Scallop Research Priorities

NMFS published an announcement in June 2012 for possible Scallop RSA funding for both 2013 and 2014. Most proposals only applied for 2013 funding, so there are ample funds still available for 2014.

NMFS could issue another announcement this summer with the same priorities the Council approved last year for FY2013 and FY2014, or the Council could modify the priorities for the 2014 RSA announcement.

In addition, the Council will want to decide if this announcement should be for FY2014 only, or if it should cover two-years again. If it is one year, it will sync up with biennial specification packages (FW25 is for FY2014 only and the next action is expected to be for FY2015-2016). And if it is for two years, it would be more flexible for applicants, and if there are funds available for the second year another announcement could be published.

The PDT has reviewed the list of research priorities from FY2012 and made several suggestions for modifications (**underlined in RED**). The PDT recommends that RSA announcements always be two year announcements to facilitate proposals that are better suited to be multi-year projects. However, the PDT also recommends that if funds are left over for the second year of funding there should be another announcement. Ideally, announcements would just continue every year so priorities could be as up to date as possible and set-aside could be maximized.

The AP and Committee reviewed these priorities in March 2013 and made several additional recommendations by motion (**underlined in GREEN**). The AP agreed with the PDT recommendations, and added several new priorities. The Scallop Committee agreed with all the recommendations made by both groups.

<u>Action Item for the Council:</u> <u>Review recommendations and approve final research priorities for the 2013 RSA announcement.</u>

After the priorities are approved, the Council will send a letter to NMFS and an announcement for available funds would likely be published in the summer of 2013. Final awards will not be granted until the start of the 2013 fishing year.

Major modifications to 2012 announcement included:

- 1. Moved turtle related research from HIGH to MEDIUM;
- 2. Added more specificity to the HIGH bycatch priority item;
- 3. Added the third item under HIGH to survey "candidate" access areas; and
- 4. General clean-up of redundant language in several of the priorities listed under OTHER.

New recommendations from PDT for 2013 announcement include:

- 1. <u>Clarify that some access areas have a higher priority than others based on schedule for opening;</u>
- 2. Add mortality from predation as a MEDUIM priority; and
- 3. Add a new priority about scallop product quality and marketability.

New Recommendations from AP and Committee for 2013 announcement include:

- 1. <u>Add a new bullet under HIGH that would include a broad, resource wide survey of the entire scallop resource.</u>
- 2. <u>Approve all PDT recommendations (1-3 above in RED) and include specific examples of predation (starfish and dogfish) in the research bullet related to mortality from predation.</u>
- 3. <u>Add a new bulled under MEDIUM that would identify and evaluate the potential impacts of</u> environmental stressors on scallops (*By consensus the Committee added more examples to the motion approved by the AP on this subject*).

Research priorities approved by the Council for 2013 and 2014

HIGHEST PRIORITIES (not listed in order of importance):

- An intensive industry-based survey of each of <u>relevant scallop</u> access areas (Closed Area I, Closed Area II, Nantucket Lightship, Delmarva, <u>Elephant Trunk</u>, and Hudson Canyon). The primary deliverable of these surveys would be to estimate total allowable catches (TACs) under the rotational area management program if the data from these surveys are available by August of the prior fishing year. <u>Areas scheduled to be open in the following fishing year generally have a higher priority than other areas.</u>
- Identification and evaluation of methods to reduce the impact of the scallop fishery with respect to bycatch. This would include projects that determine seasonal bycatch rates, characterize spatial and temporal distributional patterns as well as the associated discard mortality rates of yellowtail flounder, and other key bycatch species.
- An intensive industry-based survey of areas that may be candidate access areas in the future (i.e. open areas with high scallop recruitment or closed areas that may open to fishing in the future such as groundfish mortality closed areas or current habitat closed areas).
- Broad, resource wide industry-based survey of entire scallop resource area.

MEDIUM PRIORITY (not listed in order of importance):

- Other resource surveys, to expand and/or enhance survey coverage in areas that have the potential to be important resource areas, but currently have a lack of comprehensive survey coverage.
- Research to support the investigation of the loggerhead turtle behavior in the Mid-Atlantic (via satellite tagging or other means) to understand their seasonal movements, vertical habitat utilization, and how and where interactions with dredge gear are occurring. This priority topic also includes monitoring of scallop dredge and trawl operations, and the development of further gear modifications if monitoring should indicate current designs are not eliminating the threat or harm to sea turtles or are resulting in unacceptable scallop catch loss.
- Studies aimed at addressing issues that were identified as research priorities at the latest assessment: i.e. incidental gear mortality, discard mortality, <u>mortality from predation (i.e. starfish, dogfish, etc.)</u>, and seasonal growth of scallops.
- Research aimed at describing the occurrence as well as understanding the mechanisms of processes that affect scallop product quality and marketability (i.e grey meats, diseases). Related to that, research that would evaluate the potential magnitude of impacts on scallop mortality from "scallop quality" discarding (while shucking).
- <u>Research aimed at the effects of chemicals, water quality, and other environmental stressors on</u> reproduction and growth of scallops (i.e. jet fuel, pesticides, ocean acidification, etc.).

OTHER PRIORITIES (not listed in order of importance):

- Other scallop biology projects, including studies aimed at understanding recruitment processes (reproduction, larval and early post-settlement stages), growth, and natural mortality (including predation and disease).
- Investigation of variability in dredging efficiency across habitats, times, areas, and gear designs to allow for more accurate quantitative estimates of scallop dredge impacts on the seabed and development of practicable methods to minimize or mitigate those impacts.
- Habitat characterization research including, but not limited to: video and/or photo transects of the bottom within scallop access areas and within closed scallop areas and in comparable fished areas that are both subject and not subject to scallop fishing before and after scallop fishing commences (BACI or before after control impact dredge impact studies); identification of nursery and overwintering habitats of species that are vulnerable to habitat alteration by scallop fishing; and other research that relates to habitats affected by scallop fishing, including, but not limited to, long-term or chronic effects of scallop fishing on marine resource productivity, other ecosystem effects, habitat recovery potential, and fine scale fishing effort in relation to fine scale habitat distribution. In particular, projects that directly support evaluation of present and candidate EFH closures to assess whether these areas are accomplishing their stated purposes and to assist better definition of the complex ecosystem processes that occur in these areas.
- Scallop and area management research, including but not limited to: evaluation of ways to control predation on scallops; research to actively manage spat collection and seeding of sea scallops; social and economic impacts and consequences of closing areas to enhance productivity and improve yield of sea scallops and other species; and estimation of factors affecting fishing power for each limited access vessel.
- Develop methodologies or alternative ways for the scallop fleet to collect and analyze catch and bycatch data on a near real-time basis (i.e. collection of scallop meat weight and quality data, specific bycatch information, etc. Potential ideas include but are not limited to: concepts like a "Study fleet", electronic monitoring, dockside monitors, bag tags, etc.).