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**New York Whale and Dolphin Action League**

PO Box 273, Tuckahoe, NY 10707  
www.ny4whales.org  
A Project of Cetacean Society International

914-793-9186 / 914-395-0017 fax  
407-404-2046 cell

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Naval Facilities Engineering Command, Atlantic Division  
Attn: Code EV22 (AFAST Project Manager)  
6506 Hampton Blvd.  
Norfolk, VA 23508-1278  
Fax: (888) 875-6781

Re: Draft Atlantic Fleet Active Sonar Training Environmental Impact Statement / Overseas Environmental Impact Statement

Dear Naval Command:

The New York Whale and Dolphin Action League, a project of Cetacean Society International, remains deeply concerned with the U.S. Navy's Atlantic Fleet Active Sonar Training (AFAST) proposal as outlined in its DEIS. [It is our belief that damage to the vast range of coastal environment and its marine wildlife as well as marine resources that will result from the testing and use of the powerful acoustic systems will be substantial and tragic. ]

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As noted by those at hearings and by press reports over the past several months there has been an overwhelming negative response from the public at the required AFAST hearings on the use of this controversial sonar use. [It is well known that the devices in question are precursors for mass strandings and deaths of whales around the world, and that correlation is proven and growing over time. ]

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We are well aware of the critical nature that sound plays in the marine environment. In fact, most marine organisms have adapted from an evolutionary standpoint to maximize their sound producing or receiving abilities in order to feed, detect predators or danger, mate, communicate, and to simply survive. [It is widely accepted in the scientific community that powerful anthropogenic sound, whether from sonar, geologic exploration or vessel traffic can and do interfere with the survival rates of many species of aquatic organisms. ]

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At issue is the use of active sonar activities involving active sonar and the explosive source sonobuoy in vast biologically significant regions of the western Atlantic Ocean along the east coast of the US and the Gulf of Mexico.

[ We do not believe that DEIS/OEIS adequately satisfies the requirements of NEPA, the CZMA, MBTA, or the ESA for a relevant accounting of likely impact and destruction during the use of sonar. ] To make the blanket statements that the training exercises will have little or no impact on either the marine environment or its inhabitants is to deny responsibility and evade accountability for its action.

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[ We do not agree with the Chief of Naval Operations that it is necessary to use this sonar to meet the responsibilities of military readiness. In fact, we do not believe that active sonar should be a

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component of our Navy's readiness training regime, nor should it be included as a technical device for undersea warfare. ]

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Mid and high-frequency active sonar systems continue to be linked to mass strandings and deaths of marine mammals, both resident and migratory, within and around existing training/operation areas. Damage to cetaceans includes air-space implosions as high intensity acoustic waves pass through the body of these large "biological receptors". The panic state that ensues forces deep-diving cetaceans to the surface too rapidly, resulting in the decompression sickness known as the "bends", i.e., nitrogen bubble-formation in vital organs. The condition can be as fatal to whales as to divers who surface too quickly from depths, regardless of the cause.

One of the incidents in particular occurred in waters included in the AFAST training area in January, 2005, which involved a mass stranding/death of 34 cetaceans of 3 species. NMFS released a report in April of 2005 stating that several of the whales had what appeared to be damage related to loud blasts of sound from a source of active sonar. The report also noted air bubbles consistent with decompression sickness that is characteristic of flight response and rapid ascent seen in other cetacean victims of well-documented sonar-coincident strandings (in the Bahamas and Canary Islands). Following the initial report, NMFS refused to release any documents regarding the stranding, despite FOIA requests from citizens and environmental groups, including the NRDC. After the NRDC sued NMFS, the agency was ordered to release the requested documents. However, prior to this court order NMFS/NOAA released a second report that omitted all references to sonar, but without any scientific explanation.

The pattern of evasive tactics that the NMFS and US Navy have employed concerning accuracy relative to marine mammal mortality events is disconcerting to those concerned with the welfare and preservation of marine species. This cat-and-mouse information game again confirms NMFS' role as a government tool for the Navy, and that both have been for a long time well-aware of the consequences on marine resources, whales, dolphins and the coastal environment concurrent with the testing and deployment of these very powerful active sonar systems.

In that mass stranding event in the Bahamas, in March, 2000, NOAA/NMFS acknowledged that the cetacean victims (17 whales of 4 different species were found and 6 were examined) had evidence of acoustic trauma *in vivo*, and that the only source of such high-intensity sound was the sonar emitted by the ten vessels that passed through the specific channel. NOAA could make this statement because they have acoustic monitoring devices in the area. They concluded that no earthquakes, volcanic eruptions or explosions occurred which might have caused these acoustic-related deaths.

[ The official response to the findings of the Bahamas incident was a diligent effort to redefine the standards by which marine mammals could be judged "harmed." The result was the alteration of rules governing Level A and B Harassment under the Marine Mammal Protection Act (MMPA). ]

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[ Over the past five years the Navy has compelled NMFS/NOAA, the agency directly charged with enforcement of the MMPA, to raise Level B Physiological Harassment from 120 dB, a level accepted for several decades prior to the emergence of high intensity active sonar. In 2004, MMPA Level B Harassment levels rose to 185 dB, an increase of 65 dB on the logarithmic scale. NMFS and the Navy also sought to set a precedent during the North Carolina training range activities for an increase of MMPA Level B Harassment levels to 195 dB. ]

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The AFAST documents, as with earlier documents and studies that were denounced by the scientific community, the Navy's assertion remains that the onset of Temporary Threshold Shift (TTS) or the place where non-permanent damage would occur, is the same for all cetaceans. Any

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credible biologist will agree that smaller cetaceans will be affected differently (and predictably more dramatically) than larger cetaceans by specific received levels of acoustic energy. This serious flaw underscores the need to bring accuracy and credibility to any process in which the Navy must present a case to justify its questionable activities. By continuing with the trend to set a biologically skewed precedent NMFS is continuing to pervert its role as enforcer of the MMPA by changing the rules at the request of the offending entity, the US Navy.

Within this DEIS/OIS, incredibly, the Navy generally asserts there would be "no significant impact" and "no significant harm" to marine mammals, sea turtles, to fish, to essential fish habitat, to seabirds (from explosive source sonobuoys or entanglement from expended materials), to marine resources, recreational boating, recreational and commercial fishing, even on scuba diving despite its potential for direct impact on humans. The Navy continues by finding zero mortality for 27 species of cetaceans, including critically endangered North Atlantic right whales, humpback whales, sei whales, fin whales, sperm whales, 2 species of pinnipeds, and every species of sea turtle that inhabit these waters, all of which are endangered. [The risk of exposing the US coastline from Maine to Florida to this powerful acoustic weaponry is unrealistically minimized, which bodes poorly for the future of marine life in these areas.]

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Firstly [how can any serious marine biologist claim that the TTS is the same for all 85 cetacean species?] The International Whaling Commission's Scientific Committee stated in their Annex K: Standing Working Group on Environmental Concerns of July, 2004:

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It must be remembered that received levels that induce hearing loss, at any one frequency, are highly species dependent and are a complex interaction of exposure time, signal onset and spectral characteristics, as well as received vs. threshold intensity for that species at that frequency.

Secondly [how can such a serious matter as the level at which whales and dolphins will internally "explode" from acoustic trauma be so easily modified to allow an offender what appears to be license to deploy this device at the expense of marine life and resources?]

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Thirdly, how can NMFS be entrusted with the enforcement of the MMPA when it has failed to provide adequate protection for cetaceans? NMFS has not to exacted any real "science" from the offender, the US Navy, that supports its claims that cetaceans will not be torn apart internally, suffer decompression sickness or be driven to the beaches 50 miles away once their active sonar is turned on.

Fourthly [how can the US Navy be believed as "good stewards" of the ocean when they have been the vessel through which the higher levels of Level A and B harassment under the MMPA were achieved?] This change dramatically decreased protection to cetaceans but affords the Navy a broader range of oceanic ensonification with impunity. There was little science from the Navy behind the proposal to lower protection and raise the harassment levels [There were only dubious and discredited studies that examined less than 5 species at low acoustic levels and concluded that no harm would be done to all 85 species at levels using over 1000 times more energy.] Raising the standard for accepted values of threshold shift, both permanent and temporary, was ignoring science and the offenders are both the US Navy and MNFS.

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Furthermore, the reasoning behind the Navy's version of an affected area has no basis in science. [The DEIS/OEIS fails to acknowledge harm to cetaceans beyond 1 k from the source, a ridiculously small area considering that the Navy's own documents, based on computer modeling, show that 300 miles from the source, given the right conditions, LFA Sonar (100-500 Hz) will have attenuated to only 140 dB.] A distance of 300 miles from the source in any direction will cover over 374,000 square miles of ocean within which sound levels received would range anywhere from 140 to 240

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dB (Reynolds, 2001). The Navy also brazenly applies its own air to water conversion standard at 62 dB; the rest of the scientific community uses only 26 dB. One remembers that the Navy's petition to NMFS raised the MMPA's Level B Harassment to 180 dB and since the Navy applies its convenient conversion standard and ignores any impacts beyond 1 km, the issue does not need to be addressed in any environmental impact statement. This is the reasoning that we are expected to accept as the Navy explains how throughout AFAST's vast testing range through the western Atlantic and Gulf of Mexico there will be no harm to marine life.

As in earlier cases, the Navy uses this rationale to exclude from the DEIS analysis of its acoustic systems that falls below 205 dB, claiming the distance of sound at question would be negligible. Thus the entire training range's use of several mid-frequency sonar systems could be omitted from the DEIS/OEIS despite the likelihood of severe impact at these bone-splitting acoustic levels. (Let's not forget that exposure to 140 dB of acoustic energy will cause permanent deafness and then kill human in less than one minute.) The Navy has omitted scientific findings on the impacts of acoustic sources from commercial shipping (at 190 dB) and acoustic harassment devices (185-195 dB) which testify to the Navy's deviation from accepted science.

Following earlier patterns [the Navy's DEIS ignores potential destruction of fisheries claiming the training range would impact neither fish nor their habitat. However, the North Carolina Department of Marine Fisheries takes the position that use of high intensity acoustic devices will severely impact commercial fisheries.] Lower success in spawning, decreased reproduction rates, and fear-induced behavior that prevents normal mating and feeding during acoustic trauma or sonar exposure have been shown in an increasing number of studies of fish. [Although the AFAST training area is along the major cetacean migration route for many species, including the rare North Atlantic right whale, and areas where resident whales are found, the Navy also concludes that there will be little, if any, impact.] The DEIS also concludes there will be no impact on coral reefs, bottom habitats and invertebrates.

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Yet the fact that damage and even mortality of whales can be substantial during active sonar use is truly realized by the parties. The Navy has respectfully requested the Letter of Authorization (LOA) repeatedly to "take" (injure or kill) "small" numbers of cetaceans during its testing of SURTASS LFA. The term "small" is not generally defined beyond a take of 5-10% of any species, which many prove fatal to many populations, especially of endangered species. The compliance with the law is an admission of liability.

The central question seems to be not whether this document is unacceptable as wholly deficient, which it is, but rather, who and what can stop the Navy from implementing their reckless far-reaching plans? [Comments are written as a matter of fulfilling the NEPA process but who will assure the commentators that these will be read and responsibly acted upon by NMFS/NOAA and the Navy?] It seems the Navy already knows the damage that will be done, and chooses to accept the underwater marine life "killing fields" as plainly and simply, collateral damage. Perhaps the Navy will decide on the time to raise the acceptable levels of harassment; again based on inadequate science, when faced with public condemnation.

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The inevitable destruction of countless numbers of migrating and resident whales, the impact on fisheries and on the marine environment itself will expose the tragic consequences and realization that we could and should have stopped this catastrophic display of technical bravado. By then it may be too late.

Simply because we have the power to achieve a technical feat does not justify its implementation. We learned the moral issues in this approach to warfare when two atomic bombs were dropped in Japan at the end of World War II. The use of this extended region as a sonar-testing center will be

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comparable to that devastating event, only it will be ongoing devastation year after year, and the vast numbers of non-human dead will be hidden below the surface, out of sight, out of mind.

One recalls the lone whale that traveled up the Thames River in London two years ago. As the whale's condition deteriorated, tens of thousands of people watched at the river's edge, sparked by some innate compassion for these "mammal-kin" of the sea. It's been said that the tragic death brought to prominence the plight of today's whales coping with the increasing anthropogenic alteration of all the world's environments. This is only one example of the outpouring of concern, compassion and good will toward marine life, and whales in particular, in our society.

Sincerely,



Taffy Lee Williams/Director

cc: Senator Hillary Rodham Clinton  
Senator Charles Schumer  
Representative Nita Lowey

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