

MARINE MAMMAL COMMISSION
4340 East-West Highway, Room 700
Bethesda, MD 20814-4447

29 February 2008

Ms. Joyce Kleen
Wildlife Biologist
Crystal River National Wildlife Refuge
1502 SE Kings Bay Drive
Crystal River, Florida 34429

Dear Ms. Kleen:

On 2 January 2008 the Fish and Wildlife Service published a *Federal Register* notice announcing its intent to prepare a comprehensive conservation plan and associated environmental assessment for the Crystal River National Wildlife Refuge. The notice requested comments to help with the plan development process. In response, the Marine Mammal Commission, in consultation with its Committee of Scientific Advisors on Marine Mammals, offers the following recommendations and comments.

RECOMMENDATIONS

The Marine Mammal Commission recommends that, as part of the proposed comprehensive conservation plan for the Crystal River National Wildlife Refuge, the Fish and Wildlife Service include provisions for—

- establishing a core management objective that calls for enhancing and implementing measures to protect and conserve manatees in Kings Bay and adjacent waterways;
- development and implementation of regulations that prohibit swimmers and divers from approaching manatees closer than a specified distance (e.g., 10 feet) or touching manatees;
- evaluating and, if warranted, implementing a permit system for divers and dive tour operators intent on viewing manatees in Kings Bay to assure an equitable way of limiting and distributing the number of boats and people allowed at any one time in popular dive locations during peak viewing periods;
- an ongoing monitoring program that includes underwater videotaping to document interactions between swimmers and divers and manatees and assess the extent to which people comply with regulations and guidance when they are in the water with manatees;
- assistance with and additional support of research to assess the quality of habitat vital to the survival of manatees and to monitor the abundance, distribution, and habitat-use patterns of manatees in Kings Bay and surrounding areas; and
- evaluating and, as possible, purchasing land areas that could be added to the refuge to improve the protection and conservation of manatees in Kings Bay.

RATIONALE

The Crystal River National Wildlife Refuge, established in 1983, includes most of the islands in Kings Bay at the head of the Crystal River in Citrus County, Florida. The islands were purchased by the Nature Conservancy and transferred to the Fish and Wildlife Service to protect the manatees

that return every winter to the warm-water springs that discharge into the bay and its adjoining canals. Kings Bay is the principal warm-water refuge for the growing subpopulation of manatees that disperses throughout northwestern Florida in non-winter months. These manatees face a high risk of being struck by boats because they are confined to a limited area surrounded by residential development and marinas. In addition, they are subjected to harassment by swimmers and divers attracted to the bay by its warm, clear water and the chance to see wild manatees.

The refuge encompasses only about 80 acres of dry and submerged lands in and around Kings Bay. However, refuge officers and staff, in cooperation with other federal, state, and local authorities, are responsible for carrying out various manatee-related research and management activities throughout the Kings Bay area. With tens of thousands of divers visiting the bay each winter, efforts by the refuge staff to manage interactions between swimmers and manatees have been well placed and are a valuable part of the overall Florida manatee recovery program. To ensure that those efforts are continued, the Marine Mammal Commission recommends that the comprehensive conservation plan for the Crystal River National Wildlife Refuge include a core management objective that calls for enhancing and implementing measures to protect and conserve manatees in Kings Bay and adjacent waterways.

Manatee Harassment

Harassment of manatees by swimmers and divers has been a chronic problem in Kings Bay. The Fish and Wildlife Service has taken many constructive steps to reduce its occurrence, most notably by designating manatee sanctuary areas where human access is prohibited, developing and distributing public outreach materials on proper conduct when swimming with manatees, and providing a much-needed enforcement presence. However, blatant instances of harassment continue to occur. As noted in our previous letters to the Service addressing this issue (see attached copies of letters dated 1 December 2000, 14 March 2007, and 9 October 2007), the Commission believes that this continuing problem stems, at least in part, from the expectations of swimmers and divers who, based on current regulations and educational materials, believe it is acceptable to approach manatees as close as they can and even to touch them.

These expectations are understandable because existing education materials provided by the Service present conflicting messages, and current enforcement practices suggest approaching manatees closely and touching them is acceptable behavior. For example, the current educational video explaining the proper conduct for swimming and diving with manatees urges passive interactions with animals, yet it shows divers touching manatees or photographing an animal within inches of its face, and advises people to “let manatees come to you” rather than approaching them. In our view, educational materials that illustrate such interactions and lax enforcement policies will inevitably encourage some people to pursue animals so that they can experience such encounters, whether or not the manatees are receptive. Moreover, this policy reinforces a behavior in which manatees seek out human interactions that, in other times and places, could be hazardous to the animals.

As we have pointed out in the past, such advice also creates inconsistencies with guidance and regulations of the National Marine Fisheries Service to manage interactions between swimmers and marine mammals. The more tolerant approach for manatees serves to undermine messages developed for other marine mammals, and we believe that greater consistency and coordination between the two Services is needed. To reduce manatee harassment and to narrow differences in guidance on swimming with other marine mammals, the Commission believes that the Service should develop new manatee harassment standards, enforcement policies, and educational materials to keep people at a respectful distance that will not disrupt normal manatee activities. For example, the Commission has recommended that the Service develop and implement regulations that prohibit swimmers and divers from approaching a manatee closer than 10 feet or touching a manatee and requiring that divers back away from animals that approach them. Such standards would establish clear guidance on acceptable diver conduct, be far easier to enforce, eliminate expectations among swimmers and divers that it is permissible to approach animals close enough to pet them, and minimize the development of manatee behaviors that could lead to their harm.

In its 18 April 2007 reply to the Commission's 14 March 2007 letter, the Service advised that further steps to resolve manatee harassment problems at Kings Bay would be addressed in the comprehensive conservation planning process for the Crystal River National Wildlife Refuge. We appreciate the Service's continuing attention to this problem and, consistent with our previous letters, the Marine Mammal Commission recommends that the comprehensive conservation plan for the Crystal River National Wildlife Refuge include provisions for development and implementation of regulations that prohibit swimmers and divers from approaching manatees closer than a specified distance (e.g., 10 feet) or touching manatees. The regulations should further require that, if a manatee approaches a swimmer or diver closer than the prescribed distance, that person should slowly back away and refrain from intentionally touching the animal. Such a regulation would be more consistent with regulatory provisions and viewing standards established for other wildlife and would not preclude people from being in the water with manatees and photographing them. Educational materials and enforcement policies should be modified to reflect this new standard.

The Commission also is concerned that, on at least some days in some areas of Kings Bay, the number of swimmers and divers exceeds levels that are safe for manatees or allows them full access to and use of available habitat. Large crowds of divers and boats converging on manatee habitat may increase the risk of stress for resting or thermoregulating animals and likely detracts from a quality viewing experience for divers. To both protect manatees and heighten visitor experience, measures may be prudent to disperse divers and control the number of boats and people at popular dive locations in Kings Bay. Managers at some parks or refuges have established visitor permit systems to limit the number of people allowed in given areas at one time. We believe such an approach should be considered for Kings Bay. Therefore, the Marine Mammal Commission recommends that the comprehensive conservation plan for the Crystal River National Wildlife Refuge include provisions for evaluating and, if warranted, implementing a permit system for divers and dive tour operators to equitably limit and distribute the number of boats and people allowed at any one time in popular dive locations.

Research and Monitoring

To evaluate the effectiveness of harassment prevention policies, the Service's comprehensive conservation plan should include provisions for monitoring interactions of manatees with swimmers and divers and assessing compliance with established regulations and guidance. The underwater video of manatee harassment in Kings Bay referenced in our letter of 14 March 2007 indicates that a program to videotape a representative sample of interactions between divers and manatees would be useful for evaluating the nature and frequency of harassment incidents. Such a program could help identify geographic areas where harassment occurs most frequently, the types of activities people are most likely to engage in that could cause harassment, potential effects on the manatees, and other factors that would help refine educational materials and enforcement. Therefore, the Marine Mammal Commission recommends that the comprehensive conservation plan for the Crystal River National Wildlife Refuge include provisions for an ongoing monitoring program that includes underwater videotaping to document interactions of swimmers and divers with manatees and the extent to which people comply with related regulations and other guidance on proper conduct when in the water near manatees.

Although the manatee population is recovering, successful protection and management is likely to be reflected by increases in the number of manatees using natural springs and other warm-water habitats in Florida. To assess such trends, the Fish and Wildlife Service, the Florida Fish and Wildlife Conservation Commission, and others are conducting a range of assessment activities, such as annual synoptic surveys of manatee numbers at warm-water refuges throughout the state, and maintaining a manatee photo-identification catalogue. The staff of the Crystal River National Wildlife Refuge routinely provides valuable assistance with such efforts. To ensure that those efforts are recognized and continued, the Marine Mammal Commission recommends that the comprehensive conservation plan for the Crystal River National Wildlife Refuge include provisions for assistance with and additional support for research to assess the quality of habitat vital to the survival of manatees (e.g., the composition and distribution of sea grasses and the quality and volumes of spring discharges) and to monitor the abundance, distribution, and habitat-use patterns of manatees in Kings Bay and surrounding areas.

Land Acquisition

As we understand it, the Service currently is evaluating options for acquiring land bordering Three Sisters Spring, which discharges into a canal entering Kings Bay. This is an important warm-water spring for manatees and a popular site for dive tour operators offering clients a chance to swim with manatees. The purchase of this site for inclusion in the refuge would prevent its development and allow measures to enhance manatee access to the spring, which is now impeded by large boulders near its mouth. It would contribute to the recovery and long-term survival of Florida manatees and also provide an opportunity to construct a platform or walkway for viewing manatees from land. With regard to the potential acquisition of property at Three Sisters Springs, the Marine Mammal Commission recommends that the comprehensive conservation plan for the refuge include

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provisions for evaluating and, as possible, purchasing land areas that could be added to the refuge to improve the protection and conservation of manatees in Kings Bay.

I hope these comments and recommendations are helpful. If you have any questions, please do not hesitate to call.

Sincerely,



Timothy J. Ragen, Ph.D.
Executive Director

Enclosures