

## **DEPARTMENT OF THE ARMY**

NEW YORK DISTRICT, CORPS OF ENGINEERS JACOB K. JAVITS FEDERAL BUILDING NEW YORK, N.Y. 10278-0090

REPLY TO ATTENTION OF

**District Commander** 

## FINDING OF NO SIGNIFICANT IMPACT

## Fire Island Inlet to Moriches Inlet Stabilization Project

- 1. **Project Description:** As a consequence of severe coastal erosion during Hurricane Sandy on October 29, 2012, the dune and berm system between Fire Island and Moriches Inlets has become depleted and particularly vulnerable to overwash and breaching during future storm events. This condition increases the potential for devastating storm damage to shore and particularly back-bay communities. In response to extensive storm damages and increased vulnerability to future events, consistent with the Disaster Relief Appropriations Act of 2013 (Public Law. 113-2; herein P.L. 113-2), and recognizing the urgency to repair and implement immediate storm protection measures, particularly in the Fire Island to Moriches Inlet (FIMI) study area, the U.S. Army Corps of Engineers, New York District (New York District) is proposing to stabilize this barrier island reach.
  - a. The project includes placing on the beach approximately 7,000,000 cubic yards (c.y.) of material obtained from three offshore borrow sites. This stabilization effort has been developed as a one-time, stand-alone construction project to repair damages caused by Hurricane Sandy and to stabilize the island.
  - b. Sand placement consists of design volume and advance fill volume to ensure the design life of 5 years.
  - c. The project area is divided into the Smith Point County Park, Communities, and Robert Moses areas. In the areas with the greatest potential for damages to oceanfront structures (Kismet to Lonelyville, Town Beach to Corneille Estates, Ocean Beach to Seaview, Ocean Bay Park to Point O' Woods, Cherry Grove, Fire Island Pines, Water Island, and Davis Park), the selected plan includes the design of a beach berm with a width of 90 feet at elevation +9.5 feet NGVD and a dune with a crest width of 25 feet at elevation +15 feet NGVD.
  - d. In eastern Smith Point County Park, the Fire Island Lighthouse Tract, and portions of Robert Moses State Park, the selected plan includes the design of a beach berm with a width of 90 feet at elevation +9.5 feet NGVD and a dune with a crest width of 25 feet at elevation +13 feet NGVD. (All dunes will be vegetated and have 1V:5H slopes, except the Fire Island Lighthouse Tract which will have unvegetated dunes consisting of a 1V:10H slope).
  - e. In three locations within these areas (in the areas of the New Made Island, the recently closed Smith Point County Park breach, and Pattersquash Island) the bayside vegetation will be maintained not to exceed approximately 30 -40% coverage for the purpose of maintaining high quality nesting habitat and

- unrestricted travel corridors for adult piping plovers and their chicks to reach feeding habitat on the ocean and bay shores.
- f. In the area of Great Gunn Beach, approximately 84 acres of ocean side habitat will be created, including a beach berm with a width of 200 feet at elevation +9 feet NGVD adjacent to the dune, then a slope at 1V:20H to an elevation of 7.0 ft NGVD with a berm width of 300-400 ft to support the design and implementation of ephemeral pools. The dune, from just west of the Moriches Inlet jetty and westerly for 3000 ft, will be moved bayward (to the north, with a crest width of 25 feet at elevation +25 feet NGVD) and will tie into the existing dune to the west.
- g. In the area of New Made Island, up to 14 acres of bayside habitat will be created by lowering a portion of the existing dredge disposal dike to adjacent grades (+4 feet NGVD), regarding the existing substrate, and covering with 2 ft of sand.
- h. In western sections of Robert Moses State Park and the TWA Memorial Area of Smith Point County Park (where there are existing high ground elevations), the selected plan includes the design of a beach berm with a width of 90 feet at elevation +9.5 feet NGVD.
- i. In several areas, the dune alignment and associated tapers have been adjusted after consultations with U.S. Fish and Wildlife Service and National Park Service in order to address natural resource and park objectives.
- 2. **Coordination:** New York District has coordinated this project with Federal and State resources agencies and the interested public and issued a Notice of Availability of the draft Environmental Assessment (EA) in order to:
  - a. Inform agencies and stakeholders of the proposed work and the environmental evaluation contained in the draft EA, and
  - b. Provide an opportunity for comments on that evaluation and findings.

## 3. Environmental Impacts:

- a. The proposed stabilization effort consists of beach nourishment very similar to what has previously been performed along the coasts of New York and New Jersey by the New York District in that similar construction techniques and equipment will be used.
- b. Section 7 of the Endangered Species Act (ESA) Compliance:
  - i. The New York District prepared a Biological Assessment (BA) for the federally threatened piping plover and a federally threatened plant, seabeach amaranth. In the BA, the New York District proposed to provide protective measures, implement a coordinated survey/monitoring protocol to ensure the safety of the piping plover and seabeach amaranth, and include environmental features as a component of the proposed action for the purpose of enhancing the existing habitat. The proposed measures are intended to allow for more frequent washovers and promote access to spatially diverse foraging habitat. The U.S. Fish and Wildlife Service (USFWS) prepared a Biological Opinion (BO) to address the above listed species accepting the above and recommended the following Reasonable and Prudent Measures to be undertaken:

- 1. The development and implementation of a coordinated mammalian predator management strategy across all major landowners, inlet to inlet, on Fire Island to reduce the threat predators pose to piping plovers for the 10 year expected life of the project;
- 2. The development and implementation of a coordinated piping plover monitoring program, inlet to inlet, on Fire Island, to assess the current and future status of plovers on Fire Island;
- 3. The maintenance of buffers around construction sites (1000m) and breeding piping plovers before July 15) and other human activities, including ORV use, (generally 200m) and breeding piping plovers;
- 4. The maintenance of nesting and foraging habitat through vegetation management on the three overwash areas and the two restored areas discussed above;
- 5. The creation and maintenance of foraging habitat in the Great Gunn Beach area through the design and implementation of lowered berms to support the creation of ephemeral pools discussed above, the lowered berms to be adaptively managed through the life of the project;
- 6. The creation of plover foraging and nesting habitat within the area of the dredge disposal site south of New Made Island discussed above:
- 7. The creation by the Corps of an interagency team (that includes the Service) that will develop and implement a coordinated effectiveness monitoring program, to document the performance of the restored and created plover areas.
- 8. The measures set forth in the BA and the BO have been incorporated into the EA and included in the Project's Plans & Specifications.
- ii. Section 7 compliance for species regulated by National Marine Fisheries Service (NMFS) for this PL 113-2 project is being considered as Emergency Exempt, per Section 7 of the ESA. There is a potential for federally endangered Kemp's Ridley, leatherback, and hawksbill sea turtles, and threatened loggerhead and green sea turtles, to be present in the vicinity of the project borrow area during the summer and early fall months. New York District has developed a protocol with NMFS which specifies special conditions that are to be incorporated into the Project Plans and Specifications and the construction contract to comply with the NMFS agreement. The Atlantic Sturgeon, a newly-listed species will be monitored for presence and the potential for impact to these species will be more fully assessed through the Section 7 Emergency consultation process under the ESA with NMFS.
- c. The New York District, USFWS and NMFS have coordinated on implementing recommendations to minimize take on listed species (outlined in the EA and USFWS BO)
- d. The proposed action is in compliance with all applicable environmental laws. Environmental approvals/requirements are listed in Table 10 of the EA.

Unavoidable adverse impacts to benthic communities would occur as a result of the proposed project. Individual organisms within the benthic communities would be lost as a result of the proposed excavation and nourishment activities. However, benthic organisms would be expected to recolonize the borrow area and beach.

- e. As authorized by law and subject to availability of funds, the Conditions as described in the BO and the Final EA will be incorporated into the construction contract and an adaptive management monitoring program will be implemented to protect threatened and endangered species that may occur in the project area.
- f. Overall, the environmental impacts of implementing the proposed action are expected to be minor in scope and temporary in duration.
- 4. Determination: I have determined that this action does not constitute a major Federal action significantly affecting the quality of the human environment. Therefore, the action does not require the preparation of a detailed statement under Section 102(2) (c) of the National Environmental Policy Act (NEPA) of 1969 (42 U.S.C. 4321 et seq.). My determination was made considering the following factors discussed in this EA:
  - a. The proposed stabilization project has been designed to minimize impacts and avoid adverse impacts to threatened or endangered species potentially occurring in the project area. Specifically, no work will be performed between 1 April and 1 September in order to avoid impacts to nesting piping plovers.
  - b. Due to the short project life of the action, no unacceptable adverse cumulative or secondary impacts would result from project implementation.
  - c. No additional long term adverse impacts to the environment would be associated with the proposed project.
  - d. The emissions levels for NOx will exceed the ozone *de minimis* trigger levels for General Conformity while all other pollutants are below their respective trigger levels. NOx will be fully offset, by rule, therefore the net NOx emissions will be zero and therefore no significant impacts on air quality are expected from the proposed project.
  - e. The District is coordinating a Programmatic Agreement with the New York State Historic Preservation Office and the work has been designed to minimize impacts to any potential cultural resources in the project area.

5. Findings: The proposed Fire Island Inlet to Moriches Inlet Stabilization Project would result in no significant adverse environmental impacts and is the alternative that represents sound engineering practices and meets environmental standards.

03 July 2014

Date

Paul Owen, P.E.

Colonel, Corps of Engineers

Commanding