

## **2.0 Background and Purpose**

### **2.1 Brief History of Prior Management Actions**

The Northeast Multispecies FMP was adopted in 1986 to manage key groundfish stocks from Maine to Cape Hatteras. Management actions under this FMP were summarized in Amendment 5, adopted in 1994. The key actions leading to this action since Amendment 5 are summarized below.

#### **Sustainable Fisheries Act**

Despite the efforts taken in Amendment 5 and the cutbacks made by the industry during the following years, new legislation in 1996 set the standards for effective management even higher. The Magnuson-Stevens Act was amended with the adoption of the Sustainable Fisheries Act (SFA) in 1996. The SFA placed new demands on fishery management plans to reduce bycatch, identify and protect Essential Fish Habitat, and minimize adverse effects of fishing on EFH to the extent practicable. It also initiated new National Standards in the MSFCMA that emphasized minimizing impacts to fishing communities, improving safety at sea, significantly reducing bycatch and improving the collection and use of fishery and biological data.

#### **Amendment 7**

Amendment 7, implemented in 1996, sought to address the requirements of the SFA and newly amended MSFCMA. The amendment accelerated the DAS effort reduction program established in Amendment 5, eliminated significant exemptions from the current effort control program, provided incentives to fish exclusively with mesh larger than the minimum required, broadened the area closures to protect juvenile and spawning fish, and increased the haddock possession limit to 1,000 pounds. It established a rebuilding program for Georges Bank (GB) and Southern New England (SNE) yellowtail flounder, GB and GOM cod, and GB haddock based primarily on days-at-sea (DAS) controls, area closures, and minimum mesh size. Additionally, the amendment changed existing permit categories and initiated several new ones, including an open access multispecies permit for limited access sea scallop vessels. Amendment 7 also created a program for reviewing the management measures annually and making changes to the regulations through the framework adjustment process to insure that plan goals would be met. Of all the major changes to the Northeast Multispecies Plan, Amendments 5 and 7 had the greatest impact on the fishery, both for stock rebuilding and in shaping the socio-economic conditions of the industry and fishing communities.

#### **Amendment 9 and Essential Fish Habitat**

Amendment 9 (1999) also had a significant impact on the fishery, establishing new status determination criteria (overfishing definitions) and setting the Optimum Yield (OY) for twelve groundfish species to bring the plan into complete compliance with the SFA. However, according to a 2000 ruling in *American Oceans Campaign et al. v. Daley et al.* [Civil Action No. 99-982(GK)], EFH considerations continued to be inadequate in fishery management plans. The prosecution contested the adequacy of evaluations of fishing gear impacts on EFH and challenged NMFS approval of amendments and management plans which did not fully address the impacts of fishing on habitat. The U.S. District Court for the District of Columbia found that the agency's decisions on the subject EFH amendments were in accordance with the Magnuson-Stevens Act, but found that the EAs for the Councils' amendments were inadequate and in violation of NEPA. The court determined that the EAs prepared for the EFH provisions of the fishery management plans did not fully consider all relevant alternatives. The court specifically criticized several of the EAs for evaluating only two options for the EFH amendments: either approval of the amendment or status quo. Additionally, the decision noted that the descriptions and analyses of the environmental impacts of the proposed actions and alternatives were vague or not fully explained. The court ordered NMFS to complete a

new and thorough NEPA analysis for each EFH amendment named in the suit. Amendments 11 and 12 addressed the SFA requirements for designating EFH for all managed species and for managing whiting (silver hake), red hake and offshore hake through a separate small-mesh multispecies management plan implemented in 2000.

### **Framework Adjustments and Interim Rule**

The Northeast Multispecies FMP has been subject to many additional changes since its inception. Besides the 11 amendments implemented prior to development of Amendment 13, the multispecies plan has been altered through framework adjustments 30 times since 1994.

The Council has held four annual reviews and made eight adjustments to the FMP to address Amendment 7 rebuilding needs (Frameworks 20, 24, 25, 26, 27, 30 and 33). In 1999, the Council submitted Framework 27 as the primary annual adjustment framework. At the final framework meeting on January 27-28, the Council focused on the finalizing the severe restrictions necessary to achieve the plan objectives for GOM cod and was unable to complete development of the measures needed for GB cod. It followed immediately with the development of Framework 30 to address GB cod, which was submitted to NMFS on April 30.

Both Frameworks 27 and 30 contained trip limits for GOM and GB cod. In both cases, the Regional Administrator was authorized to reduce the trip limit when 75 percent of the target TAC for each stock was reached. On May 28, 1999, the Regional Administrator reduced the GOM cod limit implemented on May 1, 1999 of 200 pounds per day to 30 pounds per day, just three weeks into the fishing year. However, even before the trip limit was reduced, fishermen reported excessive discards of cod as seasonal closures ended.

On May 28, 1999, responding to widespread reports from the industry about the levels of cod discards in the western Gulf of Maine, the Council requested that the Secretary of Commerce increase the trip limit under the emergency action authority provided in §305 of the Magnuson-Stevens Act. On August 3, NMFS published an interim rule that increased the trip limit from 30 pounds per day to 100 pounds per day, with a maximum possession limit of 500 pounds and modifications to the running clock. The interim rule expired on January 30, 2000.

NMFS announced on July 29, 1999 that it disapproved the 30-day closure on Georges Bank proposed in Framework 30, but it approved the trip limit, which took effect on August 15. Framework 30 established a GB cod trip limit of 2,000 pounds per day/20,000 pounds maximum possession limit that the Regional Administrator may reduce when 75 percent of the target TAC is landed.

To address potential discarding in the GOM cod fishery upon expiration of the interim rule, and to prevent repeating on Georges Bank the discarding situation that occurred in the Gulf of Maine when the trip limit was reduced, the Council submitted Framework 31 on October 14, 1999. NMFS approved the increased GOM cod trip limit on January 5, 2000, but it disapproved the change to the GB cod trip limit program that would have eliminated the authority of the Regional Administrator to make mid-season adjustments to the trip limit when 75 percent of the target TAC is reached.

Framework 33 was implemented on June 1, 2000 to reduce or maintain fishing mortality rates for the five critical stocks below fishing mortality rebuilding targets established by Amendment 7. This framework continued the status quo seasonal closures for Gulf of Maine cod, but incorporated a "trigger" for additional closures: if 50 per cent of the target TAC was landed by July 31, the Cashes Ledge Closed Area would be closed in November and Blocks 124 and 125 would be closed in January. The WGOM closure was extended for an additional year, to April 30, 2002. GOM cod trip

limits were held at 400 pounds per day with a maximum possession limit of ten times the daily limit. Party and charter vessels were required to obtain a letter of authorization to fish in any of the GOM closed areas, and a limited access vessel in this program was prohibited from fishing on a DAS while in possession of the letter. A GB cod trip limit of 2,000 pounds per day, not to exceed 20,000 pounds per tip, was also adopted. In addition, a closure of Blocks 109-114, 98, and 99 during May was implemented. The Council also proposed changes to the large mesh permit category, but these were not approved by NMFS.

The Multispecies Monitoring Committee (MSMC) reviewed stock status in November, 2000, and concluded that Amendment 7 fishing mortality targets were likely being met for GB cod, GB haddock, GB yellowtail flounder, and SNE yellowtail flounder. The fishing mortality of GOM cod could not be determined with precision because of extensive discards that were believed to have occurred in 1999 because of the low trip limit. The MSMC recommended that an annual adjustment not be made until the status of GOM cod could be determined.

GB cod was assessed in June 2001 and fishing mortality was reported to be slightly above the Amendment 7 target; subsequent assessments have shown this report to be in error. GOM cod was assessed in June 2001, and fishing mortality was found to be significantly above the  $F_{MAX}$  target for this stock. After receiving the information on GOM cod at the July, 2001 Council meeting, the Council renewed efforts to develop Framework 36. The initial plan was to determine final management measures at the September Council meeting. Just prior to this meeting, however, the National Marine Fisheries Service advised the Council that an Environmental Impact Statement (EIS) was required for this action. Scoping was immediately initiated and it was decided to incorporate the annual adjustment into this action. Framework 36 was completed by December 2001, but the Council did not adopt the framework and it was not submitted.

Frameworks 37 and 38 instituted changes to management of the whiting fishery.

#### ***Conservation Law Foundation et al. v. Evans et al.***

In December 2001, Conservation Law Foundation and other organizations successfully filed suit against NMFS alleging that the rebuilding plans the NMFS implemented were not consistent with Amendment 9 overfishing definitions (*Conservation Law Foundation et al. v. Evans et al.*). Additionally, they charged that there had been a consistent failure in management plans to assess bycatch reporting and establish measures to minimize bycatch and bycatch mortality (when bycatch is unavoidable). After a long series of negotiations among various parties, interim measures were adopted by the court and NMFS was instructed to submit a management plan to comply with the law. The response to this is Amendment 13, which will address stock rebuilding issues, greatly reduce fishing effort and capacity in the multispecies fishery and implement additional measures to specifically address habitat protection.

#### ***Trawl Survey Issues and Amendment 13 Development***

During the period of Amendment 13 development, the relationship between the multispecies fishing industry and the scientific community has also undergone important changes. In September 2002, a Cape Cod fisherman convinced federal scientists that the trawl warps used to tow the groundfish survey gear used by the Northeast Fisheries Science Center were of different lengths, a fact that was confirmed. A series of workshops took place to assess how the warp length discrepancy and confounding structural problems with the otter trawl doors and footrope may have affected data quality. Issues surrounding the trawl warps, reference point estimates, and a trawl survey experiment were evaluated by Payne et al. (2003) and the general conclusion was that the information available was suitable for management. Payne et al. (2003) also provided numerous recommendations for further investigation of the issues raised. It is likely that in the future, greater emphasis will be

placed on collaborative efforts in fisheries research in order to improve communication and understanding among fishermen and scientists, and collect more comprehensive and complete data for management of the fishery. The problems with the survey trawls emerged at a critical time in the development of this amendment and have resulted in a series of setbacks to implementation of the plan. The court granted NMFS an eight-month extension in the date of implementation of the amendment to May 1, 2004 in order to reevaluate the biological data used in establishing biological reference points for the stocks.

Demonstrating abounding variety in its multitude of fishery participants, fishing communities, stocks and species, and individuals and organizations involved in management, the Northeast multispecies fishery is one of the most complex and colorful in this country. This diversity, which is implicit in the uniqueness of New England's fishing heritage, also creates challenges to equitability and simplicity in management. The evolution of groundfish management in New England has served to shape and transform all elements of the fishery.

## **2.2 Purpose and Need for Action**

This amendment is designed to meet all the requirements of the M-S Act for the Northeast Multispecies Fishery. This amendment is prepared by the New England Fishery Management Council (NEFMC; Council). After the proposed action is reviewed, the Amendment will be approved and implemented by the National Marine Fisheries Service (NMFS). Stocks managed in this fishery are described in Amendments 5, 7 and 9. Specific alternatives are identified to:

- Rebuild overfished fisheries
- End overfishing where it occurs
- Minimize, to the extent practicable, the adverse effects of fishing on essential fish habitat to comply with section 303(a)(7) of the Magnuson-Stevens Act. More specifically, the purpose is to identify and describe adverse effects of fishing on EFH and to minimize to the extent practicable these adverse effects. This Environmental Impact Statement (EIS) responds, in part (see above), to the court's directive to NMFS to complete new NEPA analyses for the Northeast Multispecies Fishery Management Plan. Although the plaintiffs' complaint focused on whether NMFS had adequately evaluated the effects of fishing on EFH, NMFS decided to complete new EIS's to evaluate all of the EFH components of the applicable fishery management plans. Accordingly, this SEIS reevaluates the impacts of amending the Northeast Multispecies fishery management plans to include the EFH provisions required by the Magnuson-Stevens Act. The SEIS analyzes alternatives for the EFH FMP amendments, including the alternative that was adopted by the Council and approved by NMFS in 1999 and other alternatives.
- Minimize bycatch and minimize mortality of bycatch that cannot be avoided
- Provide options for reducing harvesting capacity
- Address numerous issues with respect to the administration of the fishery
- Implement management measures for tuna purse seine vessel access to groundfish closed areas, an expansion of the northern shrimp fishery exemption area, and an exemption for general category scallop vessels in southern New England.

Twelve groundfish stocks are either overfished, or have been declared overfished in the past and are currently rebuilding under programs that do not meet the requirements of the M-S Act. In addition to these stocks, two additional stocks are experiencing overfishing. Failure to reduce fishing mortality in order to rebuild these stocks and/or end overfishing will result in the loss of net benefits valued at \$200 million or less (at a cumulative probability of 90 percent) over a 23 year period. While many stocks will continue to increase under current fishing mortality rates – indeed, some will increase to

levels not observed in the last thirty years – most stocks will not achieve levels that will support maximum sustainable yields.

In the 1996 reauthorization of the Magnuson-Stevens Act, Congress recognized that one of the greatest long-term threats to the viability of commercial and recreational fisheries is the continuing loss of marine, estuarine, and other aquatic habitats. To ensure habitat considerations receive increased attention for the conservation and management of fishery resources, the amended Magnuson-Stevens Act included new EFH requirements, and each fishery management plan must now include specific EFH provisions. Section 303(a)(7) of the Magnuson-Stevens Act requires that each FMP describe and identify EFH for the fishery based on the guidelines established by the Secretary (50 CFR part 600, Subpart J), minimize to the extent practicable adverse effects on EFH caused by fishing, and identify other actions to encourage the conservation and enhancement of EFH. The description and identification of EFH is applied as included in Amendment 11 to the Northeast Multispecies FMP of 1998.

### **2.2.1 The NEPA Analysis and Fishery Management Plan Actions**

NEPA provides a mechanism for identifying and evaluating the full spectrum of environmental issues associated with Federal actions, and for considering a reasonable range of alternatives to avoid or minimize adverse environmental impacts. In addition to considering alternatives to end overfishing and rebuild overfished stocks, NMFS and the New England Fishery Management Council considered a wide range of alternatives designed to minimize, to the extent practicable, the adverse effects of fishing on essential fish habitat (EFH). As noted in the court's decision in *AOC v. Daley*, the alternatives NMFS must consider under NEPA are not restricted to the options originally presented in the fishery management plan amendments submitted by the Council. Additional alternatives were developed during the process, and analyzed in this document.

Amendment 13 is a complex action, and the measures that ultimately will be implemented are expected to have significant implications on the conduct of the fishery in the future. Therefore, the Council considered it critically important that the alternatives be well developed and thoroughly analyzed. The Council and NMFS are subject to a court-ordered deadline of May 1, 2004 to implement Amendment 13. In order to allow the Council staff and the Plan Development Team as much time as possible to complete the final analyses of all of the management measures, and because the stipulation requires that a 90-day public comment period be provided for the designation of the EFH alternatives, the Council, in consultation with NMFS, chose to provide to the public the analysis of the EFH alternatives for Amendment 13 as early as possible. The Council voted to submit the EFH DEIS (stand alone) for public comment at its March 2003 meeting. The NOA for the EFH EIS was published on April 4, 2003 (FR 03). The public comment period was ninety days from April 4 through July 2, 2003. Although the EFH DEIS did not contain the complete analysis for all of the management measures under consideration for Amendment 13, it did consider the impacts of the measures under consideration by the Council on EFH. The analyses for the remaining measures of Amendment 13 were completed for the Amendment 13 DSEIS in preparation for the July 2003 Council meeting, at which the Council adopted the DSEIS for Amendment 13 in its entirety. The DSEIS thus constituted another draft of the EFH DEIS. The public had a 45-day period to comment on the DSEIS, including the EFH alternatives included in the DSEIS, prior to the Council taking final action on Amendment 13 in November 2003. Thus, the public was afforded 135 days to comment on the EFH alternatives in Amendment 13. All comments received on the EFH DEIS and the full Amendment 13 DSEIS were considered by the Council in making its final decisions on the measures to be submitted in Amendment 13, and are summarized in Appendix XVII of this SEIS.

### 2.2.2 Notice of Intent and Scoping Process

NMFS published a Notice of Intent (NOI) to prepare a supplemental EIS for an amendment to the Northeast Multispecies FMP on February 23, 1999 (*Federal Register*, 64 FR 8788). Scoping comments were solicited by the Council through May 10, 1999. The NOI highlighted that Amendment 13 was being developed to rebuild overfished stocks, but also would address other issues raised during scoping. The primary issues raised during scoping, organized under major themes, were:

- General problems
  - Management plan is too complex, with too many rules and frequent changes
  - Cumulative socio-economic impacts of successive framework actions not analyzed
  - No mechanism in the FMP to expand/upgrade groundfish observer coverage
  - Uncertainty over stock delineation
  - Different perceptions over the role of target TACs
- Stock rebuilding:
  - Need to address M-S Act requirements for rebuilding programs
  - Management cycle not coordinated with stock assessment cycle
  - Management measures to rebuild weak stocks often preclude fishing for stronger stocks, resulting in excessive economic dislocation
- Fishing Effort and Capacity
  - Allocated DAS cannot be increased without jeopardizing rebuilding
  - Only 1/3 of allocated DAS used in 1998; unused allocations could be reactivated, countering rebuilding efforts
  - Difficult to resolve treatment of recent vs. historic participation in the fishery
  - DAS are not being used as the primary management tool
  - Inequities associated with DAS allocations and usage
  - Frontloading and running of the DAS clock decrease ability to estimate true fishing effort
- Allocation and Equity Issues
  - Equal application of regulations often results in unequal impacts
  - Application of different regulations to different fleet sectors often viewed as unfair
  - Measures often tied to specific gear sectors, yet harvest allocations are not assigned to gear sectors
  - Perceptions of inequity with regard to recreational vessel access to closed areas
- Closed Area Management
  - Difficult to spread conservation burden evenly across fleet sectors using closed areas
  - Closed areas force vessels to concentrate effort and fish less efficiently, intensifying competition and gear conflicts
- Trip Limits
  - Often result in excessive discards
  - Species-specific trip limits in a multispecies fishery often result in discarding
  - Difficult to design a trip limit for both large and small vessels
  - Difficult to enforce
  - Create incentives for derby style fishing if used as a "backstop"

- Experimental and Exempted Fisheries
  - Five percent bycatch standard will become increasingly difficult to meet as groundfish stocks recover
  - Process for obtaining an experimental permit is difficult and time-consuming
  - Difficulty of process discourages conservation engineering
- Fishing Gear and Selectivity
  - FMP does not provide incentives for fishermen to use more selective, less destructive gear
  - NO mechanism to increase accountability for bycatch
  - Difficult to match minimum fish sizes with appropriate minimum mesh size
  - Lack of adequate gear/selectivity information for all multispecies stocks/fisheries

NMFS published a NOI to prepare a supplemental EIS for the EFH components of the Northeast Multispecies and Atlantic Sea Scallop Fishery Management Plans on February 1, 2001 (66 FR 8568). The public comment period was open until April 4, 2001. NMFS (and/or the Council) solicited public comment to identify a range of alternatives for identifying and describing EFH and HAPCs and requested information on adverse effects of fishing activities on EFH and HAPCs. NMFS (and/or the Council) solicited public comment on appropriate management measures and alternatives to minimize, to the extent practicable, any adverse effects of fishing on EFH. NMFS (and/or the Council) held one public scoping meeting. The meeting occurred in Gloucester, MA on February 22, 2001. A summary of the public comments and primary issues raised during the meetings is in the Scoping Report (Appendix 9).

### **2.2.3 Overview of the EFH Elements of the DSEIS**

Based in part on the issues identified during scoping, the DSEIS included an evaluation of the effects of fishing on EFH and an analysis of alternatives to minimize to the extent practicable the adverse effects on EFH from fishing. It incorporated and expanded on the information contained in the supplemental EIS for the EFH components of the Northeast Multispecies Fishery Management Plans. The DSEIS considered and evaluated alternatives to minimize adverse effects to the extent practicable and included consideration of measures such as closed areas, effort reductions and gear modifications. It constituted another draft of the EFH DEIS.

The analysis considers the proposed action, along with a range of other reasonable alternatives. Information from the 1998 EA (included in Amendment 11 to the Multispecies FMP) is reflected in this analysis. However, additional information and the selection of alternatives come from a review of the best scientific information available, including new information made available since the fishery management plan amendments were originally completed.

Sections 9.1 and 9.2 of the SEIS describes the affected biological and physical environment. This includes a discussion of the areas and habitat types in the area that EFH is designated. The section's description of the affected environment details the physical and biological resources affected by the alternatives, including a description of the Atlantic Coast shelf ecosystem, benthic habitat, fishery activity and relevant biological resources with an emphasis on benthic organisms.

Section 9.3.1.2 includes an evaluation of gear effects on EFH. Specifically, the section describes the gears used, distribution and use of the different gears, the types of gear effects, the vulnerability of the EFH to the gear type and a determination of the adverse effects of gears on EFH.

Section 3.7 of the SEIS describes the alternatives for minimizing the adverse effects of fishing on EFH. The section discusses significant issues associated with each alternative including those identified during scoping. The discussion of each alternative for minimizing the effects of fishing on EFH describes the associated fishery management measures. This section concludes with a discussion and explanation of alternatives that were considered but not carried forward for further analysis. The description of alternatives provides a broad summary and comparison of each alternative. Section 5.3.8 details the environmental consequences of each alternative for minimizing the effects of fishing on EFH. For each alternative to minimizing adverse effects of fishing on EFH, the chapter describes the practicability of the associated fishery management measures and evaluates the environmental consequences in relation to effects on EFH, the fishery, other fisheries, and protected resources. The discussion of potential impacts resulting from each alternative is presented in comparative form that clearly distinguishes the environmental consequences of each alternative. The discussion in Section 5.0 includes a description of the conservation benefits and the adverse impacts of the alternatives.

In Sections 5.3 and 9.3.1.8, the document also includes material to satisfy the requirements of the NMFS guidelines at 50 CFR part 600, Subpart J for mandatory requirements of an FMP to:

- (1) Identify any fishing activities that are not managed under the MSA that may adversely affect EFH.
- (2) Identify activities other than fishing that may adversely affect EFH. For each activity, the FMP should describe known and potential adverse effects to EFH.
- (3) Identify actions to encourage the conservation and enhancement of EFH, including recommended options to avoid, minimize, or compensate for the adverse effects, especially in HAPCs.
- (4) List the major prey species for the species in the fishery management unit and discuss the location of prey species' habitat. Consider adverse effects on prey species and their habitats that may result from actions that reduce their availability, either through direct harm or capture, or through adverse effects to prey species' habitats.
- (5) Recommendations, in priority order, for research effects necessary to improve upon the description and identification of EFH, the identification of threats to EFH from fishing and other activities and the development of conservation and enhancement measures for EFH.
- (6) Conduct a cumulative impact analysis that describes impacts on an ecosystem or watershed scale (Cumulative effects of multiple gear types is included in the Gear Effects Evaluation Section)

Appendix 17 includes a summary of comments received on the EFH DEIS and preliminary responses to those comments.

## **2.3 Goals and Objectives**

The goals and objectives of this amendment are:

**Goal 1:** Consistent with the National Standards and other required provisions of the Magnuson-Stevens Fishery Conservation and Management Act and other applicable law, manage the northeast multispecies complex at sustainable levels.

**Goal 2:** Create a management system so that fleet capacity will be commensurate with resource status so as to achieve goals of economic efficiency and biological conservation and that encourages diversity within the fishery.

**Goal 3:** Maintain a directed commercial and recreational fishery for northeast multispecies.

**Goal 4:** Minimize, to the extent practicable, adverse impacts on fishing communities and shoreside infrastructure.

**Goal 5:** Provide reasonable and regulated access to the groundfish species covered in this plan to all members of the public of the United States for seafood consumption and recreational purposes during the stock rebuilding period without compromising the Amendment 13 objectives or timetable. If necessary, management measures could be modified in the future to insure that the overall plan objectives are met.

**Goal 6:** To promote stewardship within the fishery.

**Objective 1:** Achieve, on a continuing basis, optimum yield (OY) for the U.S. fishing industry.

**Objective 2:** Clarify the status determination criteria (biological reference points and control rules) for groundfish stocks so they are consistent with the National Standard guidelines and applicable law.

**Objective 3:** Adopt fishery management measures that constrain fishing mortality to levels that are compliant with the Sustainable Fisheries Act.

**Objective 4:** Implement rebuilding schedules for overfished stocks, and prevent overfishing.

**Objective 5:** Adopt measures as appropriate to support international transboundary management of resources.

**Objective 6:** Promote research and improve the collection of information to better understand groundfish population dynamics, biology and ecology, and to improve assessment procedures in cooperation with the industry.

**Objective 7:** To the extent possible, maintain a diverse groundfish fishery, including different gear types, vessel sizes, geographic locations, and levels of participation.

**Objective 8:** Develop biological, economic and social measures of success for the groundfish fishery and resource that insure accountability in achieving fishery management objectives.

**Objective 9:** Adopt measures consistent with the habitat provisions of the M-S Act, including identification of EFH and minimizing impacts on habitat to the extent practicable.

**Objective 10:** Identify and minimize bycatch, which include regulatory discards, to the extent practicable, and to the extent bycatch cannot be avoided, minimize the mortality of such bycatch.

## 2.4 Changes from the Draft Amendment and DSEIS

This final amendment and FSEIS differ from the draft amendment and DSEIS in several ways. First, the proposed action is identified. Second, the document has been edited and re-organized to clearly identify the proposed action and alternatives not selected. Finally, additional analyses and discussion have been added to support the proposed actions. These changes are a result both of public comments and actions taken by the Council.

A large number of comments were received on the draft amendment and DSEIS. Most of these comments were in support of a particular alternative or proposed measure; those comments were noted. Additional comments were received questioning the analysis or the tools used to analyze the impacts of various alternatives. The volume of comments prevented an individual response, so the comments were summarized and addressed in Appendix XVII.

For the most part, the proposed actions have been selected from the alternatives described in the draft amendment. A major difference, however, is in the choice of rebuilding trajectories (or strategies) and the management measures for the commercial fishery designed to achieve those objectives. The draft amendment proposed selecting one rebuilding trajectory and applying it to all overfished stocks. Public comments suggested combining the adaptive and phased rebuilding trajectories by applying each only to specific stocks. Comments also were received suggesting appropriate management measures to achieve the mortality rates consistent with the combined trajectories. The Council considered these comments and is proposing a rebuilding approach based in large measure on these suggestions. Both a phased and adaptive trajectory have been adopted, applied to specific stocks. In addition, the trajectories have been modified somewhat to take into account the mortality reductions expected from the proposed measures and to incorporate new information on the observed fishing mortality rates in calendar year 2002. The phased trajectory has been modified into a stepped approach, addressing the practical difficulty of continuously reducing fishing mortality by a small amount each year on a number of stocks. The proposed management measures also differ from those suggested during the comment period. Based in large measure on the Alternative 1 rebuilding measures, they have been modified to include the necessary measures to reduce fishing mortality in future years as called for by the adaptive and phased trajectories. The proposed action also includes an innovative use of a limited number of DAS to target healthy stocks, an idea generated during the comment period. There are minor revisions to other management measures as well, both as a result of public comments and additional Council consideration of these issues. For example, specific details of the various special access programs have been clarified, as have the elements of the Georges Bank hook sector.

The document has been re-organized to clearly identify the proposed action and non-selected alternatives. The proposed action is described first. Non-selected alternatives are grouped into two categories: those that were not selected, and those that were considered and rejected. Generally, non-selected alternatives were analyzed in the draft amendment document and that analysis is included in this FSEIS. Alternatives that were considered and rejected were not analyzed in the DSEIS, but the reason for their rejection is briefly described. With respect to analyses, major elements of the biologic and economic analysis have been separated for the proposed action and non-selected alternatives. For less substantive issues, the analyses have not been separated but which measures are proposed or not selected have been identified in the discussion.

Additional biologic and economic analyses have been incorporated for the combined rebuilding strategies and the proposed commercial fishing management measures. These impacts are also compared to the impacts of the other management alternatives that were not selected. Additional analyses have been added to address the comment that the impact analysis did not consider impacts

on Maine should vessels relocate to other ports. The social impacts of the DAS allocations and the use of DAS to target healthy stocks are also addressed. The bycatch analysis has been updated for the proposed action, and data on dogfish bycatch from a recent assessment has been added to the summary of bycatch information. Additional habitat analyses have been added for the proposed action, and corrections have been made to some of the habitat information based on a review of the public comments.

## 2.5 Stock Status

Through the course of development of this amendment, there has been considerable public comment that the scientific advice used as the basis for the amendment did not reflect the observations of fishermen. This concern was elevated when, in September 2002, NMFS notified the Council that the trawl warps used in the trawl survey were not accurately marked. This amendment is based on the estimates for stock status provided Groundfish Assessment Review Meeting (GARM) report (NEFSC 2002b). The GARM compared recent trawl survey results to previous years and did not detect noticeable differences. Issues surrounding the trawl warps, reference point estimates, and a trawl survey experiment were evaluated by Payne et al. (2003) and the conclusion was that the scientific information available was suitable for management. Payne et al. (2003) also provided numerous recommendations for further investigation of the issues raised. While not all these recommendations have been completed, because of the conclusions of Payne et al. (2003) this document is based on stock status as described in NEFSC 2002b and as updated by subsequent assessments. Stock status is discussed in detail in section 9.2.1.1.

The type of action required depends in part on the status of the stocks when compared to status determination criteria. Formal rebuilding programs are only required for stocks that are overfished - that is, less than the threshold biomass - or stocks that were previously declared overfished. While the Council considered three alternatives for determining threshold biomass, the proposed action is based on the estimates of  $B_{MSY}$  recommended by NEFSC (2002a).

## 2.6 The Future – Habitat Omnibus Amendment Components

In 2004, the Council will initiate a Habitat Omnibus Amendment that will be considered Amendment 14 to the Multispecies FMP. It will also amend the Sea Scallop (Amendment 11), Monkfish (Amendment 3), Herring (Amendment 2), Skate (Amendment 1), Red Crab (Amendment 1) and Atlantic Salmon (Amendment 2) FMPs. This Omnibus Amendment will be completed by the deadline specified in the AOC vs. Daley settlement agreement and, tentatively, will contain the following components:

- **Description and identification of EFH**  
Consideration of a range of alternatives for EFH designations  
Update all NMFS Source Documents for Species Reports
- **Non-Magnuson-Stevens Act fishing activities that may adversely effect EFH**  
Update current section on identifying any fishing activities that are not managed under the MSA that may adversely affect EFH.
- **Non-fishing related activities that may adversely effect EFH**  
Update current section on identifying activities other than fishing that may adversely affect EFH.  
For each activity, the FMP should describe known and potential adverse effects to EFH.

- **Conservation and enhancement**

Update current section on identifying actions to encourage the conservation and enhancement of EFH, including recommended options to avoid, minimize, or compensate for the adverse effects, especially in HAPCs.

- **Prey Species**

Review and update the current list the major prey species for the species in the fishery management unit and discuss the location of prey species' habitat. Consider adverse effects on prey species and their habitats that may result from actions that reduce their availability, either through direct harm or capture, or through adverse effects to prey species' habitats.

- **Research and Information Needs**

Review and update the current recommendations, in priority order, for research effects necessary to improve upon the description and identification of EFH, the identification of threats to EFH from fishing and other activities and the development of conservation and enhancement measures for EFH.

- **Development and adoption of a habitat susceptibility and recovery index for the Northeastern US**

- **Identification of habitat areas of particular concern (HAPCs)**

This will be done through the HAPC process approved by the Council and included in a formal RFP. The RFP will be initiated in NOI for the Omnibus Amendment 2 and terminated 6 months later.

- **Consideration and identification of Dedicated Habitat Research Areas**

May consider using the same type of process as the HAPC process and work closely with the Research Steering Committee on this effort.

- **Integrate alternatives to minimize the adverse effects of fishing on EFH, to the extent practicable, across all NEFMC FMPs.**