

Draft Wreckfish Individual Transferable Quota (ITQ) Program Review

I. Introduction

The Reauthorized Magnuson-Stevens Fishery Conservation and Management Act (MSA) requires that any limited access privilege program to harvest fish submitted by a Council or approved by the Secretary—

include provisions for the regular monitoring and review by the Council and the Secretary of the operations of the program, including determining progress in meeting the goals of the program and this Act, and any necessary modification of the program to meet those goals, with a formal and detailed review 5 years after the implementation of the program and thereafter to coincide with scheduled Council review of the relevant fishery management plan (but no less frequently than once every 7 years).

This document is intended to serve as a formal and detailed review of the Wreckfish ITQ program.

Wreckfish (*Polyprion americanus*) are distributed globally in temperate waters including both sides of the North Atlantic Ocean (Sedberry 1996, Vaughan et al. 2001). In the western Atlantic, wreckfish occur from Grand Banks, Newfoundland, to La Plata River, Argentina. Juveniles are rare in the western Atlantic, but common in the eastern Atlantic. As juveniles, wreckfish are pelagic and can achieve sizes of 20 to 30 cm for the first several years of their life. In addition, juvenile wreckfish are often associated with floating debris (Roberts 1989), the habitat responsible for their common name. Based on genetic work conducted by Sedberry et al. (1996), the North Atlantic wreckfish is believed to be one stock that drifts or migrates across the North Atlantic. Wreckfish grow to a large size (100 kg weight, and 2 m length), and are commercially fished in portions of their range (Roberts 1989).

Adult wreckfish are found at depths of 138-3,280 feet (42-1,000 m). Wreckfish spawn off the southeastern United States on the Blake Plateau between December and March. Wreckfish were discovered by fishermen in commercial concentrations on the Blake Plateau in deep water located about 120 nautical miles east of Savannah, Georgia in the mid 1980s (SAFMC 1999). They are caught at depths from 1,500-2,000 feet (450-600 m) over rocky ridge systems. The average weight of wreckfish caught during the 1980s and 1990s was just over 13 kg (30 pounds) (Vaughan 1998).

Longliners retrieving pieces of parted longline gear first caught wreckfish in the mid 1980s. Later, hydraulic reels with baited hooks were developed to exploit this fishery. The fishery expanded rapidly from two vessels landing fewer than 30,000 pounds in 1987 to six vessels with landings of over 300,000 pounds in 1988, and about 25 vessels landing over two million pounds in 1989. In 1990, about four million pounds of wreckfish were landed by 40 vessels. In response to the rapid growth of the fishery, the South Atlantic Fishery Management Council (Council) added wreckfish to the Snapper Grouper management unit via Amendment 3 (SAFMC,1990) to the Snapper Grouper FMP. Amendment 3 also established a permit system, as well as a total allowable catch (TAC), a control date, and a spawning season closure. In September 1991, the Council established the individual transferable quota (ITQ)

program for the wreckfish fishery which provides shareholders with an allocation of the TAC (SAFMC, 1991).

The Wreckfish ITQ was implemented by the Council in March 1992 through Snapper Grouper Amendment 5. The overall goal of the South Atlantic Wreckfish ITQ is to “manage the wreckfish sector of the snapper-grouper fishery so that its long-term economic viability will be preserved”. Other objectives as stated in Amendment 5 are,

- **Develop a mechanism to vest fishermen in the wreckfish fishery and create incentives for conservation and regulatory compliance whereby fishermen can realize potential long-run benefits from efforts to conserve and manage the wreckfish resource.**
- **Provide a management regime which promotes stability and facilitates long-range planning and investment by harvesters and fish dealers while avoiding, where possible, the necessity for more stringent management measures and increasing management costs over time.**
- **Develop a mechanism that allows the marketplace to drive harvest strategies and product forms in order to maintain product continuity and increase total producer and consumer benefits from the fishery.**
- **Promote management regimes that minimize gear and area conflicts among fishermen.**
- **Minimize the tendency for overcapitalization in the harvesting and processing/distribution sectors.**
- **Provide a reasonable opportunity for fishermen to make adequate returns from commercial fishing by controlling entry so that returns are not regularly dissipated by open access, while also providing avenues for fishermen not initially included in the limited entry program to enter the program.**

This Wreckfish ITQ Program Review is the first since implementation in 1992 and: 1) Outlines the basic structure of the Wreckfish ITQ program; 2) Summarizes historical landings, vessel participation, and share trading history; 3) Analyzes the extent to which the Wreckfish ITQ program objectives have been met, to the extent possible; and 4) Discusses the need for a cost recovery system, a cap on share ownership, and discusses other requirements of the reauthorized MSA. An appendix provides the results of an informal survey of Wreckfish ITQ shareholders.

II. Structure of the Wreckfish ITQ Program

Snapper Grouper Amendment 5 outlines the structure of the wreckfish ITQ program adopted by the Council in September 1991. The summaries below are, in some cases, taken directly from Amendment 5.

Initial Eligibility

Eligibility for participation required that applicants include those who can document wreckfish landings during the period beginning January 1, 1989 and ending September 24, 1990 (the effective control date). The applicants also needed to be able to document having landed at least 5,000 pounds (dressed weight) of wreckfish in aggregate between January 1, 1987 and September 24, 1990.

Distribution of Initial Allocation

Initial allocations were made based on dividing one-half of the available shares (100 were made available, each representing 1% of the TAC) equally among eligible participants. The remaining shares were divided based on participant's percentage of total wreckfish landings between January 1, 1987 and August 8, 1990. The formula for the weighted portion of the initial allocation for an individual was: participant's total documented wreckfish catch 1987-1990 divided by total wreckfish catch 1987-1990 by all participants, as determined by fish house receipts and dealer records with affidavits submitted, not official landings data. Shares were allocated as percentages of the 2 million pound TAC. Initial allocation was made to vessel owners even if the portion of an individual's share is based on catch history from separate vessels owned by an individual during the 1987-1990 period.

Amendment 5 stipulated that no percentage share could be greater than 10% of the available shares at the time of the initial allocation. No rule was put in place by the Council to limit ownership of shares after initial allocation. This is one area of discussion below.

Regarding the Wreckfish TAC, Amendment 5 states that whether larger or smaller, allocation of future Wreckfish TACs to ITQ shareholders would be based on the annual percentage shares at the beginning of the fishing year which runs from April 16-January 15.

Transferability

Sale of percentage wreckfish shares is allowed to anyone. However, sale or lease of individual quota is allowed between shareholders only. Therefore, if someone wanted to fish for wreckfish and did not own shares, they would first have to purchase shares and then purchase individual quota (if the purchase was made mid-season and was not accompanied by quota) or wait for annual allocation of individual quota based on shares owned.

Tracking sales of individual quota is done by requiring the buyer and seller to sign and date coupons that are sold. The system to track transactions of percent shares involves a NMFS single point transfer agent similar to the way stock and bond transactions are recorded.

No Direct Use Requirement

Individual quota not in direct use by the owner of the corresponding percentage share does not have to be sold and will not revert back to the management program. The Council will monitor the use of individual quota over time and may take steps to direct its use in the future, if absentee ownership or other potential problems arise.

Tracking and Monitoring

The system to track and monitor individual quotas to ensure that TAC and individual quotas are not exceeded is a dual-entry record keeping system. The main features of the dual-entry system are as follows:

- 1) Individual quotas are issued via coupons in small denominations of wreckfish pounds (100 and 500 pound denominations) equaling the total pounds of a fishermen's individual quota for that year. (Note: the lack of divisibility of the coupons has presented problems for fishermen in the past who wanted to deliver more than 100 pound increments allowed but less than 500 pound increments allowed. This resulted in the loss of pounds to the fishermen. This can be corrected by issuing coupons down to 1 pound.).
- 2) Coupons are serial numbered, and coded for each fisherman, and a portion of the serial number is the permit number (associated with a particular vessel) of the fisherman receiving the individual quota allocation.
- 3) Coupons are separable at the center, one part is submitted to the National Marine Fisheries Service (NMFS) Southeast Regional Office within seven days of the time of trip settlement along with the logbook sheet for the trip; the other half goes to the fish house or dealer that purchases the wreckfish.
- 4) Fishermen must have adequate coupon units on board for the wreckfish in their possession, and the proper number of coupons must be "canceled" by being signed and dated, in ink, prior to landing.
- 5) Fishermen must obtain a permit for the vessel used to harvest wreckfish, and submit logbook sheets and canceled coupons to record their catch. Anyone in possession of wreckfish who does not have a permit, logbook, and adequate coupons for the wreckfish in their possession is in violation.
- 6) Fishermen must return any unused coupons to NMFS at the end of the fishing year. (Note: This is not being done.)
- 7) Fish houses are responsible for signing and dating their portions of the coupons accompanying wreckfish they purchase. Fish houses must have canceled and date coupons equaling the pounds of wreckfish at their fish house at a given time. Fish houses are also responsible for printing their Federal wreckfish permit dealer permit number on their side of coupons accompanying wreckfish they purchase.
- 8) Fish houses must submit monthly settlement sheets or the equivalent, to report the total number of pounds of wreckfish purchased that month, as well as submitting their portion (the side marked for dealers) of wreckfish coupons totaling the quantity of wreckfish purchased that month.

Dealer Permits

Dealers must obtain a Federal wreckfish dealer permit in order to receive wreckfish. Requirements for a dealer permit include that the applicant possess a state dealer's license, and that the applicant

must have a physical facility at a fixed location in the state wherein the dealer has a state dealer's license.

Fishing Permit

Fishermen are required to possess a wreckfish vessel permit in conjunction with coupons and a current logbook. To obtain a wreckfish permit, an applicant must possess a certificate of percentage share, which is issued at the initial allocation of shares or obtained from the transfer agent after purchasing percentage share or portion thereof.

Twenty-Four Hour Notice Prior to Offloading

To offload wreckfish at any location other than that of a federally permitted wreckfish dealer, the vessel operator must notify the NMFS enforcement office 24 hours prior to offloading.

Offloading Wreckfish Between 8am and 5pm

All offloading of wreckfish is to occur between 8am and 5pm regardless of whether offloading occurs at a federally permitted dealer location.

III. Historical Landings, Vessel Participation, and Share Trading History

Historical Landings

Wreckfish landings are available from 1987-1990 (by calendar year) from NMFS general canvas files and from 1991-2001 (by fishing year April 16-January 15) from fishermen logbooks. Landings for 1997, 1999, 2000, 2002-2005, and 2008 are confidential since three or less vessels fished during those years. Landings beyond 2005 are confidential because three or less dealers received wreckfish in those years. Table 1 shows non-confidential landings.

Table 1. Landings in Pounds (gutted) and Ex-Vessel Value, 1987-2001. (Landings after 2001 are confidential given the small number of participating vessels.)

Year	Pounds (rounded to the nearest 1000 lbs)	Dollars (rounded to the nearest 1000 dollars)
1987	28,000	\$53,000
1988	307,000	\$468,000
1989	2,153,000	\$2,688,000
1990	3,793,000	\$4,714,000
1991	1,926,000	\$2,567,000
1992	1,018,000	\$1,960,000
1993	1,048,000	\$1,943,000
1994	1,082,000	\$2,080,000
1995	628,000	\$1,150,000
1996	405,000	\$763,000
1997	Confidential	-
1998	196,000	\$430,000
1999	Confidential	-
2000	Confidential	-
2001	154,000	\$339,000

Historical Vessel Participation

Vessel participation has fluctuated greatly over time. Table 2 shows the number of vessels participating annually.

Table 2. Number of Vessels and Dealers Participating in the Wreckfish Fishery, 1991-2009.

Year	Vessels Permitted	Vessels Participating	Dealers Participating
1991	91	38	22
1992	39	20	14
1993	27	19	8
1994	25	17	8
1995	17	13	7
1996	17	9	4
1997	7	7	3
1998	3	3	3
1999	3	3	3
2000	3	3	3
2001	2	2	2
2002	3	3	2
2003	2	2	1
2004	3	3	2
2005	4	4	2
2006	4	4	2
2007	4	4	2
2008	3	3	2

Year	Vessels Permitted	Vessels Participating	Dealers Participating
2009	5	5	4

Number of Shareholders

Table 3 shows the number of shareholders over time. Table 4 shows the number of shareholders in the wreckfish fishery by the percentage of shares held.

Table 3. Number of Wreckfish ITQ Shareholders, 1991-2008.

Year	Shareholders
1991	49
1992	37
1993	35
1994	26
1995	25
1996	25
1997	25
1998	25
1999	25
2000	25
2001	25
2002	25
2003	25
2004	25
2005	25
2006	25
2007	25
2008	25
2009	25

Table 4. Number of Shareholders and Number of Shares Held, 1991-2008.

Share Percentage	Initial Allocation	July 1992	1993	1994	1995-2008	2009-2010*
Less than 1%	0	0	1	2	3	3
1-1.9%	31	22	20	12	10	10
2-2.9%	9	5	5	1	1	2
3-3.9%	6	4	4	2	2	2
4-5.9%	2	1	1	3	2	2
6-7.9%	1	3	3	3	3	2
8-9.9%	0	1	1	0	1	1
10-14.9%	0	1	1	2	2	2
More than 15%	0	0	0	1	1	1
Total	49	37	36	26	25	25

*As of 8/26/2009.

IV. Analysis of Goal and Objectives of ITQ Program

As stated in Amendment 5 (1992), the overall goal of the South Atlantic Wreckfish ITQ is to “**manage the wreckfish sector of the snapper-grouper fishery so that its long-term economic viability will be preserved**”. Amendment 5 does not, however, specify how to measure long-term economic viability and this is not a term with a narrow enough definition in the economic literature to address the issue. If the Council sought to maximize the profitability of the fishery under the TAC of 2 million pounds specified, then this goal has not been achieved. That is, it is logical to speculate that if more of the TAC was being landed, aggregate profits for the fishery as a whole would be higher than currently assumed. The wreckfish fishery does not have an economic cost logbook program like the one implemented in the snapper grouper fishery and staff do not have access to any economic profitability data for the wreckfish fishery. Therefore, the economic profitability of the wreckfish fishery as it is currently prosecuted, is unknown. However, anecdotal information from current participants indicates that it is profitable to some degree. If we assume that the currently active fishermen and dealers are “price takers¹” in the wreckfish market and that the market for wreckfish can absorb an increase in supply, then it can be assumed that additional landings will result in an increase in the aggregate profits of the fishery.

Given that the fishery is very difficult to prosecute and that it requires significant skill to be profitable, perhaps additional participants would not be able to increase the profitability of the fishery in the short-term until they obtain the skill necessary to be profitable. However, part of the reason it is difficult to fish is that it requires significant search time. If there were additional participants, cooperative behavior would decrease search time and the associated fuel costs, which are higher now than in the past. Thus, it may be more beneficial now than in the past to have a higher number of participants.

Recommendations: 1) Redefine the overall program goal or change the overall program goal or define the appropriate indicators of “long-term economic viability” in order for staff to better analyze the goal based on measurable indicators; 2) Consider implementation of a data collection program for the wreckfish fishery so that profitability can be measured; and 3) Consider holding a wreckfish shareholder meeting to discuss changes to the program to more accurately meet the program objectives.

Objective 1: Develop a mechanism to vest fishermen in the wreckfish fishery and create incentives for conservation and regulatory compliance whereby fishermen can realize potential long-run benefits from efforts to conserve and manage the wreckfish resource.

Vested in the resource

Allocation of portions of the TAC gave fishermen who qualified in the wreckfish fishery the privilege to fish for wreckfish. Fishermen could be considered vested in the fishery given that they were allocated rights to harvest portions of the TAC. While the ITQ provided wreckfish fishermen with privileges to fish, a form of “rights” to the fishery, many shareholders felt disappointed with the undeveloped nature of the fishery, but not with the ITQ system (see Appendix A). Appendix A summarizes an informal survey of wreckfish shareholders which reported that there was unanimous agreement that no major changes should be made to the wreckfish ITQ beyond what is required by the reauthorized MSA. Some minor changes included increased enforcement and prosecution of recreational landing of juvenile wreckfish

¹ The term “price taker” in the wreckfish market means that an increase in supply (sale) of wreckfish would not result in a decrease in price received.

and the implementation of a use or lose provision. Some shareholders expressed disappointment that they were unable to lease their shares and that the stock was not at a level that would allow them to fish for wreckfish and be profitable. However, they were pleased with the ITQ management system.

Incentives to conserve

Implementation of an ITQ and allocation of portions of the TAC provide an incentive to conserve the resource for long-term use by directly linking individual profitability to the TAC. Theoretically, if the wreckfish resource is not used conservatively, then the TAC would be decreased and consequently, the amount individuals receive annually (their portion of the TAC) would be decreased.

Incentives for regulatory compliance

ITQ systems are often credited with encouraging self-policing among shareholders. Therefore, implementation of the Wreckfish ITQ alone may have increased regulatory compliance. However, without indicators of regulatory compliance, this is not able to be evaluated.

Long-run benefits to fishermen and shareholders

Regulations implemented via Amendment 5 have allowed for those who chose to continue fishing for wreckfish to do so. For at least two active fishermen, this has been a worthwhile endeavor (personal communication, anonymous). It could, therefore, be concluded that the above objective has been met because fishermen have realized potential long-run benefits from efforts to conserve and manage the wreckfish resource. However, some shareholders (those not currently fishing) might argue that they have not realized long-run benefits. Because the fishery failed to develop, the demand for shares and annual poundage has been low or non-existent. In ITQ programs where there are many fishermen wanting to fish for the species under ITQ management, sales of shares and annual poundage, in particular, occurs frequently. Shareholders can sometimes profit from these transactions. This has not occurred in the Wreckfish ITQ fishery because there are so few participants. There are several reasons for this including: 1) wreckfish is a deepwater fishery that is dangerous and difficult to fish due to the Gulf Stream and weather conditions; 2) To successfully fish requires significant skill at finding the fish which are so deep that they cannot be seen with fishfinding electronic equipment; 3) The market for wreckfish does not offer a high enough price to motivate fishermen away from more nearshore fisheries (see Appendix A for a more thorough discussion).

Recommendations: **1) Consider providing assistance in developing of the market for wreckfish; 2) Consider holding a wreckfish shareholder meeting to discuss changes to the program to more accurately meet these or revised objectives.; and 3) Consider ways to ease entry into the wreckfish fishery for fishermen without shares if the intent of the objective is to vest more fishermen in the fishery.**

Objective 2: Provide a management regime which promotes stability and facilitates long-range planning and investment by harvesters and fish dealers while avoiding, where possible, the necessity for more stringent management measures and increasing management costs over time.

Promoting stability and facilitating long-range planning and investment

ITQ programs promote stability and long-range planning in at least two ways. First, they can end the “race to fish” which, while occurring, results in intense fishing effort followed by a closed season. The ITQ creates an environment where there is no incentive to fish intensely against others and the result is more stable application of fishing effort over a fishing season. The ITQ for wreckfish and other factors

(spawning season closure which lead to changes in the market for wreckfish; change in allowable gear) ended the race to fish that occurred in the later 1980s and early 1990s. Second, an ITQ allows fishermen to plan out when they will fish during the year and allows them to be able to count on bringing in a certain harvest level (based on share holdings percentage) year after year. Therefore, income is more predictable and reliable resulting in greater financial stability. Landings of the few fishermen participating since 2001 have been stable. Given the very nature of an ITQ system and that there have been no changes made to the management regime since 1991, facilitation of long-range planning and investment has been achieved to some extent. That is, implementation of the ITQ system has created a mechanism for participants to lease more easily than the permit system allows (simply by allowing for divisibility of privileges) and to invest in a fishing “right” in the form of privileges. However, shareholders have chosen not to lease shares to any significant degree since 1994. Also, it is unknown what other forms of investment have occurred such as fish house infrastructure, marina infrastructure, vessel improvements and maintenance, etc. Given the low number of participants and small amount of landings occurring compared to the levels occurring when Amendment 5 was implemented and the current TAC of 2 million pounds, it can be assumed that investment has not increased since 1992. Therefore, stability, long range planning and investment has been promoted to a certain degree, through implementation of the ITQ, but may not have been maximized.

Given the small number of participants, the Council has not seen the need for more stringent management measures thus far; landings have remained well below the TAC of 2 million pounds. Given the small number of participants, management costs are relatively low. NMFS Southeast Regional Office (permitting, distribution of coupons, and other administrative tasks), NMFS Southeast Fisheries Science Center (collection of coupons and tracking of landings), and NMFS Office of Law Enforcement (OLE) estimate that the costs associated with management of wreckfish total about \$24,631 (about 7.3% of 2001 ex-vessel value) with most of that being attributed to enforcement costs (\$18,597 or 10% of one agent's salary and use of equipment). In general, an increase in the number of fishery participants would increase costs. Implementation of VMS in the wreckfish ITQ fishery would also increase costs in the short-term. However, after the initial increase during implementation, the amount of time the Agents spend looking and waiting for vessels at various docks would decrease. Having access to real-time monitoring of landings affords NMFS OLE the opportunity for real-time monitoring of the industry. What the real-time monitoring tool offers NMFS OLE is the ability to focus effort on certain individuals that are nearing their quota or have exceeded their quota. The enforcement Office/Agent can theoretically have this information in hand while on scene. This ability to more focus enforcement assets would reduce the amount of NMFS OLE resources needed to achieve the same amount of monitoring (NMFS OLE, 2009).

The Law Enforcement Advisory Panel (LEAP) recently stated that they see no need for changes to or additional enforcement regulations for the wreckfish fishery (LEAP audio minutes, 2009). The reauthorized MSA requires that a cost recovery program be implemented for LAP programs. The cost recovery program would need to collect administrative, management, and enforcement costs up to 3% of ex-vessel revenues from the fishery. As stated above, in order to fully cover costs, this would require 7.3% of ex-vessel value in 2001. Limiting this to 3% would collect \$10,170. The average cost to 3 participants would be \$3,390 annually. This would pay for less than half of current management costs.

Recommendations: **1) Redefine objective or define what indicators could be used to measure “investment” and direct staff to analyze these indicators; and 2) Consider holding a wreckfish shareholder meeting to discuss changes to the program to more accurately meet these or revised objectives.**

Objective 3: Develop a mechanism that allows the marketplace to drive harvest strategies and product forms in order to maintain product continuity and increase total producer and consumer benefits from the fishery.

The market for wreckfish

Prior to implementation of Amendment 5, which contains all actions regarding ITQ management of the wreckfish fishery, a spawning season closure was put in place to protect the stock (1991). In a recent informal survey of wreckfish shareholders, those surveyed (some of them dealers) stated that the spawning season closure restructured the market for wreckfish. Prior to the spawning season closure, there was a market specifically for the wreckfish species. During the first spawning season closure, dealers relied on grouper as a substitute. When the fishery re-opened, the market for wreckfish no longer existed and thereafter, wreckfish was largely marketed as grouper. The lower landings of wreckfish were also significant in the loss of a wreckfish market. Lower landings resulted from changes in what gear was allowed to be used and lower fishermen participation rates due to improvements in the shrimp fishery, and the difficult and dangerous nature of the fishery.

By the time that Amendment 5 was implemented, this marketplace change had already occurred and harvester participation was waning for reasons other than management changes (as explained above). It appears that the ITQ management system allowed the market place to drive harvest strategies and product forms to the extent possible in that it ended the race to fish and allowed fishermen to harvest in a manner that would increase their profitability (by spreading out effort and therefore receiving a higher price). Active fishermen have found a way to remain profitable by supplying wreckfish to be sold in a niche market. Amendment 5 also eliminated the 10,000 pound trip limit which could be seen as a barrier to letting the marketplace drive harvest strategies and product forms.

Changes in producer² and consumer surplus³

Anecdotal information from active fishermen indicates that ex-vessel prices have increased since the time prior to implementation of Amendment 5 which would indicate a possible increase in fishermen producer surplus. However, not enough data exist for estimation of changes in producer surplus. In addition, any change estimated could be attributed, at least partially, to the spawning season closure and decline in participation and not just implementation of the ITQ. Estimation of consumer surplus is also not possible due to the lack of a significant market for the wreckfish species specifically. There is not expected to be any consumer surplus given that fishermen are price takers due to the availability of substitutes. Thus, demand for wreckfish is likely to be highly elastic for the individual seller.

Recommendations: **1) Create mechanisms for increased participation by interested parties without decreasing the current value of the fishery to active fishermen and shareholders (obtained from ownership of shares) such as: a) A use or lose provision that has a requirement for use or sale of coupons over X years, or the associated quota share available to be sold to interested parties; b) Redistribution of shares belonging to deceased quota share holders or holders that are not able to be contacted over a long period of time (specified by the Council); 2) Revise coupons to be available in**

² Producer surplus – The sum over all units of production of the difference between the market price of the good and the marginal costs of production.

³ Consumer surplus – The difference between the amount consumers are willing to pay for a good and the amount they actually pay.

pound increments, instead of 100 and 500 pound increments, so fishermen can avoid forfeiting small amounts of allocated poundage when landing; and 3) Consider ways to better market wreckfish in order to achieve greater net economic benefits from the resource

Objective 4: Promote management regimes that minimize gear and area conflicts among fishermen.

Ending the race to fish was intended to minimize gear and area conflicts among fishermen by eliminating the incentive for fishermen to be on the fishing grounds at the same time. The gear restrictions put in place banning the use of bottom longlines as well as implementation of ITQ management appears to have achieved this objective.

Recommendations: None

Objective 5: Minimize the tendency for overcapitalization in the harvesting and processing/distribution sectors.

Implementation of Amendment 5 eliminated the incentive to apply more effort than necessary to take the amount of annual poundage owned. Prior to implementation of Amendment 5, fishermen had the incentive to invest in bigger, faster and generally more capable boats than after implementation of Amendment 5. Likewise, prior to Amendment 5, dealers had the incentive to invest in larger facilities, larger amounts of or more capable equipment, and more labor (in order to handle the large landings coming in all at once) than after ITQ implementation. Amendment 5 removed this incentive.

Participation has decreased significantly since 1992, but this is not largely due to implementation of the ITQ for the reasons mentioned above and in Appendix A. While there are developed economic tools and methods for analyzing whether a fishery is overcapitalized or not, this analysis has not been done for the wreckfish fishery, and it is unlikely that the necessary data is available since the analysis requires cost and other detailed data.

Recommendations: None.

Objective 6: Provide a reasonable opportunity for fishermen to make adequate returns from commercial fishing by controlling entry so that returns are not regularly dissipated by open access, while also providing avenues for fishermen not initially included in the limited entry program to enter the program.

Adequate returns

Entry into the wreckfish fishery has been controlled through implementation of the ITQ management system that stipulates that in order to possess wreckfish, a person must have a wreckfish permit and annual pounds (coupons) on board the vessel to cover any catch. Therefore, these controls on entry, allocation of quota to individuals, and existence of a TAC, together provide protection to commercial wreckfishermen from dissipation of profits due to open access.

New entry

In order for an individual to fish for wreckfish, they must apply for a wreckfish permit (these are not currently limited) and purchase annual pounds (unless these are allocated via annual shares). To obtain a permit, however, an individual must own wreckfish shares. Therefore, new entry could possibly be costly given the number of assets they would be required to purchase. However, this might not be the case. A current market price for shares and/or coupons is unknown given that price data is not required to be reported. The lack of demand for shares and coupons may result in shareholders selling for relatively low prices. In a current informal survey of shareholders, those contacted indicated that they have been unwilling to sell their shares because the prices they have been offered have not been high enough. However, shareholders are unsure of what would be an acceptable price to them for their shares (see Appendix A).

Another problem may be the issue of non-accessible shares. The recent informal survey of shareholders revealed that there are several shareholders who cannot be contacted and others who are deceased, but still had shares attributed to them. Perhaps requiring re-registration for shares or a use or lose provision might be useful in freeing up some of these shares for others to use.

Allowing recreational fishermen to participate in the fishery has been a topic of discussion as well. One way to do this is through a bag limit or bycatch allowance for recreational fishermen. Both would likely require an allocation of a portion of the Annual Catch Limit (ACL) the recreational sector.

Recommendations: 1) Increase the potential for increased participation by allowing for fishermen to fish for wreckfish with ownership of a wreckfish permit and annual pounds only. This maintains the ITQ system but removes the requirement for share ownership. That is, it allows for leasing or buying of annual pounds from shareholders; 2) Provide a venue for sellers and interested buyers to post quantities and prices for available shares and coupons such as a Council, NMFS, or contracted website similar to Craigslist which allows monitored postings of wanted or sale of quota share and coupons with associated contact info; 3) Identify what would be considered excessive shares for the fishery. Direct staff to make a presentation to the Council on how to identify excessive shares based on published NMFS guidance in “The Design and Use of Limited Access Privilege Programs” (Anderson and Holliday, 2007) and provide suggestions; 4) Require re-registration for continued issuance of quota share or implement a use or lose type rule so that quota shares attributed to deceased or uninterested share holders can be released for others to use; and 5) Analyze the potential impact of various percentage allocations of the ACL to the recreational sector and use that allocation to grant a bycatch allowance and/or a bag limit for recreational fishermen

Table 5. Goal, Objectives, Conclusions and Recommendations.

Goals and Objectives	Conclusions and Recommendations
Overall Goal: Manage the wreckfish sector of the snapper-grouper fishery so that its long-term economic viability will be	Conclusion: Unable to analyze until indicators of “long-term economic viability” are given. Recommendations: 1) Redefine overall goal or define what appropriate indicators of “long-term economic viability” and direct staff to analyze these indicators so that this goal can be analyzed or change overall

Goals and Objectives	Conclusions and Recommendations
preserved.	<p>goal to something measureable; 2) Consider implementation of an economic cost data collection program for the wreckfish fishery so that profitability can be measured; and 3) Consider holding a wreckfish shareholder meeting to discuss changes to the program to more accurately meet these or revised objectives.</p>
<p><u>Objective 1:</u> Develop a mechanism to vest fishermen and create incentives for conservation and regulatory compliance whereby fishermen can realize potential long-run benefits from efforts to conserve and manage the wreckfish resource</p>	<p><u>Conclusion:</u> Objective has been achieved.</p> <p><u>Recommendations:</u> 1) Consideration of assistance in development of the market for wreckfish; and 2) Consider holding a wreckfish shareholder meeting to discuss changes to the program to more accurately meet these or revised objectives.</p>
<p><u>Objective 2:</u> Provide a management regime which promotes stability and facilitates long-range planning and investment by harvesters and fish dealers while avoiding, where possible, the necessity for more stringent management measures and increasing management costs over time</p>	<p><u>Conclusion:</u> Unable to analyze until indicators of "investment" are given.</p> <p><u>Recommendations:</u> 1) Redefine objective or define what indicators could be used to measure "investment" and direct staff analyze these indicators; and 2) Consider holding a wreckfish shareholder meeting to discuss changes to the program to more accurately meet these or revised objectives.</p>
<p><u>Objective 3:</u> Develop a mechanism that allows the marketplace to drive harvest strategies and product forms in order to maintain product continuity and increase total producer and consumer benefits from the fishery</p>	<p><u>Conclusion:</u> Unable to analyze if objective has been met due to lack of data.</p> <p><u>Recommendations:</u> 1) Create mechanisms for increased participation by interested parties without decreasing the current value of the fishery to active fishermen and shareholders (obtained from ownership of shares) such as: a) A use or lose provision that has a requirement for use or sale of coupons over 2-5 years or the associated quota share is available to be sold to interested parties; b) Redistribution of shares belonging to deceased quota share holders or holders that are not able to be contacted over a long period of time; and 2) Revise coupons to be available in pound increments instead of 100 and 500 pound increments so fishermen can</p>

Goals and Objectives	Conclusions and Recommendations
	avoid forfeiting their allocated annually poundage.
Objective 4: Promote management regimes that minimize gear and area conflicts among fishermen	<p>Conclusion: Objective has been achieved with implementation of the ITQ program.</p> <p>Recommendations: None</p>
Objective 5: Minimize the tendency for overcapitalization in the harvesting and processing/distribution sectors	<p>Conclusion: An analysis of overcapitalization was not able to be conducted. However, it is unlikely that the fishery is overcapitalized.</p> <p>Recommendations: None</p>
Objective 6: Provide a reasonable opportunity for fishermen to make adequate returns from commercial fishing by controlling entry so that returns are not regularly dissipated by open access, while also providing avenues for fishermen not initially included in the limited entry program to enter the program	<p>Conclusion: Providing ways for new people to enter the fishery could be expanded upon. Monetary returns might be increased with recommendations. Administration of controlled entry could be improved with identification of what is an “excessive share”.</p> <p>Recommendations: 1) Increase the potential for increased participation by allowing for fishermen to fish for wreckfish with ownership of a wreckfish permit and annual pounds only; 2) Provide a venue for sellers and interested buyers to post quantities and prices for available shares and coupons such as a Council, NMFS, or contracted website similar to Craigslist which allows monitored postings of wanted or sale of quota share and coupons with associated contact info; and 3) Identify what would be considered excessive shares for the fishery. Direct staff to make a presentation to the Council on how to identify excessive shares based on published NMFS guidance in “The Design and Use of Limited Access Privilege Programs” (Anderson and Holliday, 2007) and provide suggestions; 4) Require re-registration for continued issuance of quota share or implement a use or lose type rule so that quota shares attributed to deceased or uninterested share holders can be released for others to use; and 5) Analyze the potential impact of various percentage allocations of the ACL to the recreational sector and use that allocation to grant a bycatch allowance and/or a bag limit for recreational fishermen</p>

Summary

The overall goal of the program and several of the objectives are not able to be analyzed because they are not measurable. The language in the overall goal and objectives is not specific enough. In many ways, these objectives all could be considered overall goals. Some recommendations have been made for the Council to consider that could provide ways for the objectives to be properly analyzed. In general, this means deciding upon indicators to track in order to analyze whether the current system promotes “long-term economic viability” or whether “investment” has been facilitated or what the Council considers “adequate”. That is, procedures need to be identified in order to evaluate the objectives. While the objectives should achieve the overall goal, the procedures should be useful in evaluating the objectives. Other recommendations are made for greater levels of achievement of the objectives. However, the Council should consider revising the current overall goal and objectives to better coincide with the current nature of the fishery and what has been learned since the start of the fishery. The Council may want to consider the following examples of possible goals, objectives, and procedures:

Example Goal:	Manage the wreckfish sector of the snapper grouper fishery to maximize aggregate profitability of the fishery while minimizing management costs and easing new entry and participation by recreational fishermen
Example Objective A:	Provide a management regime that promotes harvesting flexibility, financial stability, and facilitates long-range planning
Example Procedure A:	Continue management of the wreckfish fishery through ITQs
Example Objective B:	Provide a program review of the fishery every 5-7 years to evaluate whether objectives are being met.
Example Procedure B:	Develop a mandatory economic logbook program and other data collection systems (like those used in the Gulf red snapper IFQ) to ensure availability of data needed to write a program review
Example Objective C:	Provide some assistance to new entrants in obtaining quota pounds
Example Procedure C:	Implement a program that assists new entrants in obtaining some quota pounds by making pounds lost through forfeiture due to violations or a portion of pounds available from a TAC above 2 million pounds available for purchase by new entrants
Example Objective D:	Minimize discards by recreational fishermen
Example Procedure D:	Allow for a 1 fish per vessel bycatch allowance

Example Objective E:	Minimize management costs
Example Procedure E:	Implement enforcement measures that rely upon an electronic paper trail
Example Objective F:	Minimize costs for fishermen associated with finding quota share and coupons for sale
Example Procedure F:	Develop and maintain a “bulletin board” webpage that posts quota share and coupons for sale and contact information

The goals and objectives should be somewhat based on the needs expressed by fishermen. In a recent informal survey of shareholders, fishermen have expressed the need for increased enforcement of current regulations to cut down on the number of juvenile wreckfish being illegally targeted and implementation of a use or lose provision. Active fishermen have stated that if the wreckfish ACL (to be determined in Snapper Grouper Amendment 20) is too low, they will have to leave the fishery, thus eliminating any harvest of wreckfish in South Atlantic waters. Recreational fishermen have expressed a desire to fish for wreckfish or have a bycatch allowance so that they do not have to throw back dead fish.

Council discussion has also included the desire for information regarding extraction of a resource rent from users of the resource. Resource rent is defined as the surplus value after all costs (including labor costs) and normal returns have been accounted for. That is, it is the profit from use of a natural resource, like fish stocks. The theory is that traditional (open access) fisheries management result in rent dissipation (or dissipation of profits due to the tendency to race to fish). Upon implementation of an IFQ program, rent is no longer being dissipated due to derby fishing conditions. Resource rent can be extracted from users of the resource through various measures including taxes and/or an auction of annual quota pounds. Rent is the amount remaining after all costs of a business to bring fish to market, including ‘normal returns’, have been deducted. It is therefore also the maximum ‘willingness to pay’ for access to a resource. In an auction setting, a fisher would keep bidding for access to the resource up to the point where he or she is able to obtain no more than a normal return from that resource. This maximum bid represents rent – the amount of value in excess of normal returns. Because costs already include ‘normal profit’, rent can also be thought of as ‘super-profit’. Unless the resource rent is actually collected, this surplus value will be kept by the business over and above its normal profit.

Reasons to collect resource rent include ensuring a return to the owner of a resource, avoiding inefficient allocation, and achieving ethical objectives. Rent recovery is not the same as cost recovery. Cost recovery aims at recovering a variety of costs that arise from resource use, whereas rent is a return to the owner (in this case the citizens of the U.S.) For an example of how resource rent was applied to users of a New Zealand water supply, see http://www.agrifood.info/connections/2007/Sinner_Scherzer.pdf.

V. Cost Recovery, Cap on Share Ownership, and Other Requirements of a Catch Share Program

Requirements for a catch share or limited access privilege (LAP) program are provided in the reauthorized MSA. The Wreckfish ITQ management program is out of compliance with at least two of the new requirements – cost recovery and identification of excessive shares.

Cost Recovery

MSA Requirements

In Section 304(d)(2)(A) of the MSA, the Secretary is directed to collect a fee to cover certain costs of managing catch share programs.

...the Secretary is authorized and shall collect a fee to recover the actual costs directly related to management, data collection, and enforcement of any –

(i) limited access privilege program; and

(ii) community development quota program that allocates a percentage of the total allowable catch of a fishery to such program.

(B) Such fee shall not exceed 3 percent of the ex-vessel value of fish harvested under any such program, and shall be collected at either the time of the landing, filing of a landing report, or sale of such fish during a fishing season or in the last quarter of the calendar year in which the fish is harvested.

(C) (i) Fees collected under this paragraph shall be in addition to any other fees charge under this Act and shall be deposited in the Limited Access System Administration Fund established under section 305(h)(5)(B).

(ii) Upon application by a State, the Secretary shall transfer to such State up to 33 percent of any fee collected pursuant to subparagraph (A) under a community development quota program and deposited in the Limited Access System Administrative Fund in order to reimburse such State for actual costs directly incurred in the management and enforcement of such program.

A cost recovery program is required to cover costs of management, enforcement, and other support programs. Section 303A(e) in the reauthorized MSA states that, the Council shall,

(1) develop a methodology and the means to identify and assess the management, data collection and analysis, and enforcement programs that are directly related to and in support of the program; and

(2) provide, under section 304(d)(2), for a program of fees paid by limited access privilege holders that will cover the costs of management, data collection and analysis, and enforcement activities.

Cost Recovery in Other Catch Shares Programs

Costs are currently being recovered in the halibut and sablefish⁴, Alaskan crab⁵ and red snapper⁶ IFQ programs. The surf clam and ocean quahog fishery do not yet have a cost recovery program in place. However, a new amendment is being developed which will have a cost recovery program and a share cap.

Cost Estimates for the South Atlantic Wreckfish Fishery

Anderson and Holliday (2007) provide discussion of general principles for assessing costs. In their paper, they discuss the importance of calculating the incremental costs of the program and the reasons for doing so. They also discuss the difficulties of measurement of costs and how the Alaska Region calculates these costs for the halibut and sablefish IFQ program. In general, they state that NMFS has a procedure already in place that will account for the measurement of appropriate costs and therefore, it may not be necessary for the Councils to develop a process of their own. Another aspect discussed is the opportunity for IFQ programs to share infrastructure components and therefore decrease cost of management, increase efficiency of implementation, and decrease the possibility of deployment of a flawed system. Computation of a cost recovery fee is also discussed. Specifically, they suggest that Councils may want to consider existing procedures fishermen use for selling and getting paid for their fish, fishermen cash flow needs, timing of fee collection with respect to enforceability (who is it most convenient for fees to be withheld by), and the timing of fee collection. Since the fee cannot be determined until the average price is set or approximated, it may be necessary to collect fees after several months of fishing and make adjustments at the end of the year.

Excessive shares

⁴ Cost recovery fee was 1.4% of the ex-vessel value of the fishery in 2008, of which 25% of collected fees are reserved for loan programs (programs reimbursed with the other 75%). Other years: 1.2% (2007); 1.0% (2006); 1.6% (2005); 1.3% (2004); 1.4% (2003); 2% (2002); 2% (2001); 1.8% (2000). In 2008, ~\$1.1 million for administration and ~\$2.3 million for enforcement with 75% paid for with cost recovery (NMFS, 2009; NMFS, 2007; Anderson and Holliday, 2007).

⁵ For crab only – NMFS can collect fees for up to 133% of the actual management, data collecting, and enforcement costs, so that after the 25% for loan programs is deducted, 100% would remain for reimbursement of program costs. However, MSA limits total fees to 3%. For 2007-08, actual costs were over 4% of the ex-vessel value of the program, so fees were capped at 3%. 2007 costs were \$2,133,758. Enforcement costs for 2007/08 fishing year were \$568,647 by NOAA and \$725,405 by the State of Alaska (NMFS BRAI CRP Report, 2008; Anderson and Holliday, 2007).

⁶ Red Snapper IFQ cost recovery fees are calculated at the time of sale to the registered IFQ dealer/processor. The IFQ dealer/processor is responsible for submitting such fees to NMFS. The collected fees are submitted quarterly. The cost recovery fee (3%) is based on the actual ex-vessel value of the red snapper landings. 2008 estimated costs were \$8,262,729 without cost recovery and \$247,883 with cost recovery (SERO-LAPP-2009-08).

Catch shares systems are required to ensure that catch share holders do not acquire an excessive share of the total catch shares in the program. The Reauthorized MSA states that the Council shall,

Ensure that limited access privilege holders do not acquire an excessive share of the total limited access privileges in the program by—

(i) establishing a maximum share, expressed as a percentage of the total limited access privileges, that a limited access privilege holder is permitted to hold, acquire, or use; and

(ii) establishing any other limitations or measures necessary to prevent an inequitable concentration of limited access privileges.

In general, there are several possible benefits and drawbacks to the use of caps (or upper limits) on LAP share ownership and control. Some possible benefits include:

- Upper limits placed on ownership and control of LAP shares can prevent a monopoly or oligopoly⁷ ownership of LAP shares that could result in LAP owners controlling the ex-vessel price paid for fish;
- Upper limits placed on ownership and control of LAP shares can help prevent a “sharecropper” system from resulting whereby fishermen lease from owners at high prices;
- Higher levels of production and employment if the fishery transitions to more participants;
- Prevention of some changes in the structure of fishing communities; and
- Greater feelings of equity among fishery participants (Anderson and Holliday, 2007).

Some possible drawbacks include:

- Upper limits could possibly limit the level of economic efficiency the fishery can obtain (however, not in the case of a monopolist or oligopoly). For example, if upper limits are set too low, this might restrict some fishermen from making enough revenue to cover the fixed and operational costs of doing business. This may be particularly true for owners of larger and/or newer vessels (Anderson and Holliday, 2007).

To assist in deliberations on IFQ programs, in their publication “Better information Could Improve Program Management”, the U.S. General Accounting Office, among other things, determined the extent of consolidation of quota holdings in three IFQ programs (Alaskan halibut and sablefish, wreckfish, and surfclam/ocean quahog). They found that:

All three IFQ programs have experienced some consolidation of quota holdings. From 1995-2008, the number of halibut and sablefish quota holders decreased by about 40 and 19 percent, respectively. From 1992-2008, the number of wreckfish quota holders decreased by about 49 percent. From 2003-

⁷ Definition: A market dominated by a small number of participants who are able to collectively exert control over supply and prices.

2008, the number of surfclam and ocean quahog quota holders decreased by about 33 to 20 percent, respectively (OQ Concentration Report, 2009; SF Concentration Report, 2009; Christel, D.W. 2004).

Program rules may affect the extent of consolidation in each IFQ program. While the Alaskan halibut and sablefish program set specific and measurable quota limits, the surfclam/ocean quahog and wreckfish programs did not, relying instead on federal antitrust laws to determine whether any quota holdings are excessive. Without defined limits on the amount of quota an individual or entity can hold, it is difficult to determine whether any holdings would be viewed as excessive (GAO, 2002).

In the Gulf of Mexico Red Snapper IFQ Program, a total of 546 individuals qualified for initial shares in 2007 (Table 6). Initial quota share values issued to a single entity ranged from a maximum of 6.0203% to 0.0001%. At the end of 2007, 489 individuals held IFQ shares, representing a 10.4% reduction in shareholders. In 2008, additional consolidation occurred, with a total of 466 individuals holding shares at the end of the fishing year (Table 6). The number of individuals holding IFQ shares has been reduced by 14.6% since the onset of the IFQ program. The greatest reductions in shareholders have occurred for individuals initially issued 0.0050%-0.0099% and 0.01%-0.0999% of the quota, whereas a 50% increase in the number of shareholders possessing greater than 2.0% of the quota has occurred since January 1, 2007 (Table 6).

Table 6. Initial and End of Year Share Percentages in the Gulf of Mexico Red Snapper IFQ Program.

Initial and End of Year Share Percentages Number of Shareholders as of:			
Share Percentage	Jan. 1, 2007	Dec. 31, 2007	Dec. 31, 2008
0.0001% - 0.0049%	159	150	146
0.0050% - 0.0099%	91	76	68
0.0100% - 0.0999%	184	158	147
0.1000% - 1.9999%	104	94	93
2.0000% - 2.9999%	3	5	6
3.0000% - 6.0203%	5	6	6
Total	546	489	466

Source: SERO-LAPP-2009-08

Anderson and Holliday (2007) discuss the theoretical and technical aspects of determining “excessive share”. They suggest determining two types of excessive shares – Market Power (MP) Excessive Share and Management Objective (MO) Excessive Share. Anderson and Holliday (2007) state that while it is theoretically possible to solve for the Market Power Excessive Share, “other than broadly defined benefit cost analysis, there is no body of theory, economic or otherwise, upon which to base the determination of the Management Objective share limit.” However, they offer the following advice –

First, to be relevant, the maximum Management Objective (MO) share limit must be less than the Market Power (MP share limit). Therefore, if a relatively small operational MO share limit is chosen, it will likely preclude the necessity of rigorously determining $s^(MP \text{ share limit})$, because it will be a non-binding constraint. On the other hand, setting a MO share limit will not be enough, in and of itself to achieve most management objectives. Therefore, they should be used*

with care and only when the perceived benefits are greater than potential costs, and only then where there are no less costly or less intrusive ways to achieve the same objective.

According to the guidance provided, an excessive share will exist if a “market power share limit” or “management objective share limit” is exceeded. A market power share limit is theoretically possible to solve for and prevents monopolistic price control. The Guidance states, “This is defined as the maximum percentage of quota that can be controlled by a single entity such that there will be no problems with market power output restrictions, either through actual output decisions or through restrictions on the sale or rental of the transferable annual pounds that are associated with the permanent quota share”. Anderson and Holliday (2007) suggest identifying the MP share limit first.

The MO share limit is defined as the level that beyond which achievement of the Council’s goals for the fishery will be jeopardized. Several suggestions are made for how to go about identifying an appropriate MO share limit. However, the discussion is rather lengthy and the reader should refer to the Anderson and Holliday (2007) document for the complete text. In general, Anderson and Holliday (2007) suggest the following:

To set a MO share limit, the Councils should explicitly state the management objective(s) that will drive the determination of excessive share limits, and provide justification for choosing it (them). There are several key elements in this requirement. First, it must be explicit or measurable so that it can provide a meaningful basis for determining an excessive share limit. An objective to “address the cultural framework of the fishery” does not really say anything. However, an objective to “maintain the percentage of distribution of harvest among gear types and ports with no more than 5 percent deviation” is quite explicit. They should also discuss the reasoning used to select the particular objectives including a description of the perceived benefits of achieving these objectives. They should also show how these objectives are consistent with their mandatory responsibilities and/or their discretionary authority under the Act and show how they are within the bounds of the other National Standards.

The Councils also need to specify the share limit that will ensure that the objective, or set of objectives, is met and to show the justification for why that particular share limit is necessary. In other words, if a Council selects a 2 percent maximum share limit they need to provide an explanation of why any higher than that will preclude the achievement of the management objective(s).

Appendix A Informal Survey of Wreckfish Shareholders

Introduction

There are 25 shareholders in the wreckfish ITQ program. Council staff had informal conversations with 10 individuals representing 12 shareholders (48%) regarding the history of the wreckfish fishery. Four of the 25 shareholders (16%) were deceased and 9 shareholders (36%) were unreachable due to outdated contact information. However, the 5 top shareholders were spoken with as well as all current participants. Currently, four or less shareholders (16%) participate in the wreckfish fishery, however, some do not participate every year. Three shareholders that do not currently fish for wreckfish, anticipate participating this year or next. One shareholder lives in a state not within the South Atlantic jurisdiction. All shareholders spoken to were fishermen.

The purpose of these conversations was to gather additional information about:

- Why a derby fishery occurred in the late 1980s;
- Why landings dropped off shortly after implementation of the ITQ;
- Why the TAC has never been reached;
- Why coupons have gone largely unused for over a decade and why shares associated with those coupons have not been sold;
- The current state of the wreckfish fishery; and
- Possible changes to the Wreckfish ITQ.

Late 1980s and Early 1990s

In the late 1980s, a few fishermen began to target wreckfish about 50 miles offshore. The species, also called stone bass, inhabited areas about a mile under the surface of the water. According to shareholders contacted, because the species had never been targeted before in South Atlantic waters, the species was relatively easy to catch and harvests were large. Prior to participation in the wreckfish fishery, shareholders shrimped or fished for snapper grouper or sharks, swordfish, and/or tuna. These fishermen typically had larger vessels and so it was possible for these vessels to participate in the wreckfish fishery which requires a larger vessel given its distance from land. At this time, shrimp yields were relatively low and the ex-vessel price for shrimp was low as well. Several boats re-rigged to switch from shrimping to fishing for wreckfish. Other people bought new boats specifically made for fishing for wreckfish. By 1991, more than 100 vessels were fishing for wreckfish in derby-like conditions.

Shareholders contacted stated that the derby was caused by:

- An influx of shrimp boats (33% of shareholders contacted);
- A desire to qualify for the ITQ and receive an initial allocation they could profitably fish with⁸; and

⁸ One shareholder stated that once the initial allocation occurred, his fishing effort was decreased because he saw others easing up on their fishing effort.

- A desire to participate in a fishery with high yields from a virgin stock which would likely require less effort to harvest from than a non-virgin stock.

The shareholders contacted all agreed that the ITQ eliminated the derby fishery. However, all felt this would have happened anyway given how difficult the fishery is to prosecute.

During the derby, ex-vessel prices were lower than before, and it was sometimes difficult to move the wreckfish harvest due to its large size; there were market gluts. Average nominal prices received ranged from \$0.90 to \$1.35 per pound in the late 1980s and early 1990s. Shareholders noted that on a typical trip, 15,000 - 18,000 pounds of wreckfish were harvested.

Prior to implementation of the ITQ, several fishermen noticed that wreckfish were filled with roe in winter and early spring. A spawning season closure from January 15-April 15 was proposed and implemented. In April of the year of the first spawning season closure, fishermen found that the markets that had developed for wreckfish were no longer available due to the interruption caused by the three month spawning season closure. Average ex-vessel prices decreased and harvests were harder to sell. This, the ITQ eligibility requirements, initial allocation, the difficulty of harvesting wreckfish, and a rebound in the shrimp fishery⁹ contributed to a decline in the number of vessels participating in the fishery in the early 1990s after implementation of the ITQ.

The general feeling among shareholders is that the wreckfish fishery is a very difficult fishery to prosecute, and that many vessels left because there were easier and more profitable fisheries open to them. Some of the factors that make the wreckfish fishery difficult are:

- The location of the fishing grounds near the Gulf Stream;
- The distance of the fishing grounds offshore and the expense associated with the fuel required to travel to the fishing grounds and harvest; and
- The inability to locate fish with a fish finder because wreckfish do not have air bladders.

While some vessels remained in the fishery, in 2002, there was yet another drop in landings which appears to be at least partially due to the untimely deaths of three highliners. One additional shareholder passed away at a later date. Since that time, the number of active participants has varied between two and four vessels each year with landings at about 300,000 pounds each year. The wreckfish fishery now supports a niche market that employs one fisherman almost year round, one fisherman for most of the year, and two shareholders who participate every few years.

The Market for Wreckfish

Some shareholders who are also dealers stated that wreckfish, like any species, are easier to market when large amounts are being caught. However, these shareholders also stated that the market for wreckfish, in general, is better now than in the past. The price offered is much higher than under the derby, and South Atlantic wreckfish are sold in Canada, Boston, New York and Orlando, among other

⁹ At about the same time that the ITQ was implemented, the shrimp fishery improved and several vessels stopped fishing for wreckfish.

places. It is a substitute for grouper, but has a market of its own as well. It is sold as "wreckfish" or "wreckfish grouper".

Active wreckfish fishermen note that the wreckfish market is a niche market. They stated that recently, the price for wreckfish has decreased by about 25%. Active wreckfish fishermen have had to abort trips recently because it is uncertain whether the wreckfish poundage brought to the dock can be moved. The fishermen have also stated that it is also sometimes uncertain whether they will get paid right away due to a cash shortage on the part of the fish house.

Another shareholder stated that recently, the market has been flooded with red grouper (a substitute for wreckfish), which has brought prices down. There is hope that the market for wreckfish might improve if red grouper harvest decreased and/or marketing improved.

The Current Wreckfish Fishery

As stated above, four or less shareholders now fish for wreckfish annually. Current shareholders not fishing for wreckfish fish for king mackerel, tuna, mahi-mahi, swordfish, shark, and shrimp. One shareholder harvests oysters and seabass pots. Another shareholder fishes for snapper grouper species and lobsters. At least three shareholders contacted that do not currently fish for wreckfish, stated that they were preparing to participate in the wreckfish fishery in 2009 and/or 2010 in order to make up for revenue they expected to receive from fisheries they would be unable to participate in due to changes in regulations.

Some mentioned that they would make more trips for wreckfish if they had a newer and larger vessel, if their physical health was better, and if their balance was better as it was when they were younger. Several shareholders were retired or planned to retire soon.

According to some of the active wreckfish fishermen, a drawback of not having a lot of participants in the fishery is that the wreckfish area they fish is large and when there are a lot of vessels scattered throughout that area, a lot of reports are made on the radio about where the fish are and therefore, fishing is easier because the fish are easier and less expensive to find.

Some shareholders shared their opinions on why the TAC has not been reached. Most stated that the fishery is difficult and there are not enough participants or trips made to make that possible. A few fishermen stated that cold water events are far more common now than they were in the 1990s. When cold water events occur, the fish don't bite. They remark that these cold water events used to happen once or twice a year but that they now occur 6-8 times a year. They contend that the weather has also been more aggressive recently than in the 1990s.

The Market for Wreckfish Shares and Coupons

Shareholders that bought into the fishery or that increased their initial allocation through purchasing shares from others, bought shares in order to be able to fish for a particular poundage of wreckfish annually, in perpetuity. No shareholders contacted had purchased shares with the intent of selling them when prices were higher. Most purchased shares because they felt it was a good investment and that if

they did not fish all of their coupons, then they could sell them. Several shareholders are interested in selling their shares or coupons if offered an “appropriate” price. However, no shareholder knew what the appropriate price might be.

All shareholders contacted were aware that they could sell their shares and coupons to a buyer, however, a lack of buyers prevent them from doing so. Several shareholders were waiting for the stock to rebound so that they could sell, lease, or fish their wreckfish shares/coupons. Three shareholders felt that implementation of the IFQ created a great deal of animosity due to the initial allocation. They theorized that other shareholders were holding on to the quota out of bitterness and to help rebuild the stock. Other shareholders stated that they would sell or lease if there were buyers willing to pay a fair price. Most shareholders contacted preferred to hold onto their shares and sell their coupons instead.

Changes to the Wreckfish Program

Wreckfish shareholders contacted unanimously agree that no major changes should be made to the wreckfish ITQ beyond what is required by the reauthorized MSA. They feel the program is operating as intended, it is the characteristics of the wreckfish fishery (stated as bulleted items above) that have resulted in the low number of participants and lower harvests, and not the structure of the ITQ program.

Active participants and those that intend to re-enter the fishery in 2009 and 2010 have stated that equating the TAC to recent catch levels will result in their inability to remain in the fishery. Other shareholders stated that a TAC of 1 million pounds (down from the current 2 million pounds) could hurt active fishermen who have an interest in exploring unfished areas. Several fishermen stated their understanding that wreckfish migrate from the Mid-Atlantic Ridge each year¹⁰. According to active fishermen, the catch per unit effort (CPUE) has not changed since implementation of the ITQ. The average size of fish caught has also not changed.

Some minor changes that shareholders would like to see made include:

- Increased enforcement - One shareholder stressed the need for more significant enforcement. He stated that there is recreational fishing for wreckfish occurring in North Carolina and Virginia. He contends that some headboats and charterboats are catching juvenile wreckfish. He recommended that enforcement personnel be educated about what wreckfish looked like so that people catching wreckfish illegally could be charged.
- Changes to the wreckfish logbook - One shareholder suggested that if managers want to know what is going on and start drawing any cause and effect relationships, that they leave a space in the logbooks for fishermen to provide information about why a trip went the way it did (low harvest due to cold water, weather, etc).
- Use or Lose Provision - One shareholder wanted a use or lose provision implemented that would remove shares from shareholders that did not participate in the fishery every few years and redistribute those shares to active participants.

¹⁰ Some active fishermen stated that they know when wreckfish have recently migrated because they have small hooks stuck in them, which are used in areas outside the South Atlantic jurisdiction, and because they have a greenish color on their backs from traveling close to the surface of the water where the sun might change their coloring. They call these fish greenlings or transients.

All shareholders felt that no recreational fishing for wreckfish should be allowed and they were surprised that wreckfish would be a target of recreational fishery given the difficulty involved in catching wreckfish with the difficulty with tides in the areas where wreckfish are caught. They felt that interested recreational fishermen could purchase a wreckfish permit, shares, and coupons if they wanted to catch wreckfish.

Appendix B MSA Text Regarding Limited Access Privilege Programs

SEC. 303A. LIMITED ACCESS PRIVILEGE PROGRAMS. 16 U.S.C. 1853a

(a) IN GENERAL.—After the date of enactment of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006, a Council may submit, and the Secretary may approve, for a fishery that is managed under a limited access system, a limited access privilege program to harvest fish if the program meets the requirements of this section.

(b) NO CREATION OF RIGHT, TITLE, OR INTEREST.—Limited access privilege, quota share, or other limited access system authorization established, implemented, or managed under this Act—

- (1) shall be considered a permit for the purposes of sections 307, 308, and 309;
- (2) may be revoked, limited, or modified at any time in accordance with this Act, including revocation if the system is found to have jeopardized the sustainability of the stock or the safety of fishermen;
- (3) shall not confer any right of compensation to the holder of such limited access privilege, quota share, or other such limited access system authorization if it is revoked, limited, or modified;
- (4) shall not create, or be construed to create, any right, title, or interest in or to any fish before the fish is harvested by the holder; and
- (5) shall be considered a grant of permission to the holder of the limited access privilege or quota share to engage in activities permitted by such limited access privilege or quota share.

(c) REQUIREMENTS FOR LIMITED ACCESS PRIVILEGES.—

(1) IN GENERAL.—Any limited access privilege program to harvest fish submitted by a Council or approved by the Secretary under this section shall—

- (A) if established in a fishery that is overfished or subject to a rebuilding plan, assist in its rebuilding;
- (B) if established in a fishery that is determined by the Secretary or the Council to have over-capacity, contribute to reducing capacity;
- (C) promote—
 - (i) fishing safety;
 - (ii) fishery conservation and management; and
 - (iii) social and economic benefits;

- (D) prohibit any person other than a United States citizen, a corporation, partnership, or other entity established under the laws of the United States or any State, or a permanent resident alien, that meets the eligibility and participation requirements established in the program from acquiring a privilege to harvest fish, including any person that acquires a limited access privilege solely for the purpose of perfecting or realizing on a security interest in such privilege;
- (E) require that all fish harvested under a limited access privilege program be processed on vessels of the United States or on United States soil (including any territory of the United States);
- (F) specify the goals of the program;
- (G) include provisions for the regular monitoring and review by the Council and the Secretary of the operations of the program, including determining progress in meeting the goals of the program and this Act, and any necessary modification of the program to meet those goals, with a formal and detailed review 5 years after the implementation of the program and thereafter to coincide with scheduled Council review of the relevant fishery management plan (but no less frequently than once every 7 years);
- (H) include an effective system for enforcement, monitoring, and management of the program, including the use of observers or electronic monitoring systems;
- (I) include an appeals process for administrative review of the Secretary's decisions regarding initial allocation of limited access privileges;
- (J) provide for the establishment by the Secretary, in consultation with appropriate Federal agencies, for an information collection and review process to provide any additional information needed to determine whether any illegal acts of anti-competition, anti-trust, price collusion, or price fixing have occurred among regional fishery associations or persons receiving limited access privileges under the program; and
- (K) provide for the revocation by the Secretary of limited access privileges held by any person found to have violated the antitrust laws of the United States.

(2) WAIVER.—The Secretary may waive the requirement of paragraph (1)(E) if the Secretary determines that—

- (A) the fishery has historically processed the fish outside of the United States; and
- (B) the United States has a seafood safety equivalency agreement with the country where processing will occur.

(3) FISHING COMMUNITIES.—

(A) IN GENERAL.—

- (i) ELIGIBILITY.—To be eligible to participate in a limited access privilege program to harvest fish, a fishing community shall—
 - (I) be located within the management area of the relevant Council;
 - (II) meet criteria developed by the relevant Council, approved by the Secretary, and published in the Federal Register;
 - (III) consist of residents who conduct commercial or recreational fishing, processing, or fishery-dependent support businesses within the Council’s management area; and
 - (IV) develop and submit a community sustainability plan to the Council and the Secretary that demonstrates how the plan will address the social and economic development needs of coastal communities, including those that have not historically had the resources to participate in the fishery, for approval based on criteria developed by the Council that have been approved by the Secretary and published in the Federal Register.
- (ii) FAILURE TO COMPLY WITH PLAN.—The Secretary shall deny or revoke limited access privileges granted under this section for any person who fails to comply with the requirements of the community sustainability plan. Any limited access privileges denied or revoked under this section may be reallocated to other eligible members of the fishing community.

(B) PARTICIPATION CRITERIA.—In developing participation criteria for eligible communities under this paragraph, a Council shall consider—

- (i) traditional fishing or processing practices in, and dependence on, the fishery;
- (ii) the cultural and social framework relevant to the fishery;
- (iii) economic barriers to access to fishery;
- (iv) the existence and severity of projected economic and social impacts associated with implementation of limited access privilege programs on harvesters, captains, crew, processors, and other businesses substantially dependent upon the fishery in the region or subregion;
- (v) the expected effectiveness, operational transparency, and equitability of the community sustainability plan; and

(vi) the potential for improving economic conditions in remote coastal communities lacking resources to participate in harvesting or processing activities in the fishery.

(4) REGIONAL FISHERY ASSOCIATIONS.—

(A) IN GENERAL.—To be eligible to participate in a limited access privilege program to harvest fish, a regional fishery association shall—

- (i) be located within the management area of the relevant Council;
- (ii) meet criteria developed by the relevant Council, approved by the Secretary, and published in the Federal Register;
- (iii) be a voluntary association with established by-laws and operating procedures;
- (iv) consist of participants in the fishery who hold quota share that are designated for use in the specific region or subregion covered by the regional fishery association, including commercial or recreational fishing, processing, fishery-dependent support businesses, or fishing communities;
- (v) not be eligible to receive an initial allocation of a limited access privilege but may acquire such privileges after the initial allocation, and may hold the annual fishing privileges of any limited access privileges it holds or the annual fishing privileges that its members contribute; and
- (vi) develop and submit a regional fishery association plan to the Council and the Secretary for approval based on criteria developed by the Council that have been approved by the Secretary and published in the Federal Register.

(B) FAILURE TO COMPLY WITH PLAN.—The Secretary shall deny or revoke limited access privileges granted under this section to any person participating in a regional fishery association who fails to comply with the requirements of the regional fishery association plan.

(C) PARTICIPATION CRITERIA.—In developing participation criteria for eligible regional fishery associations under this paragraph, a Council shall consider—

- (i) traditional fishing or processing practices in, and dependence on, the fishery;
- (ii) the cultural and social framework relevant to the fishery;
- (iii) economic barriers to access to fishery;
- (iv) the existence and severity of projected economic and social impacts associated with implementation of limited access privilege programs on

harvesters, captains, crew, processors, and other businesses substantially dependent upon the fishery in the region or subregion;

- (v) the administrative and fiduciary soundness of the association; and
- (vi) the expected effectiveness, operational transparency, and equitability of the fishery association plan.

(5) ALLOCATION.—In developing a limited access privilege program to harvest fish a Council or the Secretary shall—

(A) establish procedures to ensure fair and equitable initial allocations, including consideration of—

- (i) current and historical harvests;
- (ii) employment in the harvesting and processing sectors;
- (iii) investments in, and dependence upon, the fishery; and
- (iv) the current and historical participation of fishing communities;

(B) consider the basic cultural and social framework of the fishery, especially through—

(i) the development of policies to promote the sustained participation of small owner-operated fishing vessels and fishing communities that depend on the fisheries, including regional or port-specific landing or delivery requirements; and

(ii) procedures to address concerns over excessive geographic or other consolidation in the harvesting or processing sectors of the fishery;

(C) include measures to assist, when necessary and appropriate, entry-level and small vessel owner-operators, captains, crew, and fishing communities through set-asides of harvesting allocations, including providing privileges, which may include set-asides or allocations of harvesting privileges, or economic assistance in the purchase of limited access privileges;

(D) ensure that limited access privilege holders do not acquire an excessive share of the total limited access privileges in the program by—

(i) establishing a maximum share, expressed as a percentage of the total limited access privileges, that a limited access privilege holder is permitted to hold, acquire, or use; and

(ii) establishing any other limitations or measures necessary to prevent an inequitable concentration of limited access privileges; and

(E) authorize limited access privileges to harvest fish to be held, acquired, used by, or issued under the system to persons who substantially participate in the fishery, including in a specific sector of such fishery, as specified by the Council.

(6) PROGRAM INITIATION.—

(A) LIMITATION.—Except as provided in subparagraph (D), a Council may initiate a fishery management plan or amendment to establish a limited access privilege program to harvest fish on its own initiative or if the Secretary has certified an appropriate petition.

(B) PETITION.—A group of fishermen constituting more than 50 percent of the permit holders, or holding more than 50 percent of the allocation, in the fishery for which a limited access privilege program to harvest fish is sought, may submit a petition to the Secretary requesting that the relevant Council or Councils with authority over the fishery be authorized to initiate the development of the program. Any such petition shall clearly state the fishery to which the limited access privilege program would apply. For multispecies permits in the Gulf of Mexico, only those participants who have substantially fished the species proposed to be included in the limited access program shall be eligible to sign a petition for such a program and shall serve as the basis for determining the percentage described in the first sentence of this subparagraph.

(C) CERTIFICATION BY SECRETARY.—Upon the receipt of any such petition, the Secretary shall review all of the signatures on the petition and, if the Secretary determines that the signatures on the petition represent more than 50 percent of the permit holders, or holders of more than 50 percent of the allocation in the fishery, as described by subparagraph (B), the Secretary shall certify the petition to the appropriate Council or Councils.

(D) NEW ENGLAND AND GULF REFERENDUM.—

(i) Except as provided in clause (iii) for the Gulf of Mexico commercial red snapper fishery, the New England and Gulf Councils may not submit, and the Secretary may not approve or implement, a fishery management plan or amendment that creates an individual fishing quota program, including a Secretarial plan, unless such a system, as ultimately developed, has been approved by more than 2/3 of those voting in a referendum among eligible permit holders, or other persons described in clause (v), with respect to the New England Council, and by a majority of those voting in the referendum among eligible permit holders with respect to the Gulf Council. For multispecies permits in the Gulf of Mexico, only those participants who have substantially

fished the species proposed to be included in the individual fishing quota program shall be eligible to vote in such a referendum. If an individual fishing quota program fails to be approved by the requisite number of those voting, it may be revised and submitted for approval in a subsequent referendum.

(ii) The Secretary shall conduct a referendum under this subparagraph, including notifying all persons eligible to participate in the referendum and making available to them information concerning the schedule, procedures, and eligibility requirements for the referendum process and the proposed individual fishing quota program. Within 1 year after the date of enactment of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006, the Secretary shall publish guidelines and procedures to determine procedures and voting eligibility requirements for referenda and to conduct such referenda in a fair and equitable manner.

(iii) The provisions of section 407(c) of this Act shall apply in lieu of this subparagraph for an individual fishing quota program for the Gulf of Mexico commercial red snapper fishery.

(iv) Chapter 35 of title 44, United States Code, (commonly known as the Paperwork Reduction Act) does not apply to the referenda conducted under this subparagraph.

(v) The Secretary shall promulgate criteria for determining whether additional fishery participants are eligible to vote in the New England referendum described in clause (i) in order to ensure that crew members who derive a significant percentage of their total income from the fishery under the proposed program are eligible to vote in the referendum.

(vi) In this subparagraph, the term ‘individual fishing quota’ does not include a sector allocation.

(7) TRANSFERABILITY.—In establishing a limited access privilege program, a Council shall—

(A) establish a policy and criteria for the transferability of limited access privileges (through sale or lease), that is consistent with the policies adopted by the Council for the fishery under paragraph (5); and

(B) establish, in coordination with the Secretary, a process for monitoring of transfers (including sales and leases) of limited access privileges.

(8) PREPARATION AND IMPLEMENTATION OF SECRETARIAL PLANS.—This subsection also applies to a plan prepared and implemented by the Secretary under section 304(c) or 304(g).

(9) ANTITRUST SAVINGS CLAUSE.—Nothing in this Act shall be construed to modify, impair, or supersede the operation of any of the antitrust laws. For purposes of the preceding sentence, the term ‘antitrust laws’ has the meaning given such term in subsection (a) of the first section of the Clayton Act, except that such term includes section 5 of the Federal Trade Commission Act to the extent that such section 5 applies to unfair methods of competition.

(d) AUCTION AND OTHER PROGRAMS.—In establishing a limited access privilege program, a Council shall consider, and may provide, if appropriate, an auction system or other program to collect royalties for the initial, or any subsequent, distribution of allocations in a limited access privilege program if—

(1) the system or program is administered in such a way that the resulting distribution of limited access privilege shares meets the program requirements of this section; and

(2) revenues generated through such a royalty program are deposited in the Limited

Access System Administration Fund established by section 305(h)(5)(B) and available subject to annual appropriations.

(e) COST RECOVERY.—In establishing a limited access privilege program, a Council shall—

(1) develop a methodology and the means to identify and assess the management, data collection and analysis, and enforcement programs that are directly related to and in support of the program; and

(2) provide, under section 304(d)(2), for a program of fees paid by limited access privilege holders that will cover the costs of management, data collection and analysis, and enforcement activities.

(f) CHARACTERISTICS.—A limited access privilege established after the date of enactment of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006 is a permit issued for a period of not more than 10 years that—

(1) will be renewed before the end of that period, unless it has been revoked, limited, or modified as provided in this subsection;

(2) will be revoked, limited, or modified if the holder is found by the Secretary, after notice and an opportunity for a hearing under section 554 of title 5, United States Code, to have failed to comply with any term of the plan identified in the plan as cause for revocation, limitation, or modification of a permit, which may include conservation requirements established under the plan;

(3) may be revoked, limited, or modified if the holder is found by the Secretary, after notice and an opportunity for a hearing under section 554 of title 5, United States Code, to have committed an act prohibited by section 307 of this Act; and

(4) may be acquired, or reacquired, by participants in the program under a mechanism established by the Council if it has been revoked, limited, or modified under paragraph (2) or (3).

(g) LIMITED ACCESS PRIVILEGE ASSISTED PURCHASE PROGRAM.—

(1) IN GENERAL.—A Council may submit, and the Secretary may approve and implement, a program which reserves up to 25 percent of any fees collected from a fishery under section 304(d)(2) to be used, pursuant to section 53706(a)(7) of title 46, United States Code, to issue obligations that aid in financing—

- (A) the purchase of limited access privileges in that fishery by fishermen who fish from small vessels; and
- (B) the first-time purchase of limited access privileges in that fishery by entry level fishermen.

(2) ELIGIBILITY CRITERIA.—A Council making a submission under paragraph (1) shall recommend criteria, consistent with the provisions of this Act, that a fisherman must meet to qualify for guarantees under subparagraphs (A) and (B) of paragraph (1) and the portion of funds to be allocated for guarantees under each subparagraph.

(h) EFFECT ON CERTAIN EXISTING SHARES AND PROGRAMS.—Nothing in this Act, or the amendments made by the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006, shall be construed to require a reallocation or a reevaluation of individual quota shares, processor quota shares, cooperative programs, or other quota programs, including sector allocation in effect before the date of enactment of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006.

(i) TRANSITION RULES.—

(1) IN GENERAL.—The requirements of this section shall not apply to any quota program, including any individual quota program, cooperative program, or sector allocation for which a Council has taken final action or which has been submitted by a Council to the Secretary, or approved by the Secretary, within 6 months after the date of enactment of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006, except that—

- (A) the requirements of section 303(d) of this Act in effect on the day before the date of enactment of that Act shall apply to any such program;
- (B) the program shall be subject to review under subsection (c)(1)(G) of this section not later than 5 years after the program implementation; and
- (C) nothing in this subsection precludes a Council from incorporating criteria contained in this section into any such plans.

(2) PACIFIC GROUNDFISH PROPOSALS.—The requirements of this section, other than subparagraphs (A) and (B) of subsection (c)(1) and subparagraphs (A), (B), and (C) of paragraph (1) of this subsection, shall not apply to any proposal authorized under section 302(f) of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006 that is submitted within the timeframe prescribed by that section.

Table 7. List of Preparers, Reviewers, and IPT Members

Name	Title	Agency	Division	Location
Kate Quigley (lead)*	Economist	SAFMC	N/A	SAFMC
Nikhil Mehta (lead)*	Fishery Biologist	NMFS	SF	SERO
Myra Brouwer	Fishery Biologist	SAFMC	N/A	SAFMC
John Carmichael	Fishery Biologist	SAFMC	N/A	SAFMC
David Dale	EFH Specialist	NMFS	HC	SERO
Rick DeVictor	Environmental Impact Scientist	SAFMC	N/A	SAFMC
Otha Easley*	Enforcement Specialist	NMFS	LE	SERO
Dave Gloeckner*	Fishery Biologist	NMFS	SF	SEFSC
Karla Gore	Fishery Biologist	NMFS	SF	SERO
Andy Herndon	Biologist	NMFS	PR	SERO
Jennifer Lee	Council Liaison	NMFS	PR	SERO
Jack McGovern*	Fishery Biologist	NMFS	SF	SERO
Janet Miller*	Fishery Biologist	NMFS	SF	SERO
Kate Michie*	Fishery Management Specialist	NMFS	SF	SERO
Jose Montanez	Fishery Biologist	MAFMC	N/A	MAFMC
Roger Pugliese	Senior Fishery Biologist	SAFMC	N/A	SAFMC
Monica Smit-Brunello*	Attorney Advisor	NOAA	GC	SERO
Jim Waters*	Economist	NMFS	Economics	SEFSC
Andy Strelcheck*	Fishery Biologist	NMFS	SF	SERO
Mike Travis*	Economist	NMFS	SF	SERO
Doug Vaughan	Stock Assessment Biologist	NMFS	SF	SEFSC
Gregg Waugh*	Deputy Director	SAFMC	N/A	SAFMC

* Prepared, contributed to, or reviewed document.

Appendix C References