

Title:

S-107: Encourage region-wide biological monitoring (e.g. via Beach Management Agreements) to document condition of resources that may be impacted by nourishment projects and inform regulatory decisions to ensure ecological functions are maintained.

Background:

- This recommended management action relates to nearshore hardbottom resources in Miami-Dade, Broward, Palm Beach, and Martin counties.
- This recommended management action is being put forth because nearshore hardbottom resources that may be impacted by beach nourishment projects are only monitored in areas adjacent to a project and not continually. Furthermore, monitoring data do not provide information on natural variability of nearshore habitats (e.g., spatial-temporal patterns of hardbottom exposure, stochastic recruitment of benthic organisms etc.). Monitoring protocols can differ from project to project. Regional monitoring will establish predictable and systematic data collection methodologies over the entire area and improve the evaluation of coastal resources over the long term.

Objective:

- The intended outcome of this action is to improve the quality of information on resources that may be impacted by nourishment projects and coastal construction, so that this information can be used to improve project designs in such a way that impacts are minimized. Region- wide biological monitoring data can improve understanding of project-related impacts to resources and improve regulatory actions to ensure that ecosystem functions provided by nearshore habitats are maintained.
- Region-wide monitoring will allow the regulatory agencies to evaluate the status of nearshore resources that may be impacted by nourishment projects. Nourishment projects are necessary for erosion control and to support tourist industry. These projects have important economic consequences. Monitoring data should provide regulators with information that can be used to improve resource regulation, balancing the need for nourishment and ensuring the continued function of nearshore hardbottom habitats.

Intended Benefits and/or Potential Adverse Effects:

- Benefits of implementation of this recommended management action include a regional approach that advances the understanding of coastal ecosystems in general, while improving the quality of recommendations to enhance protection strategies for hardbottom and marine turtle nesting habitats and other area resources (may include infauna such as coquinas and mole crabs). Information on nearshore hardbottom resources will be available to regulatory agencies and can be used for baseline information in the project area needed for permit applications. Monitoring will provide the Florida Department of Environmental Protection (FDEP) with reasonable assurance that potential impacts will be documented. If impacts occur, monitoring data can be used for the Uniform Mitigation Assessment Method to accurately calculate mitigation requirements.
- Some anticipated negative economic impacts associated with this recommended management action include funding for long-term and regional biological monitoring may exceed cost of monitoring on a project-by-project basis.
- The duration of the benefits of this recommended management action is long term.
- If this recommended management action is not implemented regulatory agencies will continue to rely on short-term monitoring that is conducted on a project-by-project basis. Regulatory

View the Entire RMA Document at: www.ourfloridareefs.org/RMAcomment

decisions will be based on all available information, but these decisions will not be as well informed as they would be if long-term, region-wide biological data for nearshore resources were available.

Agencies/ Organizations:

- The lead agency for implementation of this recommended management action would be the FDEP.
- Other potential agencies who could be involved include local government agencies.
- The key stakeholders for this recommended management action would be local (city and county) and state governments, as well as other stakeholders involved with beach nourishment projects that require biological monitoring. Firms that conduct monitoring would be most impacted by this recommended management action.
- There are no legislative considerations for this action.

Permitting/ Enforcement Requirements of RMA:

- There are no permitting requirements for recommended management action.
- Enforcement requirements for this recommended management action include the oversight and compliance and enforcement of projects.
- Means of demonstrating success of this recommended management action include monitoring data and reports, development of better resource management protocols, which may take a more regionalized approach, and the establishment of regional monitoring plans for all four counties in southeast Florida.

Cost:

- The estimated direct cost of implementing this recommended management action does not relate to implementation of the action itself, but rather to the project sponsors whom it could cost upwards of between \$300,000 and \$450,000/year to monitor a single project that is 2 - 4 miles long.
- Funding may be acquired through the project sponsors who could incorporate the added expense into the cost of the project, as is the current practice.

Time Frame & Extent:

- The anticipated timeframe for implementation of this recommended management action is 0 - 2 years.

Miscellaneous Info:

- This recommended management action is linked to N-114 to reinstate the FDEP dive program.
- An uncertainty or information gap with this recommended management action is the current Beach Management Agreement implemented in Palm Beach County (Town of Palm Beach) that has yet to be evaluated. While there are uncertainties regarding this approach, it seems promising.
- Supporting and relevant data include a review of Palm Beach's Beach Management Agreement.

Goals/ Objectives to be achieved:

Refer to the [SEFCRI Coral Reef Management Goals and Objectives Reference Guide](#)

- SEFCRI LAS MICCI Issue 2 Goal Obj. 1 / SEFCRI LAS MICCI Conservation Goal C / SEFCRI LAS MICCI Issue 1 / SEFCRI LAS MICCI Issue 4.

View the Entire RMA Document at: www.ourfloridareefs.org/RMAcomment