Final Environmental Impact Statement

Summary

Designation of the Site of the Submerged Wreckage of the MONITOR as a Marine Sanctuary

Responsible Office: National Oceanic and Atmospheric Administration, Office of Coastal Zone Management, Rockville, Maryland

1. Name of Action (X) Administrative

2. Description of Action

3. a. Environmental Impacts

No impact will occur to the environment. Some controls are placed on activities at the wreck site.

4. Alternatives

Four alternatives were considered: (1) salvage; (2) registration in the National Register of Historic Places; (3) absolute protection by regulations to preclude all access and (4) no protection. All were deemed unacceptable.

It is proposed to designate a marine sanctuary under the authority of Title III of the Marine Protection, Research, and Sanctuaries Act of 1972 (hereafter, the Act). The purpose of the designation is to preserve the wreckage of the MONITOR for its unique esthetic (historic, cultural, and technological) value.
The regulations proposed are designed to control access to the vessel so that a systematic understanding of the vessel in its present site can be obtained and the information made available to the public.

The final environmental impact statement was revised from the draft statement based on written comments received. A total of 23 states, agencies, organizations and individuals submitted responses. All but one were in favor of establishing a marine sanctuary. Clarification questions were raised by five respondents.

Comments received are discussed below:

1. It was indicated that the compound description "unique and research" is confusing. We concur and have dropped the research description. The regulations emphasize that access to the vessel will be for the purpose of research.

2. It was pointed out that the best means of marking the site to insure compliance is to clearly mark all new navigation charts and make available navigational bearings. We concur. No marker(s) or buoy(s) are proposed for this location owing to environmental conditions that would make the maintenance of either too costly. However, in addition to marking all new charts, a notice to mariners will be issued; and all marine facilities in North Carolina will be advised of the sanctuary and its location in terms of navigational bearings.
3. The need for an environmental impact statement was questioned. An environmental impact statement was recommended by the Council on Environmental Quality.

4. Concern was expressed regarding the impact of the regulations on foreign vessels and nationals. The regulations will not apply to foreign nations or vessels. However, foreign governments will be advised by the Department of State of the sanctuary, and will be requested to respect the sanctuary boundaries and regulations.

5. Questions were raised as to surveillance responsibility and protective means. The United States Coast Guard will conduct necessary surveillance activities and cite violators. Violations of the sanctuary will be treated as required by Section 303 of the Act.

6. It was questioned whether the proposed regulations applied only to the water column. Such regulations will apply only to the vertical portion of the water column extending from the surface to the seabed.

7. It was questioned whether or not a permit is needed for all research, or only for research that affects the MONITOR. A permit will be required for research on the vessel, or for research which may impact on the structural integrity of the vessel.

8. It was indicated that salvage, diving and other operations may be required in the sanctuary in the event of a ship or aircraft disaster. In this case, the prohibited activities can only be carried out with a permit issued by NOAA. If and when such a disaster does occur — such as
a vessel sinking, an airplane loss -- a permit will be granted by NOAA to authorize the necessary investigatory and recovery operations.

9. It was suggested that the regulations should prohibit drilling and laying cable in the MONITOR Marine Sanctuary. We concur that these activities should be prohibited.

10. A question was raised as to the actions being taken to coordinate and recognize the Historic Sites, Building and Antiquities Act of 1935 and the National Historic Preservation Act of 1966. The MONITOR has been placed on the National Register of Historic Places. Accordingly, the requirements of the National Historic Preservation Act of 1966 apply in considering any proposal to conduct activity in the marine sanctuary.

1.0 Project Description

On August 27, 1973, an interdisciplinary scientific party from the North Carolina Department of Cultural Resources, Duke University, Massachusetts Institute of Technology, and the University of Delaware located the remains of the Civil War ironclad MONITOR. The wreck lies in about 220' of water on a hard sand and shell bottom about 16.10 miles south-southeast of the present Cape Hatteras, North Carolina, lighthouse (FL 7½ sec. 191 ft. 20M-C&GS 1109 2/20/71) on a bearing of 160° true. From the Diamond Shoals Tower (FL 2½ sec. 120 FT. 17M-C&GS 1109 2/20/71) the site lies about 10.50 miles southwest on a bearing 211° true. The geographic coordinates for the location are 35°00'23" North Latitude, 75°24'32" West Longitude.
Analysis of the data and photographs collected during two visits to the site revealed that the vessel rests upside down. Sand accumulations has obscured portions of the starboard side to a height of approximately six feet, however, the port side remains exposed. The displaced turret, partially obscured by the hull, protrudes from the port quarter. In the stern a considerable portion of the starboard quarter has separated from the upper hull and now lies on the bottom directly under its original position. The upper hull remains virtually intact. The turret, because of its heavy construction, exists in a similar good state of preservation. Portions of the exposed lower hull have suffered considerable damage. Forward of the vessel's only substantial athwartship bulkhead, deterioration of the lower hull seems to be quite extensive. With the exception of portions of the starboard side, this portions of the hull disintegrated to the level of the bottom of the armor belt. Such extensive damage may have occurred during World War II as the result of depth charges or other causes. Aft of the bulkhead, damage more closely resembles what could be considered natural deterioration. Here most of the lower hull plating remains intact; and there is little of the heavy structural damage apparent in the forward areas.

Despite the damage, there are excellent possibilities for additional research at the site because the location has, until recently, remained unknown; and the integrity of the site has not been disturbed by relic hunting or salvage operations. Although deteriorated to some
extent, nearly all of the vessel's parts are available at the site and probably in place. This is important to naval architects and historians to ascertain design features that are unknown owing to lost records.

Perhaps best known for its celebrated encounter with the Confederate ironclad VIRGINIA (often referred to as the MERRIMACK) the MONITOR represents one of the revolutionary concepts in 19th century naval technology. Her construction, by Swedish engineer John Ericsson, marked radical departures from established shipbuilding tradition in the history of marine architecture. The MONITOR has been widely accepted as the symbol of the beginning of the end for the wooden, sail-powered ship-of-the-line. Thus the MONITOR represented a major step in the development of the modern capital ship. From a historic and technological standpoint, the wreck represents one of the most valuable mid-nineteenth century marine sites available for scientific investigation. As a significant relic of our national heritage and a valuable and nonrenewable cultural resource, the wreck merits protection from looting and salvage attempts which would surely destroy the technological and cultural values of the site. Because the MONITOR lies outside the territorial waters of the State of North Carolina, adequate legislative protection could not come from the state. Therefore, on May 13, 1974, a meeting was held at the request of NOAA to explore all possible means to protect the MONITOR. Representatives were present from the United States Coast Guard, Department of the Navy, Department of the Interior, Department of State, Duke University,
State of North Carolina Department of Cultural Resources, Nautilus Press and National Oceanic and Atmospheric Administration. Subsequent discussions were held with the General Services Administration and the Department of Justice. The outcome of these deliberations was the identification of two legal means of protection. One means of protection was to nominate the MONITOR to the National Register of Historic Places. The State of North Carolina State Historic Preservation officer initiated this course of action by nominating the vessel site and the MONITOR was formally entered in the National Register of Historic Places on October 11, 1974 by the Secretary of the Interior under authority of the Historic Sites Act of 1935 (16 USC 461).

The second means of protection identified was the authority of the Marine Protection, Research and Sanctuaries Act which specifically authorizes the Secretary of Commerce to designate marine sanctuaries to the outer edge of the Continental Shelf. The State of North Carolina again initiated this course of action by nominating the wreck site to preserve its unique esthetic (historic, cultural and technological) values. Access to the site for research on the vessel, or for activities that could impact on the vessel, will be controlled by a permit issued by NOAA.
The geographical extent of the sanctuary is a circular area of a diameter of one mile, centering on a point located at 35°00'23" North Latitude and 75°24'32" West Longitude. This is to insure that any remains which may have been dispersed by the strong currents in the area are included.

2.0 Proposed Regulations

Section 302(f) of the Act provides for the issuance of necessary and reasonable regulations to control any activities in the water column within a designated marine sanctuary. The following are regulations proposed for the purposes of maintaining the structural integrity of the vessel, and for harmonizing with the policy stated in the Historic Sites, Buildings, Objects and Antiquities Act, as amended.

Prohibited Activities

- Anchorage
- Salvage
- Diving
- Dredging
- Grappling
- Use of explosives
- Drilling
- Laying Cable
- Trawling

Permissible Activities

- Fishing (except trawling)
- Free passage
Research that does not involve the prohibited acts

Disaster avoidance procedures

Permits

Permits will be granted for two purposes: approved research or that will impact on the vessel and the investigation or recovery of materials as the result of a disaster.

The purpose of the sanctuary is to protect the MONITOR and to provide for controlled study. Accordingly, research proposals will be subjected to extensive review. The focus of the review will be to ascertain whether or not damage is likely to be done to the vessel. Study methods and equipment to be employed must be, in the judgment of scientific and governmental reviewers, sufficiently developed and tested to reliably carry out the research program without a high-probability of accidental damage. In other words, novel or untested research techniques designed to advance the "state of the art" is unlikely to be given favorable consideration. Each proposal will be subject to review by a group of technical experts, and governmental and quasi-governmental agencies.

Research proposals should be addressed to the Administrator of NOAA, Attention: Office of Coastal Zone Management, Rockville, Maryland 20852. The Administrator may seek and consider views of any person or entity, within or outside of the Federal government, as he deems appropriate. A decision to issue a permit will be subject to review and concurrence by the Advisory Council for Historic Preservation according to provisions of Section 106
of the National Historic Preservation Act of 1966.

During the period of more than a century since the MONITOR sank, the chemical, biological, and mechanical agents contributing to its deterioration have reached a state of comparative stability which, in effect, reduces the rate of further deterioration. Therefore there is little urgency to bring material to the surface. Accordingly, any proposal for research must clearly demonstrate adequate technical capability and resources to insure the preservation of material that may be recovered.

Owing to the many uncertainties associated with research in the environmental conditions that surround the MONITOR, an observer designated by NOAA may be placed aboard any research vessel to observe the research project. Any proposals to raise all or part of the vessel will be processed according to the National Environmental Policy Act and the National Historic Preservation Act.

It is anticipated that, during the study of the vessel, various materials and information will be collected that will enhance the American people's appreciation of its historical and cultural values and will assist in further study of the vessel. One condition attached to any research permit will be that all documentation and materials gathered under the permit must be made public.

After careful analysis of the alternatives, with the assistance of the Smithsonian Institution, it was determined that the program structure under the Department of the Navy is the most suitable mechanism to assure long-term control and availability of the documentation and
artifacts accessioned during study of the MONITOR. The National Oceanic and Atmospheric Administration and the Department of the Navy have concluded an agreement for the curatorship of the marine sanctuary.

The relationship of the proposed action to land use plans, policies and controls for the affected area.

This action conforms to the well-established policy of Congress, "It is declared that it is a national policy to preserve for public use historic sites, buildings, and objects of national significance for the inspiration and benefit of the people of the United States," The Historic Sites Act (16 USC 461). The MONITOR was nominated to the registry of National Historic Places by the State of North Carolina's Historic Preservation, and placed on the National Register of Historic Places by the Secretary of the Interior. The Advisory Council on Historic Preservation will therefore review all proposals for compliance with the provisions of the National Historic Preservation Act.

The probable impact of the proposed action on the environment

There probably will be no impact upon the ocean environment. It is conceivable that, to the extent that Federal regulation of entry into the area would reduce the number of entries which otherwise would be made— as well as the number of purposes for which entries otherwise would be made— there would be a positive effect upon the ocean environment.
A number of research organizations have conducted exploratory fishing research in the general area and have reached the general conclusion that no significant commercial concentration of seafood is present. Previous commercial efforts have also been discontinued. This leads to the conclusion that no present or potential commercial fishing conflict exists. Fishing except by trawling is permitted plus the waters of the area are extremely hostile to diving. Thus the sanctuary will have little if any impact on recreational activities.

Alternatives to the proposed action

Salvage -- This is a conceptual possibility if it were done to raise the vessel intact. However, the view of most knowledgeable people is that this is neither technologically or economically feasible, now or in the foreseeable future. Salvage in any form is strongly opposed by most reviewers.

Other legal means

This option was pursued following the suggestion by the minority counsel of the House Merchant Marine and Fisheries Committee that the marine sanctuary authority be utilized to protect the vessel.

After a multi-state and Federal agency discussion of the legal means available, two options were identified — The National Register of Historic Places and the marine sanctuary authority. The vessel has been placed on the National Register of Historic Places. However, this option does not control private endeavors, therefore the placing
of the site on the National Register does not provide total protection. Consequently this option alone must be rejected, or augmented by a sanctuary designation.

No sanctuary or other means of protection

This would leave the vessel subject to the vagaries and whims of individuals, corporations, etc., that may or may not respect the historic and cultural values of the vessel. Protection was deemed necessary. Therefore, this option was rejected.

Sanctuary with no access

This would assure that man-induced changes would not occur to the vessel. However, public understanding and appreciation of the full historic and cultural values could not be obtained. Therefore 'absolute' protection was not considered a viable alternative.

Probable adverse environmental effects

The proposed regulation will have certain adverse environmental effects. Research projects will be subject to the additional review necessary for a permit. Certain types of research, for example, geophysical, would be restricted to non-explosive techniques. Fisheries activities will be limited to non-trawling types. Salvagers will be precluded from extracting portions of or the entire vessel for profit. Mineral extraction development would be restricted, although rather insignificantly since the designated area is small and there are no known commercially important minerals at the MONITOR site.
We are unaware of any significant economic or recreational use of the area. (An exception is the salvage of the vessel.) Also the hostile nature of the marine environment at the proposed sanctuary site, attested to by the many shipwrecks in the area, severely limits potential economic and recreational uses. Moreover, since there will be no interference whatsoever with the right of free and innocent passage, we expect the magnitude of the adverse impacts to be minimal.

The relationship between local short-term uses of man's environment and the maintenance of long-term productivity.

No irretrievable commitments of resources are involved. This FEIS, in addition to implementing Congressional policy on the value of historic places, leads us to the conclusion that the minimal environmental impacts that occur by establishing a marine sanctuary are more than offset by the public benefits. Therefore the MONITOR site should be designated as a marine sanctuary.