U.S. Navy Fact Sheet

Navy's Need for Sonar and Marine Mammal Protection Efforts

Navy and Environmental Compliance

Navy's policy is to operate in full compliance with environmental laws. To this end, they analyze the potential effects of training on the environment and cooperate with environmental regulatory agencies, as appropriate, based on those effects.

The Navy's Marine Mammal Research

The U.S. Navy is a world leader in marine mammal research, and has funded over $100 million in marine mammal research over the past five years. Research focus areas include the following:

- Determine the distribution and abundance of protected marine species and their habitats.
- Improve understanding of effects of sound on marine mammals.
- Establish criteria and thresholds to measure potential effects of Navy training operations on marine mammals.
- Develop improved marine mammal protection measures to lessen such effects.
- Improve passive acoustic monitoring techniques to detect and localize marine species, particularly on Navy undersea ranges.

The Need for Active Sonar Training

The U.S. Navy is a responsible environmental steward, and recognizes the need to protect marine life. At the same time, the growing number of modern, quiet submarines in recent years has increased the Navy's need to use active sonar to protect against serious threats to national security, the safety of our armed forces, and our nation's economic vitality.

More than 300 extremely quiet diesel electric submarines are operated by over 40 countries worldwide. These submarines are cheap, mass produced, and readily available to any country that wants to pursue the technology.

Active sonar is the only effective means available today to detect, track, and target modern subs under all ocean conditions.

Understanding Sonar in Context

Approximately 15,000 large ships make use of the world's oceans daily. In contrast, only about 140 U.S. Navy ships are presently underway, *which is less than 1 percent of ships at sea*. The number of submarines underway is even less, about 35.

About 60 percent of U.S. Navy ships and all subs are equipped with active sonar, which is used sparingly because it reveals the sending ship's position. Navy vessels prefer to use passive sonar the majority of the time.

The U.S Navy recognizes that active sonar may affect marine mammals under certain conditions, which is why the Navy actively works to minimize its impact on the marine environment. As a result, sonar-related strandings – while unfortunate - occur very rarely. Worldwide naval use of active sonar for all countries has been correlated with the stranding deaths of approximately 40 whales during the 10-year period from 1996-2006. To help put this number in perspective, this equates to less than 1/4 of one percent of the 3,500+ strandings that occur each year on U.S. shores.

Other overlooked causes of strandings include:

- Pollution
- Disease
- Parasite
- Ship Strikes
- Trauma
- Starvation

Strandings may also occur after unusual weather or oceanographic events.

Navy Marine Mammal Protection Efforts

The U.S. Navy exercises caution when operating in areas likely to contain marine mammals. Efforts to minimize potential effects on mammals include the following:

- Using software tools to help operators determine if an operating area has any aspects that could lead to harming marine mammals. This allows ships and aircraft to analyze the training area where a specific exercise will take place and then use protective measures as appropriate.
- Scanning for animals with passive sonar, trained shipboard lookouts and available airborne assets prior to commencing an exercise. Navy lookouts are skilled in spotting small objects at sea under all conditions.
- Reducing sonar levels or ceasing use of sonar altogether if whales or dolphins are detected within certain distances of the vessel's sonar dome.

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