their vessel size in the future. Consequently, there is very little market for the category D QS, according to industry members.

This allegation was made to the Council in 1999. Since that time, through consolidation and changing use patterns in the fisheries, the achievement of TAC in the western areas has become much more reliable, even for smaller vessels. Table 7.3 below illustrates the achievement of TAC for category C and D IFQ allocations. The halibut harvest in Area 4C is consistently underachieved, but this appears to be due to a change in the location of the halibut stock rather than a safety issue (see NPFMC 2004 for further discussion.) Areas 3B, 4A, and 4B appear to have a high rate of harvest in 2003, with the exception of category D in Area 4B. It is unknown whether the consistently low harvest by small vessels in this area is related to safety concerns.

Table 7.3 Percent of category C and D IFQ harvested, by area, 1998-2003. Source: NMFS RAM.

Year	Area 3B		Area 4A		Area 4B		Area 4C	
	Category C	Category D	Category C	Category D	Category C	Category D	Category C	Category D
1998	93%	87%	89%	78%	68%	3%	69%	34%
1999	96%	93%	95%	90%	71%	0%	83%	47%
2000	97%	95%	98%	94%	89%	35%	84%	46%
2001	96%	88%	96%	86%	87%	44%	93%	39%
2002	98%	95%	99%	89%	88%	27%	74%	15%
2003	99%	94%	98%	96%	95%	42%	70%	4%

Table 7.4 illustrates the degree to which IFQ derived from categories B and C was used on vessels less than or equal to 35 ft LOA in 2003. With the exception of Area 4C, about half of the IFQ harvested on these vessels is 'fished down' from categories B and C.

[4]The Council called for and received proposals for amendments to the IFQ program in 1999 and 2003.

Table 7.4 Fish down on vessels less than or equal to 35 ft LOA, 2003. Source: NMFS RAM.

Area	Total IFQ (lb) landed from vessels 0-35'	Unique vessels 0-35' landing IFQ	IFQ derived from QS categories as % of total IFQ landed from vessels 0-35'			IFQ landed from 0-35' vessels as % of total IFQ derived from QS category		
			B	C	D	B	C	D
3B	992,492	37	16%	34%	50%	2%	5%	100%
4A	742,187	29	23%	32%	45%	6%	16%	100%
4B	77,230	3	–	42%	58%	–	7%	100%
4C	17,152	5	2%	–	98%	<1%	–	100%

Tables 6.2 and 6.3 show price data for QS holdings, by regulatory area, category, and blocked or unblocked status. While these tables do not necessarily provide a completely accurate understanding of the QS market (see discussion under Section 6.3 regarding these tables), they give a general indication of the relative value of QS. Table 6.2 illustrates that there were 14 priced transfers of category D QS in 2003 in Area 4A, and three in Area 3B. The value of category D blocked QS in the western areas seems to be consistently below category other categories of blocked QS in those areas, which is to be expected as the QS are more restrictive.

7.4 Effects of Alternatives 2-4

None of the alternatives are likely to change fishing patterns or harvest amounts to an extent that would result in an impact on the halibut stock, bycatch amounts, or other environmental impacts. There are no data to suggest that adverse impacts would result from a higher proportion of the harvest being taken on larger vessels. A summary of benefits and costs is included below in Table 7.6.

Alternative 2

Alternative 2 allows IFQ derived from category D QS to be fished on vessels less than or equal to 60 ft LOA. The QS remain designated as category D. This alternative directly affects 243 category D QS holders in the western areas, and indirectly affects category C QS holders in Areas 3B, 4A, 4B, and 4C.

Alternative 2 benefits category D QS holders as it relieves use restrictions and provides greater utility to their QS. It is likely that the price for category D QS would increase as a result of this alternative. Tables 6.2 and 6.3 give a general indication of the relative price of QS, although neither estimation is totally accurate (see caveats in the discussion of these tables in Section 6.3). The tables suggest that the difference in the value of category D blocked QS and category C blocked QS in the western areas ranges approximately from $0-3 per QS equivalent pound. The increase in value of category D QS may cause a corollary decrease in the value of category C QS, but except for Area 4C, category D QS represents a relatively small proportion of the QS pool (Table 7.2). In Area 4C, where 37.6% of the total QS pool is category D, the impact on prices may be more pronounced.

Operators of vessels of less than or equal to 35 ft LOA can continue to fish IFQ derived from any QS category on their vessels, so are unlikely to be adversely impacted by this change. On the contrary, those small vessel owners who have expressed safety concerns due to the short season in which they are forced to fish will have more options available. These vessel owners may choose to upgrade their vessel (as suggested in the proposal to the Council), or team with a larger vessel to fish their IFQ. Vessel owners may also choose to sell their QS and leave the halibut fishery. It is not known which option vessel owners are likely to select.

The increase in the value of category D QS may disadvantage new entrants to the fishery. Category D QS was originally intended in part to provide an affordable opportunity for crew members to buy in to the fishery. The difference between category C and D QS is discussed above, and ranges between $0-3 per pound. Table

7.5 indicates the current number of category D QS holders who are not initial issuees, i.e., they are crew members who have bought into the fishery, and also the amount of category D QS they control. The data in this table represent a point in time, and do not reflect any of the transfer history of QS held by non-initial issues. Except in Area 4B, initial issues still represent the majority of category D QS holders, however, new entrants for the most part control the majority of QS. To the extent that the higher price prevents crew members from being able to acquire QS, this action may be unfavorable to new entrants.

Table 7.5 Number of category D QS holders that are new entrants to the fishery, and the amount of QS controlled. Data as of October 19, 2004. Source: NMFS RAM.

Area	Total number of category D QS holders	Number of category D QS holders who are not initial issuees	Total category D QS	Category D QS held by non-initial issuees	% of category D QS held by non-initial issuees
3B	102	19	1,660,268	856,482	51.6%
4A	95	19	1,051,099	535,774	51.0%
4B	16	7	268,996	157,321	58.5%
4C	32	4	1,509,042	413,396	27.4%

It is difficult to distinguish between the regulatory areas in assessing the impacts of this alternative. It is not possible to determine what percentage of category D QS is held by local area residents, as addresses filed with NMFS are self-reported and need not be residential addresses. As illustrated in Table 7.2 and 7.3, 37 and 29 vessels 35 ft LOA or less, in Areas 3B and 4A respectively, harvested all but 5% of their IFQ derived from category D QS in 2003. In Area 4B, less than half of the IFQ derived from category D QS was harvested by 3 vessels, compared to a high harvest rate of IFQ derived from category C QS. In Area 4C, 5 vessels harvested only 4% of IFQ derived from category D QS, compared with a 70% harvest rate for IFQ derived from category C QS. Anecdotal evidence suggests that the low catch per unit effort in Area 4C, particularly closer to shore in locations accessible to smaller vessels, has resulted in some of those QS holders not fishing their IFQ. Instead, temporary construction projects in 2003 and 2004 may have provided work opportunities for some QS holders who would otherwise rely on IFQ fishery income.

From a management perspective, Alternative 2 would not be difficult to implement. No additional administrative, enforcement, or information costs would be incurred.

Alternative 3

Under this alternative, IFQ derived from category D QS could be fished on category B or C vessels, i.e., vessels of any length. This alternative directly affects 243 category D QS holders in the western areas, and indirectly affects category C QS holders in Areas 3B, 4A, 4B, and 4C.

This alternative increases the utility of category D QS by removing use restrictions. This is likely to increase its value, benefitting QS holders. Tables 6.2 and 6.3 suggest that the difference in price of category B blocked QS and category D blocked QS in the western areas ranges approximately from $1-4 per QS equivalent pound. The increase in category D QS value may affect the price of category B and C QS in the western areas. Category D QS represents only a small proportion of the total QS pool, however, ranging from 3% to 7% in all areas but Area 4C (Table 7.2). As a result, any impact on the value of category B and C QS is likely to be small. In Area 4C, category D QS represents over a third of the QS pool, and the alternative may impact the price of other categories of QS more.

This alternative will also increase the employability of crew members holding category D QS, as they may fish their IFQ on any catcher vessel. To the extent that the alternative increases consolidation, however, the overall number of crew positions available may decrease.

Although the category D QS pool is small in the western areas, except in Area 4C, Alternative 3 may also provide relief to large (greater than 60 ft LOA) vessel operators. Industry has identified, through the Council process[5], limitations of category B vessels that can only fish IFQ derived from category B QS. Acquiring additional category B QS can be difficult, as it can be purchased and used by any catcher vessel owner. As such, it can reportedly command a higher price, and does not frequently come on the market in some areas. Alternative 3 does not substantially increase the amount of QS available for large vessels, but it may provide some assistance.

As with Alternative 2, this alternative could address the safety concerns voiced by small vessel operators in the western areas, by allowing them the option to fish their QS on larger vessels. However, this alternative may also limit opportunities for crew members seeking to buy in to the fishery, by increasing the value of category D QS and decreasing their affordability for new entrants. Also as with Alternative 2, the relative impacts of the alternative by regulatory area are difficult to discern.

From a management perspective, Alternative 2 would not be difficult to implement. No other additional administrative, enforcement, or information costs would be incurred.

Alternative 4

As with Alternative 2, this alternative allows IFQ derived from category D QS to be fished on vessels less than or equal to 60 ft LOA. 670 distinct category C and D QS holders in Areas 3B, 4A, 4B, and 4C may be affected. Under Alternative 4, the QS would be reassigned as category C QS. This creates one practical difference from Alternative 2, namely that blocked former category D QS can be swept up with blocked category C QS.

Practically, Alternative 4 has the same impacts as Alternative 2. Additionally, the increased flexibility of being able to sweep up former category D QS blocks with category C QS blocks is likely to be beneficial to category C and D QS block holders. Also, a one-time increase in management effort would be required to reissue QS certificates to category D QS holders.

If this action is intended to be a permanent, Alternative 4 may be preferable to Alternative 2 for management and the public by simplifying the IFQ program and removing redundancy from the regulations. However, Alternative 4 complicates the ability of the Council or NMFS to reinstitute specific use restrictions for category D QS at some time in the future.

[5]The Council called for and received proposals for amendments to the IFQ program in 1999 and 2003.

Table 7.6 Summary of the benefits and costs of Action 6

	Alternative 1	Alternative 2	Alternative 3	Alternative 4
Impacts to the resource	• baseline	• none	• none	• none
Benefits	• baseline	• likely to increase the value of category D QS • addresses safety concerns by providing an alternative to fishing category D IFQ on a ≤35 ft LOA vessel	• likely to increase the value of category D QS • addresses safety concerns by providing an alternative to fishing category D IFQ on a ≤35 ft LOA vessel • may provide relief to large vessel owners who are experiencing difficulty in acquiring QS	• same as Alternative 2 • can sweep-up former category D QS blocks with category C QS blocks
Costs	• baseline	• may decrease value of category C QS, particularly in Area 4C • may decrease entry-level opportunities to fishery	• may decrease value of category B and C QS • may decrease entry-level opportunities to fishery	• same as Alternative 2 • complicates reinstating use restrictions on category D QS at some time in the future
Net benefits	• baseline	• increases efficiency by removing restrictions on category D QS; may also increase safety	• increases efficiency by removing restrictions on category D QS; may also increase safety	• increases efficiency by removing restrictions on category D QS; may also increase safety
Action objectives	• may not meet the safety objective	• meets safety objective	• meets safety objective	• meets safety objective

The total "standard" ex-vessel value taken in the commercial halibut fishery off Alaska in 2003 was approximately $167 million (NMFS, in prep.). This action only affects that sector of the fishery participating in Areas 3B, 4A, 4B, and 4C. Only 45% of the total halibut harvest is allocated to these areas (NMFS 2003c). The proposal under consideration will make minor changes in these fisheries. Although it has not been possible to monetize the benefits and costs from these proposed program changes, their total net impact on the economy will be far below $100 million, annually. These proposals generally have little attributable cost and are expected to produce benefits for industry. For these reasons, they are unlikely to adversely and materially affect the economy, a sector of the economy, productivity, competition, jobs, the environment, public health or safety, or State, local, or tribal governments or communities. These programs are not likely to meet the economic criterion for significance under EO 12866.

7.5 Initial Regulatory Flexibility Analysis

This IRFA describes the impact on small entities of the proposed alternatives for amending halibut QS categories in Areas 3B, 4A, 4B, 4C, and 4D. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

Halibut fishermen in western Alaska have identified safety concerns when fishing in those areas on small vessels, which could be alleviated by relaxing the restrictions on category D QS. The problem statement is discussed in detail in Section 7.1, above.

Description and estimate of small entities

The action could potentially affect 243 category D halibut QS holders in Areas 3B, 4A, 4B, and 4C. At present, NMFS does not have sufficient ownership and affiliation information to determine precisely the number of small entities in the IFQ program or the number that would be adversely impacted by the present action. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Alternatives considered and their impact on small entities

This analysis reviews the status quo and three alternatives to the existing requirements. Two alternatives allow category D QS to be fished on vessels less than or equal to 60 ft LOA, and one alternative allows category D QS to be fished on vessels of any size. The alternatives are explained in Section 7.2, and the following summary of impacts on small entities distilled is from the discussion in Sections 7.3 and 7.4.

Alternative 1 is a no action alternative and would not have any associated adverse economic impacts on directly regulated small entities.

Alternatives 2, 3 and 4 would allow category D QS to be fished on larger vessels: equal to or less than 60 ft LOA for Alternatives 2 and 4, and vessels of any size for Alternative 3. These alternatives could address safety concerns for small vessel operators. As these alternatives are likely to increase the value of category D QS, there may be some corollary decrease in the value of category C QS, and also category B QS in the case of Alternative 3. However, there would be no differential impacts on the basis of size of the regulated entity attributable to this proposed action, because all are "small" on the basis of RFA criteria.

Description of compliance requirements

No additional recordkeeping and reporting requirements are associated with this action.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

8.0 Action 7: Amend fish down regulations for Area 2C halibut and Southeast Outside District sablefish

As described in Section 7.0 above, an amendment to the initially implemented IFQ program allowed category B and C QS to be fished on smaller vessels as of August 1996, except in Area 2C for halibut and in the Southeast Outside District for sablefish. The Council's rationale for the 'fish down' amendment was to increase the flexibility and efficiency of the IFQ fleet. Small boat fishermen had reported a scarcity of medium or large sized QS blocks (i.e., blocks greater than 5,000 lb) available to smaller vessels. Owners of vessels greater than 60 ft LOA reported difficulties in using or marketing small category B blocks and requested the opportunity either to downsize operations or to sell smaller QS blocks to owners of small vessels (NPFMC 1996a).

The Council adopted the fish down amendment for all IFQ areas except Area 2C and the Southeast Outside District. The proportion of category B QS available in Area 2C and Southeast Outside District is substantially less than in other areas. In order to achieve the Council's overriding goal to preserve diversity in the IFQ fisheries, and to prevent excessive consolidation, in this case, among small boat owners in areas where category B QS is limited, the Council chose to apply a modified fish down amendment for Area 2C and Southeast Outside District. Only category C QS, and category B QS blocks of less than or equal to 5,000 lb (based on 1996 TACs), may be fished on smaller vessels in those areas.

8.1 Problem and management objectives for the action

In 1996, the Council adopted a regulatory change that allowed category B QS to be fished on vessels under 60 ft LOA. At that time, certain QS in the Southeast Outside District sablefish and Area 2C halibut fisheries were identified as ineligible for "fish down". This was an attempt to ensure category B QS would be available to vessels over 60 ft LOA. Recently, this prohibition has been identified as unnecessary by some fishermen, and therefore should be reexamined.

8.2 Management Action Alternatives

Two alternatives are considered for this management action.

Alternative 1 No action

Currently in Area 2C for halibut and Southeast Outside District for sablefish, category B QS must be used on a vessel greater than 60 ft LOA, with the exception that category B QS blocks of less than 33,321 halibut or 33,271 sablefish QS units may be fished on vessels of any size.

Alternative 2 Eliminate the exception to the fish down regulations for Area 2C halibut and Southeast area sablefish

This alternative allows IFQ derived from all category B QS to be fished on vessels of any length in all halibut and sablefish IFQ areas.

8.3 Alternative 1 - No action

Under the current regulations, IFQ derived from category B QS must be used on vessels greater than 60 ft LOA in Area 2C and the Southeast Outside District, unless the QS is a block of less than or equal to 5,000 lb, based on 1996 TACs. As indicated in Table 8.1, category B QS represents a very small percentage of total halibut QS in Area 2C, and a relatively small proportion of total sablefish QS in Southeast Outside District.

Table 8.1 QS units by category and area. Data as of end of 2003. Source: NMFS RAM.

Area	Total QS units	Equivalent IFQ (lb) in 2004	Category A % of total	Category B % of total	Category C % of total	Category D % of total
2C	59,632,055	10,500,000	2.1%	4.5%	78.4%	15.1%
SE	66,119,746	8,311,342	9.3%	20.3%	70.4%	0

Table 8.2 illustrates the eligibility of category B QS holdings for fish down in Area 2C and Southeast Outside District. 75% of halibut category B QS is ineligible for fish down, and 96% of sablefish category B QS. About half of the halibut ineligible category B QS is blocked, with block sizes ranging from 6,000 to 17,000 lb, based on the 2004 TACs. Only 7% of the sablefish ineligible category B QS is blocked.

Table 8.2 Eligibility of category B QS holdings for fish down.

Area	% of category B QS eligible	% of category B QS ineligible	Number of ineligible blocks	Range of ineligible block size, in lb[1]	Total ineligible blocks, in lb[1]	Total ineligible unblocked, in lb[1]
2C	25%	75%	20	6,000-17,000	176,707	175,292
Southeast Outside	4%	96%	16	4,000-10,000	114,490	1,505,997

[1] based on 2004 TACs

Industry members, through the Council process[6], have cited that the discrepancy between the use restrictions on category B QS in Southeast Alaska compared to the rest of the state is discriminatory to QS holders in those areas. Consequently, all category B QS should be eligible for fish down.

8.4 Effects of Alternative 2

A summary of costs and benefits is detailed in Table 8.3 below.

Alternative 2 would allow all category B QS to be fished on a vessel of any length. Holders of category B QS that is currently ineligible for fish down would be directly affected by this alternative, through the change in the use restrictions applied to their QS holding. Operators of vessels of 60 ft LOA or less would now be able to fish any category B QS on their vessels. Other category B QS holders, and category C and D QS holders, would be indirectly affected to the extent that the change in use restrictions affects the price of their QS holdings. There are a maximum of 1,414 category B, C, and D halibut QS holders in Area 2C, and a maximum of 440 category B and C sablefish QS holders in the Southeast Outside District.

Table 8.2 describes the eligibility of category B QS holdings for fish down. A total of 1,996,568 QS units of halibut, or 351,999 lb of IFQ based on the 2004 TACs, and 12,891,624 QS units of sablefish, or 1,620,487 lb of IFQ based on the 2004 TACs, would be reassigned under this alternative.

Alternative 2 could benefit some category B QS holders who are currently ineligible for fish down, as it increases the available market for their QS. Category B QS can now be used on a vessel of any size. There is no information to determine the market value of category B QS that is eligible for fish down versus those that are not. However, it can be inferred that the QS that is less restrictive, i.e., eligible for fish down, is likely to be more valuable. As a result, the value of currently ineligible category B QS is likely to increase because of this alternative.

The degree to which the increase in price of currently ineligible category B QS may affect other category B QS, or category C and D QS, is unknown. In the case of halibut, the effect is likely to be limited, as ineligible category B QS represents only a small percentage of the QS pool (approximately 3%). For sablefish, the alternative will change the use restrictions for approximately 19% of the QS pool, and any effects may consequently be more pronounced.

The alternative could potentially be detrimental to large (greater than 60 ft LOA) vessel fishing operations, who may experience greater difficulty in acquiring QS. Large vessels may only harvest IFQ derived from category B QS. If category B QS may be used on smaller vessels, there may be less category B QS available to the large vessels. Particularly for halibut in Area 2C, this may create an adverse impact as only 4.5% of the total QS pool is category B (Table 8.1), and of this, 25% is already eligible for fish down (Table 8.2).

[6]The Council called for and received proposals for amendments to the IFQ program in 1999 and 2003.

Small (60 ft LOA or less) vessel owners may benefit from the potentially increased availability of medium and large QS blocks, and unblocked QS. However, the additional category B blocks represent only a small increase to the comparably sized QS blocks already available in category C and D QS. For example, 20 category B halibut QS blocks would eligible for fish down under Alternative 2, ranging in size from 6,000 to 17,000 lb based on the 2004 TACs (Table 8.2). There are 344 comparably sized category C halibut blocks, and 54 category D halibut blocks in the fishery, with a total poundage of approximately 4 million, based on 2004 TACs. For halibut, half of the currently ineligible QS is blocked. For sablefish, only a small proportion of ineligible QS is blocked. There are 101 blocks in the fishery of a comparable size to the 16 category B QS blocks (Table 8.2) that would become eligible for fish down under this alternative.

Over the long term, this alternative may change the diversity of the IFQ fleet in Southeast Alaska by decreasing the number of large catcher vessels participating in the fishery.

Alternative 2 is not likely to impact the halibut or sablefish resources. The TAC is unaffected by this alternative, and the stocks will continue to be fully harvested. This alternative would simplify management as it eliminates current exceptions to the regulations. No additional administrative, enforcement, or information costs would be incurred.

Table 8.3 Summary of the benefits and costs of Action 7

	Alternative 1	Alternative 2
Who is affected	• none	• Category B, C, and D QS holders in Area 2C and Southeast Outside District
Impacts to the resource	• baseline	• none
Benefits	• baseline	• increases marketability and potentially value of unblocked and larger blocks of category B QS
Costs	• baseline	• may prove difficult for vessels > 60' LOA to acquire QS, due to relative scarcity of QS
Net benefits	• baseline	• benefits of greater category B market may not outweigh increased difficulty of vessels > 60' LOA to acquire QS
Action objectives	• exemption may be necessary	• exemption may be necessary

The total “standard” ex-vessel value taken in the commercial halibut fishery off Alaska in 2003 was approximately $168 million, and for the commercial sablefish fishery was approximately $73 million (NMFS, in prep.). This action would only affect that sector of the fishery participating in Area 2C and the Southeast Outside District. Only 14% of the total halibut harvest is allocated to Area 2C, and 23% of the total sablefish harvest is allocated to the Southeast Outside District (NMFS 2003c). The proposal under consideration will make minor changes in these fisheries. Although it has not been possible to monetize the benefits and costs from these proposed program changes, their total net impact on the economy will be far below $100 million, annually. These proposals generally have little attributable cost and are expected to produce benefits for industry. For these reasons, they are unlikely to adversely and materially affect the economy, a sector of the economy, productivity, competition, jobs, the environment, public health or safety, or State, local, or tribal governments or communities. These programs are not likely to meet the economic criterion for significance under EO 12866.

8.5 Initial Regulatory Flexibility Analysis

This IRFA describes the impact on small entities of the proposed alternatives for amending fish down regulations for Area 2C halibut and Southeast Outside District sablefish. A complete description of the requirements of the Regulatory Flexibility Act is set out in Section 1.3.

Reason for action and objectives

In 1996, the Council adopted a regulatory change that allowed category B quota share to be fished on vessels under 60 ft LOA. At that time, certain quota share holdings in the Southeast Outside District sablefish and Area 2C halibut fisheries were identified as ineligible for "fish down". This was an attempt to ensure category B quota share would be available to vessels 60 ft LOA or greater. However, some fishermen have recently identified this prohibition as unnecessary. The problem statement is also discussed in Section 8.1, above.

Description and estimate of small entities

The action could potentially affect 72 holders of category B halibut QS in Area 2C, and 87 persons who hold category B sablefish QS in the Southeast Outside District. Indirectly, the action may affect 22 owners of vessels greater than 60 ft LOA who made landings in 2003 in the halibut fisheries in Area 2C, 40 large vessel owners who landed sablefish in Southeast Outside in 2003, 825 persons who are category B, C, or D halibut QS holders in Area 2C, and 436 persons who are category B or C sablefish QS holders in Southeast Outside. At present, NMFS does not have sufficient ownership and affiliation information to determine precisely the number of small entities in the IFQ program or the number that would be adversely impacted by the present action. For the reasons discussed in Section 1.3, this analysis assumes that all operations are small.

Alternatives considered and their impact on small entities

This analysis reviews the status quo and an alternative to allow category B QS to be fished on a vessel of any length. The alternatives are explained in Section 8.2, and the following summary of impacts on small entities distilled is from the discussion in Sections 8.3 and 8.4.

Alternative 1 is a no action alternative and would not have any associated adverse economic impacts on directly regulated small entities.

Alternative 2 allows all category B QS to be fished on any vessel size. The alternative may disadvantage large (greater than 60 ft LOA) vessel operations that can only harvest category B QS onboard, as it would allow category B QS to be used by vessels of any size. As discussed above, the relative scarcity of category B QS in Southeast Alaska may mean that large vessel operations experience difficult in acquiring QS. However, there would be no differential impacts on the basis of size of the regulated entity attributable to this proposed action, because all are "small" on the basis of RFA criteria.

Description of compliance requirements

No additional recordkeeping and reporting requirements are associated with this action.

Identification of relevant Federal rules

NMFS is not aware of any other Federal rules that would duplicate, overlap, or conflict with this action.

Description of significant alternatives that minimize adverse impacts on small entities

NMFS is not aware of any alternatives in addition to the alternatives considered that would accomplish the objectives of the Magnuson-Stevens Act and other applicable statutes and that would minimize the economic impact of the proposed rule on small entities.

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Appendix 1. Vessel Clearance in Area 4.

(1) The operator of any vessel that fishes for halibut in Areas 4A, 4B, 4C, or 4D must obtain a vessel clearance before fishing in any of these areas, and before the landing of any halibut caught in any of these areas, unless specifically exempted in paragraphs (10), (13), (14), (15), (16), or (17).

(2) An operator obtaining a vessel clearance required by paragraph (1) must obtain the clearance in person from the authorized clearance personnel and sign the IPHC form documenting that a clearance was obtained, except that when the clearance is obtained via VHF radio referred to in paragraphs 5, 8, and 9, the authorized clearance personnel must sign the IPHC form documenting that the clearance was obtained.

(3) The vessel clearance required under paragraph (1) prior to fishing in Area 4A may be obtained only at Nazan Bay on Atka Island, Dutch Harbor or Akutan, Alaska, from an authorized officer of the United States, a representative of the Commission, or a designated fish processor.

(4) The vessel clearance required under paragraph (1) prior to fishing in Area 4B may only be obtained at Nazan Bay on Atka Island or Adak, Alaska, from an authorized officer of the United States, a representative of the Commission, or a designated fish processor.

(5) The vessel clearance required under paragraph (1) prior to fishing in Area 4C or 4D may be obtained only at St. Paul or St. George, Alaska, from an authorized officer of the United States, a representative of the Commission, or a designated fish processor by VHF radio and allowing the person contacted to confirm visually the identity of the vessel.

(6) The vessel operator shall specify the specific regulatory area in which fishing will take place.

(7) Before unloading any halibut caught in Area 4A, a vessel operator may obtain the clearance required under paragraph (1) only in Dutch Harbor or Akutan, Alaska, by contacting an authorized officer of the United States, a representative of the Commission, or a designated fish processor.

(8) Before unloading any halibut caught in Area 4B, a vessel operator may obtain the clearance required under paragraph (1) only in Nazan Bay on Atka Island or Adak, by contacting an authorized officer of the United States, a representative of the Commission, or a designated fish processor by VHF radio or in person.

(9) Before unloading any halibut caught in Area 4C or 4D, a vessel operator may obtain the clearance required under paragraph (1) only in St. Paul, St. George, Dutch Harbor, or Akutan, Alaska, either in person or by contacting an authorized officer of the United States, a representative of the Commission, or a designated fish processor. The clearances obtained in St. Paul or St. George, Alaska, can be obtained by VHF radio and allowing the person contacted to confirm visually the identity of the vessel.

(10) Any vessel operator who complies with the requirements in section 18 for possessing halibut on board a vessel that was caught in more than one regulatory area in Area 4 is exempt from the clearance requirements of paragraph (1) of this section, provided that: (a) The operator of the vessel obtains a vessel clearance prior to fishing in Area 4 in either Dutch Harbor, Akutan, St. Paul, St. George, Adak, or Nazan Bay on Atka Island by contacting an authorized officer of the United States, a representative of the Commission, or a designated fish processor. The clearance obtained in St. Paul, St. George, Adak, or Nazan Bay on Atka Island can be obtained by VHF radio and allowing the person contacted to confirm visually the identity of the vessel. This clearance will list the Areas in which the vessel will fish; and (b) Before unloading any halibut from Area 4, the vessel operator obtains a vessel clearance from Dutch Harbor, Akutan, St. Paul, St. George, Adak, or Nazan Bay on Atka Island by contacting an authorized officer of the United States, a representative of the Commission, or a designated fish processor. The clearance obtained in St. Paul or St. George can be obtained by VHF radio and allowing the person contacted to confirm visually the identity of the vessel. The clearance obtained in Adak or Nazan Bay on Atka Island can be obtained by VHF radio.

(11) Vessel clearances shall be obtained between 0600 and 1800 hours, local time.

(12) No halibut shall be on board the vessel at the time of the clearances required prior to fishing in Area 4.

(13) Any vessel that is used to fish for halibut only in Area 4A and lands its total annual halibut catch at a port within Area 4A is exempt from the clearance requirements of paragraph (1).

(14) Any vessel that is used to fish for halibut only in Area 4B and lands its total annual halibut catch at a port within Area 4B is exempt from the clearance requirements of paragraph (1).

(15) Any vessel that is used to fish for halibut only in Area 4C and lands its total annual halibut catch at a port within Area 4C is exempt from the clearance requirements of paragraph (1).

(16) Any vessel that is used to fish for halibut only in Areas 4D or 4E and lands its total annual halibut catch at a port within Areas 4D, 4E, or the closed area defined in section 10, is exempt from the clearance requirements of paragraph (1).

(17) Any vessel that carries a transmitting VMS transmitter while fishing for halibut in Area 4A, 4B, 4C, or 4D and until all halibut caught in any of these areas is landed is exempt from the clearance requirements of paragraph (1) of this section, provided that: (a) The operator of the vessel complies with NMFS' vessel monitoring system regulations published at 50 CFR sections 679.28(f)(3), (4) and (5); and (b) The operator of the vessel notifies NOAA Fisheries Office for Law Enforcement at 800–304–4846 (select option 1 to speak to an Enforcement Data Clerk) between the hours of 0600 and 0000 (midnight) local time within 72 hours before fishing for halibut in Area 4A, 4B, 4C, or 4D and receives a VMS confirmation number.

Appendix 2. Product recovery rates for bled sablefish

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ABSTRACT

Accurate catch estimates are necessary for successful fishery management. Catch weights may be affected by fish bleeding; a practice fishermen use to ensure product quality. We conducted field experiments during July 2002 and July 2003 in the Gulf of Alaska to estimate the change in fish weight due to blood loss for sablefish. Fish weights were compared before and after bleeding. Sablefish lost more weight when bled without seawater (2.0%) than when immersed in flowing seawater (1.6%). Sablefish lost more weight when carefully brought aboard (2.0%) than when gaffed aboard (1.7%) (bled without flowing seawater). Gaffed sablefish lost weight even when not intentionally bled (1.0%) because of blood loss at the gaff wound. The product recovery rate (PRR) currently applied by fishery managers to estimate catch weight for bled sablefish (2.0%) slightly overestimates "blood loss" for fish gaffed aboard (1.7%). The PRR applied by fishery managers for unbled sablefish (0.0%) underestimates "blood loss" for fish gaffed aboard (1.0%). Estimating the actual change in weight due to blood loss for a commercial fishing trip is difficult because it requires accounting for storage methods and handling practices.

INTRODUCTION

Some fishermen bleed sablefish (*Anoplopoma fimbria*) to ensure product quality. Fish are bled by breaking or cutting gill rakers, then allowing the fish to bleed. The amount of blood lost likely is affected by several factors, some under the fishermen's control and others not. Storage methods (ice or refrigerated seawater) and handling practices (gaffing, hook removal devices, and soak time) affect blood loss.

The National Marine Fisheries Service (NMFS) applies a product recovery rate (PRR) for round, bled sablefish of 0.98 (NMFS product code 03) (Low et al. 1989). The PRR is used to estimate the live weight of landed of bled sablefish by dividing the landed weight by 0.98. The current PRR dates back to the early 1980s and it is not known whether the figure was verified for sablefish[1]. Besides attempting to accurately estimate catch, the PRR also is important to fishermen because it affects the amount subtracted from the fishermen's individual quota with each delivery of bled sablefish.

Estimating an accurate PRR is challenging because several variables need testing. An experiment designed to estimate the actual PRR for sablefish would need to address storage methods and handling practices. Our approach was to estimate the change in weight due to blood loss expected for 4 treatments under controlled conditions. This approach both reduced the number of treatments and fit the length of field time available for this experiment. The study was a cooperative project between the Alaska Longline Fishermen's Association and the NMFS Auke Bay Laboratory. The data were collected during the 2002 and 2003 NMFS sablefish longline surveys.

[1] Galen Tromble, Fishery Management Biologist, NMFS Alaska Regional Office, P. O. Box 21668, Juneau, AK 99801. Pers. commun., May 2002.

MATERIALS AND METHODS

The experiments were conducted on 25-26 July 2002 and 25-26 July 2003, on the upper continental slope near Yakutat Bay in the Gulf of Alaska. The chartered U.S. longline vessels, the F/V *Alaskan Leader* (overall length of 46 m) in 2002 and the F/V *Ocean Prowler* (overall length of 47 m) in 2003, deployed baited longline gear. Size 13/0 Mustad[2] circle hooks were hand baited with chopped squid (*Illex* spp.). Three sets of 2,672 hooks each were deployed each day for a total of 6 sets during the 2-day experiment. Setting started at 0630 hours and retrieval started at 0930 hours. Soak time ranged from 3 to 8 hours.

In 2002, fish were carefully released from the hook, dropped into a net, and then brought aboard the vessel to obtain an initial live weight. Only active fish in good condition were chosen. Fish were weighed before bleeding in a closed plastic pipe to still the fish. Fish were weighed with a Marel M1100 motion compensated marine scale. Scale accuracy was ± 2.5 g. The scale was calibrated at the beginning of each set retrieval. The closed plastic pipe was 15.2 cm diameter and 45.7 cm long and constructed of PVC. Neoprene fabric covered one end. The pipe rested in a cradle during weighing. After weighing, fish were marked with a unique tag and the 2 most posterior gill rakers on the fish's right side were cut. Two treatments were carried out to test how handling practices affect blood loss. In the 1st treatment, fish were placed in a tank filled with flowing seawater to bleed. In the 2nd treatment, fish were placed in a tub without seawater to bleed. Slime was wiped off fish in the latter sample before weighing post-bleeding. Clotted blood in the gill rakers was left in place.

In 2003, fish were gaffed aboard the vessel rather than carefully releasing them from the hook as in 2002. Gaffing is the normal method of bringing fish aboard during longline fishing. Only active fish in good condition (before gaffing) were chosen. Fish were weighed immediately after gaffing in the closed plastic pipe. After weighing, fish were marked with a unique tag. Two treatments were carried out to test how handling practices affect blood loss. In 1 treatment, the 2 most posterior gill rakers on the fish's right side were cut. In a 2nd treatment, the gill rakers were not cut. Fish in both treatments were placed in a tub without seawater to bleed. Slime was wiped off fish before weighing post-bleeding. Clotted blood in the gill rakers was left in place. The experimental treatments during 2002 and 2003 are summarized in Figure 1.

Sampled sablefish were chosen by chance. After weighing one fish, the next fish retrieved from the longline was chosen for processing. The ratio of the post-bleeding and live weight was computed for each sampled sablefish. For example, if the live weight was 3.5 kg and the post-bleeding weight was 3.45 kg, then the ratio is 0.986. The distributions of ratios for sablefish bled without flowing seawater were skewed and not normal. The transformations of log, square root, reciprocal, and arcsine-square root did not change the distributions from skewed to normal. The median may be preferred to the mean for expressing central tendency for skewed populations (Zar 1984). The median ratio was computed for each treatment and a confidence interval for the median was estimated (Zar 1984). The bootstrap method (Efron and Tibshirani 1986) also was applied to estimate the confidence interval and gave similar results to the method described in Zar (1984).

[2] Reference to trade names does not imply endorsement by the National Marine Fisheries Service, NOAA.

RESULTS

The total sample size was 611 sablefish (Table 1). Sample size by treatment ranged from 74 to 252 fish. Average fish size was 3.7 kg round weight (Figure 2). Sablefish bled in flowing seawater frequently gained weight (Figure 3A), whereas all but 1 sablefish bled without seawater weighed less after bleeding (Figures 3B-D). For sablefish carefully brought aboard and with gills cut, the median ratio was 0.984 for sablefish bled in flowing seawater and 0.980 for sablefish bled without seawater (Table 1). These medians imply that blood loss typically is 1.6% for sablefish bled in flowing seawater and 2% for sablefish bled without seawater. For sablefish gaffed aboard and bled without flowing seawater, the median ratio was 0.983 for sablefish with gills cut and 0.990 for sablefish with gills left intact. These medians imply that blood loss typically is 1.7% for gills cut and 1.0% for gills left intact.

DISCUSSION

Weight measurements

The change in weight due to blood loss was measured precisely. The 95% confidence intervals for the medians were narrow. For example the interval was only 0.982–0.985 for sablefish bled in flowing seawater, a range of only 0.003. The range of confidence intervals was narrow for all treatments, only 0.003-0.007.

Sablefish lost more weight when bled without seawater (2.0%) than with flowing seawater (1.6%) (gills cut, fish carefully brought aboard). The hydrostatic pressure of the water in the bleeding tank may act on the severed blood vessels to reduce blood volume loss. Alternatively, the heart, which continues to pump after the gill rakers are cut, may siphon seawater into the fish's circulatory system, replacing the blood with seawater and possibly increasing circulatory system fluid volume. Finally, some water may have remained in the stomach of fish bled in flowing seawater, even though efforts were made to evacuate all water from the stomach prior to the post-bleeding weighing.

Sablefish lost more weight when carefully brought aboard (2.0%) than when gaffed aboard (1.7%) (gills cut, bled without flowing seawater). Fishermen gaff the fish's head, usually stunning the fish. Blood loss is reduced, probably because of the blow. Sablefish lost weight even when not intentionally bled (1.0%), probably because of blood loss at the gaff wound (gills left intact, bled without flowing seawater).

Accuracy of currently applied PRR

The National Marine Fisheries Service applies an adjustment to landings of bled sablefish that implies blood loss is 2% of body weight (PRR = 0.98, bled fish, product code 03). Gaffing fish is the normal method of bringing fish aboard during longline fishing. We found that blood loss is slightly less, 1.7% of body weight for bled sablefish that are gaffed aboard. The implied PRR is 0.983 rather than the current 0.98. No adjustment currently is applied for sablefish not deliberately bled (PRR = 1.0, whole fish, product code 01) (Low et al. 1989); however, we found that blood loss is 1.0% of body weight for sablefish that are gaffed aboard. The implied PRR is 0.99 rather than the current 1.0.

Historic catch estimates represent the weight of sablefish after gaffing, rather than live weight, because most sablefish were gaffed aboard, classified as whole fish, and the PRR of 1.0 was applied. Fishery catches as well as catches from sablefish longline surveys are affected. Thus, historic catches underestimate the live weight of the catch by 1%.

Ability to measure and apply an accurate PRR

Common handling practices and storage methods affect blood loss. On sets left to soak overnight, a common practice in the fishery, some fish are dead, some are in poor condition, and some are active. Blood loss from fish retrieved dead or in poor condition, although not measured, likely is negligible and would reduce average blood loss accordingly. Conversely, we found fish bled in flowing seawater frequently gained weight. Therefore, blood loss may be different for fish stored in refrigerated seawater compared to fish stored on ice.

Measuring and applying an accurate PRR is difficult given the variety of conditions existing in the fishery. Measuring an accurate PRR requires further studies of the effects of storage methods (ice or refrigerated seawater) and handling practices (gaffing, hook removal devices, and soak time), which would be time-consuming to complete. Applying the results of these studies would be difficult because the storage methods and handling practices would need quantification for each trip (e.g. percentage of fish retrieved dead). Accurately accounting for these factors would be complex and difficult, especially because blood loss is low.

ACKNOWLEDGEMENTS

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Table 1. Median blood loss and 95% confidence intervals for median by treatment.

Treatment	Median	Lower 95% confidence interval	Upper 95% confidence interval	Sample size
Carefully released from hook, gills cut, bled in flowing seawater	0.984	0.982	0.985	252
Carefully released from hook, gills cut, bled without flowing seawater	0.980	0.976	0.983	74
Gaffed aboard, gills cut, bled in tub without flowing seawater	0.983	0.981	0.985	128
Gaffed, gills left intact, bled in tub without flowing seawater	0.990	0.988	0.991	157

FIGURES

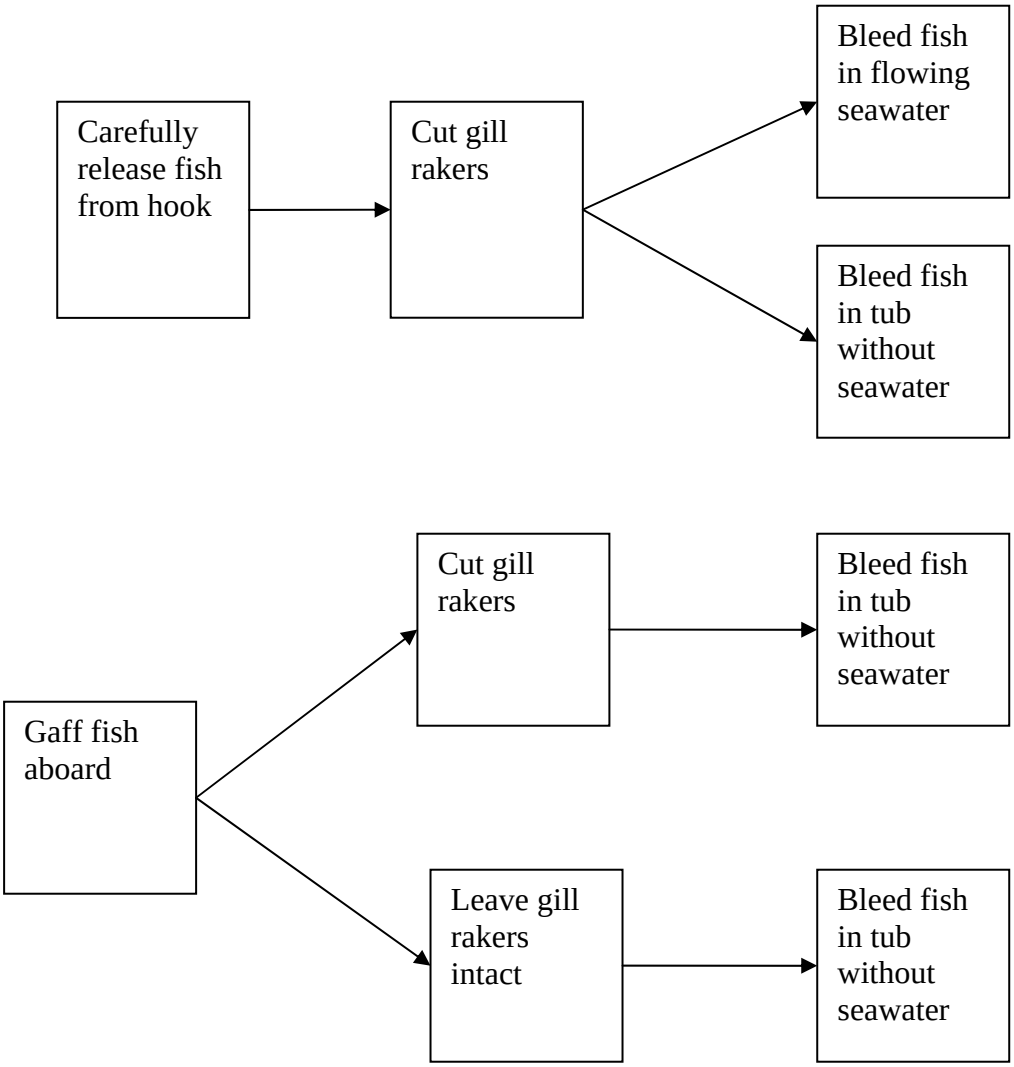

Figure 1. Flow diagram of experimental treatments.

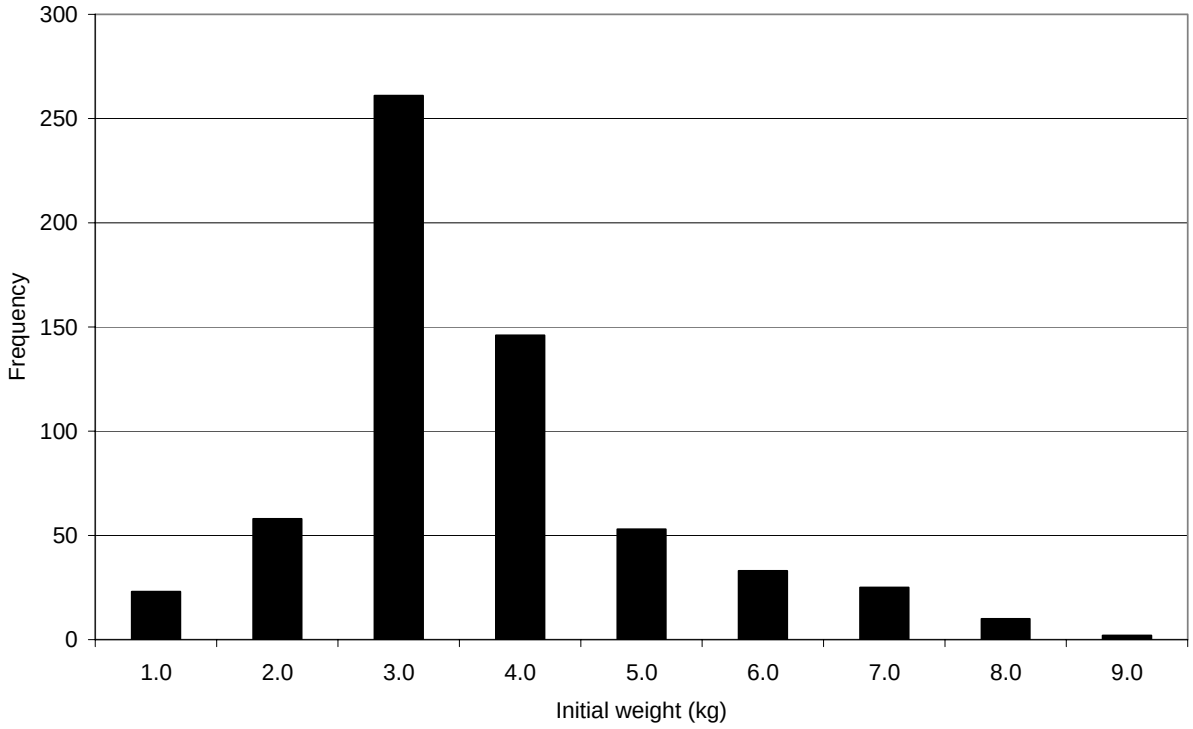

Figure 2. Size distribution (live weight in kilograms, rounded to the nearest kilogram) of sablefish sampled in the bleeding study.

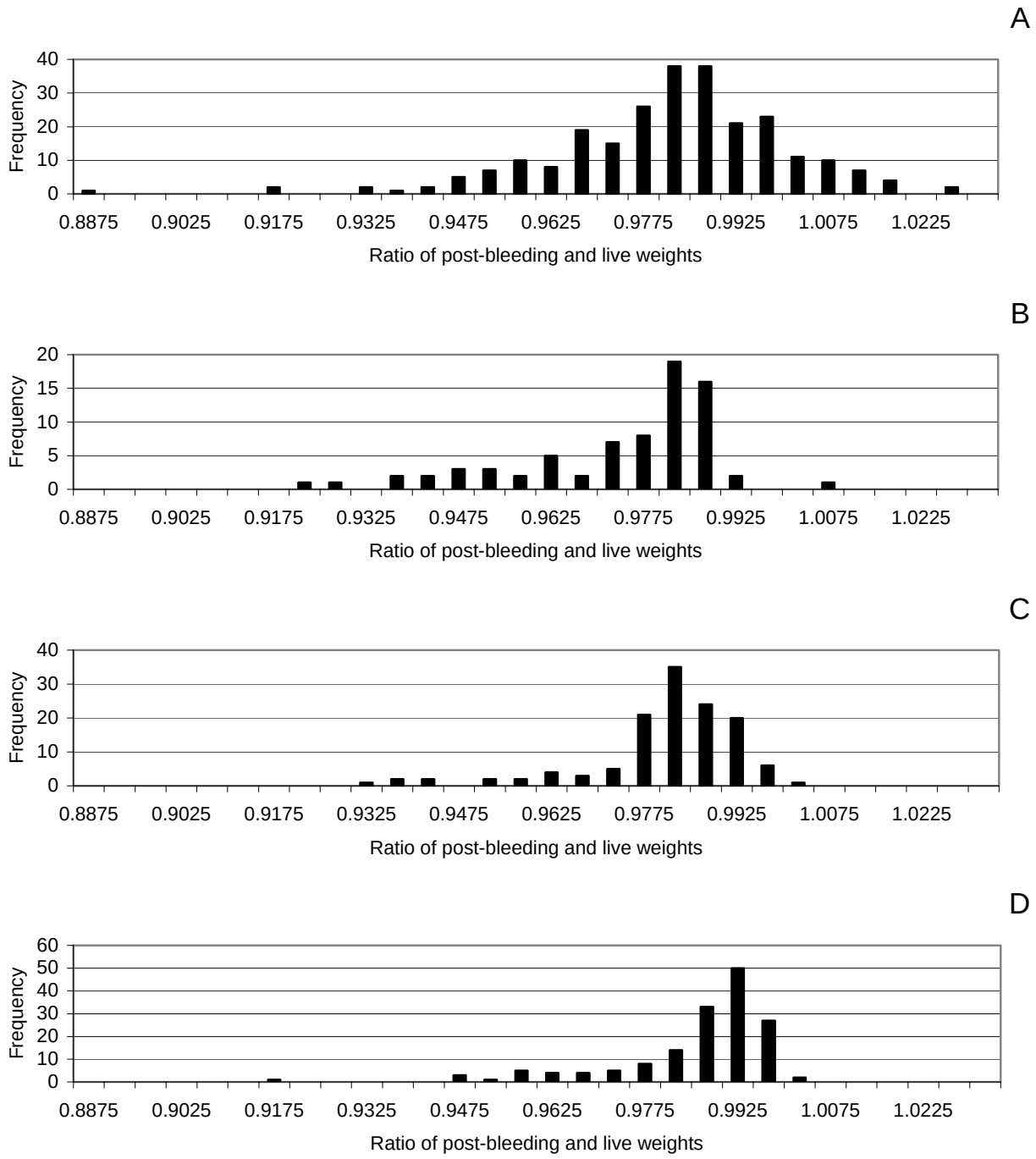

Figure 3. Frequency distributions of post-bleeding weight to live weight of sablefish bled without flowing seawater. A. Carefully released from hook, gills cut, bled in flowing seawater. B. Carefully released from hook, gills cut, bled in tub without seawater. C. Gaffed aboard, gills cut, bled in tub without seawater. D. Gaffed aboard, gills left intact, bled in tub without seawater.