Finding of No Significant Impact (FONSI) for the Environmental Assessment of the Issuance of Small Take Regulations and Letters of Authorization and the Issuance of National Marine Sanctuary Authorizations for Coastal Commercial Fireworks Displays within the Monterey Bay National Marine Sanctuary, California

National Oceanic and Atmospheric Administration National Marine Fisheries Service & National Marine Sanctuary Program

The National Oceanic and Atmospheric Administration's (NOAA) National Marine Fisheries Service (NMFS) received an application from NOAA's National Marine Sanctuary Program (NMSP) for the promulgation of 5-year regulations and subsequent issuance of letters of authorization (LOAs) pursuant to its responsibility under the Marine Mammal Protection Act (MMPA) to authorize the taking of small numbers of marine mammals incidental to an otherwise lawful activity other than commercial fishing, provided that NMFS determines that the action will have no more than a negligible impact on the affected species or stocks of marine mammals. NMFS has made such a determination for this authorization for the take of California sea lions and Pacific harbor seals incidental to the authorization of fireworks displays within the Monterey Bay National Marine Sanctuary (MBNMS). NMFS and the NMSP have jointly prepared an Environmental Assessment (EA) specifically addressing environmental impacts resulting from both the promulgation of a 5-year Rule and issuance of LOAs for this activity and the subsequent issuance of National Marine Sanctuary authorizations for fireworks displays in the MBNMS (under the National Marine Sanctuaries Act (NMSA)). The EA contains a description of the proposed action and reasonable alternatives, the affected environment, the potential impacts to marine mammals, and appropriate mitigation measures.

National Oceanic and Atmospheric Administration (NOAA) Administrative Order (NAO) 216-6 (May 20, 1999) contains criteria for determining the significance of the impacts of a proposed action. In addition, the Council on Environmental Quality (CEQ) regulations at 40 CFR 1508.27 state that the significance of an action should be analyzed both in terms of "context" and "intensity." Each criterion listed below is relevant to making a finding of no significant impact and has been considered individually, as well as in combination with the others. The significance of this action is analyzed based on the NAO 216-6 criteria and CEQ's context and intensity criteria. These include:

1) Can the proposed action reasonably be expected to cause substantial damage to the ocean and coastal habitats and/or essential fish habitat as defined under the Magnuson-Stevens Act and identified in FMPs?

Response: Detonated fireworks produce chemical residue in the form of smoke, airborne particulates, fine solids, and slag (spent chemical waste material that drips from the launcher and cools to a solid form), some of which can end up in waters of the MBNMS as it falls out. A 1992 study measured chemical levels in a small lake environment where 2000 fireworks displays were conducted over a ten-year period. The report concluded that detectable amounts of barium, strontium, and antimony had increased in the lake but not to levels considered harmful to aquatic biota. Based on the frequency and duration of the displays at MBNMS and the fact that the small amounts of chemicals are falling into the open ocean, where they will be washed away

from shore, NOAA¹ does not anticipate any toxic levels of chemicals to accumulate in the coastal area or elsewhere in the ocean.

During fireworks displays, debris (in the form of cardboard cylinders, disks, and shell case fragments; paper strips and wading;, plastic wading, disks, and tubes; aluminum foil; cotton string; and, occasionally, whole unexploded shells) may be scattered as far as a half-mile from the launcher. The Sanctuary authorizations require that the debris be cleaned up the following morning (volume varies) and that cleanup personnel look out for injured or dead wildlife. Based on the frequency and duration of the displays, the required cleanup the following day, and the fact that Sanctuary staff and people cleaning up the beach and looking for injured animals after fireworks displays have seen no evidence of any animals injured by interaction with the debris, NOAA does not anticipate any damage to ocean or coastal habitats or oceans to result from the fallout of debris.

NOAA does not expect the authorized fireworks displays to cause substantial damage to the ocean and coastal habitats and/or essential fish habitat as defined under the Magnuson-Stevens Act and identified in FMPs.

2) Can the proposed action be expected to have a substantial impact on biodiversity and/or ecosystem function within the affected area (e.g., benthic productivity, predator-prey relationships, etc.)?

Response: NOAA does not expect the proposed action to have a substantial impact on biodiversity or ecosystem function within the affected area. The effects of this action are primarily acoustic in nature, and though they may cause temporary behavioral modifications in some vertebrates, they are not expected to affect biodiversity or ecosystem function. Similarly, any small amounts of chemicals or debris released into the ocean as a result of these activities are expected to quickly disperse and not affect biodiversity or ecosystem function.

3) Can the proposed action reasonably be expected to have a substantial adverse impact on public health or safety?

Response: All rocket launches involve some degree of risk to public safety in the way of fire or debris fallout. All coastal fireworks displays within the MBNMS must be authorized by a fire marshal permit in accordance with California state law and local ordinances. In issuing such permits, a local or state fire marshal establishes terms and conditions to protect spectators and property from potential fire hazards associated with fireworks displays. The terms and conditions govern the siting of the launch site away from flammable materials and environments and establish viewing areas a prescribed safe distance from the launch site in the event of misfires or premature detonations. These permits typically require that fire fighting equipment (e.g., fire engines and trucks) be on-scene during the display to respond to any fire emergency. The permits also govern the unloading, handling, and preparation of pyrotechnics for the display. There is always a chance that a piece of debris could fall on and potentially injure a spectator; however, this does not happen often. NOAA does not believe that this activity will have a substantial adverse impact on public health or safety.

¹ As used in this document, "NOAA" refers collectively to the NMFS and NMSP unless otherwise noted.

4) Can the proposed action reasonably be expected to adversely affect endangered or threatened species, their critical habitat, marine mammals, or other non-target species?

Response: NMFS has determined that the fireworks displays will result in no more than Level B harassment of small numbers of California sea lions and harbor seals. The effects of the fireworks displays will be limited to short term and localized changes in behavior, including temporarily vacating haulouts to avoid the sight and sound of commercial fireworks. NMFS has also determined that any takes will have a negligible impact on the affected species and stocks. No take by injury and/or death is anticipated, and harassment takes will be at the lowest level practicable due to incorporation of the mitigation measures mentioned previously in this document.

In a 2001 consultation with the NMSP, NMFS, the Southwest Region, concluded that this action is not likely to adversely affect federally listed species under NMFS' jurisdiction. There is no designated critical habitat in the area.

The NMSP consulted with the United States Fish and Wildlife Service (USFWS) pursuant to section 7 of the Endangered Species Act (ESA) regarding impacts to the snowy plover, the brown pelican, and the southern sea otter. The USFWS issued a biological opinion that concluded that the authorization of fireworks displays is not likely to jeopardize the continued existence of endangered and threatened species within the Sanctuary or to destroy or adversely modify any listed critical habitat. The USFWS further found that the displays would be unlikely to take any southern sea otters, and therefore issued neither an incidental take statement under the ESA nor an Incidental Harassment Authorization (IHA). The USFWS found that an incidental take of brown pelicans was possible and issued an incidental take statement containing terms and conditions to protect the species. The USFWS concluded that the authorization of fireworks events, as proposed, is not likely to jeopardize the continued existence of the western snowy plover or destroy or adversely modify critical habitat of the species

5) Are significant social or economic impacts interrelated with natural or physical environmental effects?

Response: NOAA is aware of none, and has no reason to believe there are any significant social or economic impacts interrelated with the natural or physical environmental effects of this action. Only one comment was received on this action, a general comment of opposition.

6) Are the effects on the quality of the human environment likely to be highly controversial?

Response: The effects of different sounds on the marine environment are not fully known, but there is no dispute about the size, nature, or effect of this particular action, which includes the required mitigation and monitoring. The project application for an incidental take authorization was open to public comment for 30 days and only one general comment of opposition from the public was received. Coastal fireworks displays have been conducted along the central California coast for many years without significant public opposition; therefore,

NOAA believes that the effects on the quality of the human environment are not likely to be highly controversial.

7) Can the proposed action reasonably be expected to result in substantial impacts to unique areas, such as historic or cultural resources, park land, prime farmlands, wetlands, wild and scenic rivers, essential fish habitat, or ecologically critical areas?

Response: The four areas where fireworks may be authorized were chosen based on their proximity to urban centers and pre-existent high human use patterns, seasonal considerations such as the abundance and distribution of marine wildlife, and the acclimation of wildlife to human activities and elevated ambient noise levels in the area. NOAA does not anticipate damage to the surrounding areas, and measures are in place to ensure that fireworks debris is removed from each area following a local display.

8) Are the effects on the human environment likely to be highly uncertain or involve unique or unknown risks?

Response: As indicated in the preceding factor, the effects of sound on the marine environment are not fully known, yet enough is known for NOAA to develop precautionary measures to minimize the potential for significant impacts on biological resources. The multiple mitigation and monitoring requirements incorporated into the authorization are designed to ensure the least practicable impact on the affected species or stocks of marine mammals and also to gather additional data to better inform future decisions.

9) Is the proposed action related to other actions with individually insignificant, but cumulatively significant impacts?

Response: NOAA is not aware of any other actions related to the proposed action that have individually insignificant, but cumulatively significant impacts.

10) Is the proposed action likely to adversely affect districts, sites, highways, structures, or objects listed in or eligible for listing in the National Register of Historic Places or may cause loss or destruction of significant scientific, cultural or historical resources?

<u>Response</u>: NOAA is aware of no significant scientific, cultural, or historical sites in the immediate area of the proposed fireworks and, therefore, does not believe that the proposed action is likely to adversely affect any.

11) Can the proposed action reasonably be expected to result in the introduction or spread of a nonindigenous species?

<u>Response</u>: Seeds of non-indigenous plants could be transported to MBNMS in the treads of the vehicles used in the transport and set up of the launchers; however, this same thing can happen with any treaded vehicle during any activity. NOAA is aware of no additional mechanisms within the methods used to launch fireworks that would allow the introduction or

spread of non-indigenous species. NOAA does not expect the proposed action to result in the introduction or spread of a non-indigenous species.

12) Is the proposed action likely to establish a precedent for future actions with significant effects or does it represent a decision in principle about a future consideration?

Response: This action will not set a precedent for future actions with significant effects or represent a decision in principle. NMFS' actions under sections 101(a)(5)(A) and (D) of the MMPA must be based on the best available information, which is continuously evolving. Moreover, each action for which an incidental take authorization is sought must be considered in light of the specific circumstances surrounding the action. Mitigation and monitoring may vary depending on those circumstances. National Marine Sanctuary authority to approve or deny fireworks displays is implemented on a case by case basis, given the unique conditions and regulations applicable to each site. The proposed action will not establish a precedent for future resource management actions by the NMSP.

13) Can the proposed action reasonably be expected to threaten a violation of Federal, State, or local law or requirements imposed for the protection of the environment?

<u>Response</u>: NOAA does not expect this action to violate any Federal, State, or local law, or requirements imposed for the protection of the environment.

14) Can the proposed action reasonably be expected to result in cumulative adverse effects that could have a substantial effect on the target species or non-target species?

<u>Response</u>: The proposed fireworks displays are infrequent (no more than 20 per year, spread out over 4 locations) and short in duration and, therefore, NOAA does not expect them to result in cumulative adverse effects over time that could have a substantial effect on the target or non-target species.

DETERMINATION

In view of the information presented in this document and the analysis contained in the supporting Environmental Assessment on the issuance of small take regulations and LOAs and the issuance of National Marine Sanctuary authorizations for fireworks displays within the Monterey Bay National Marine Sanctuary, California, it is hereby determined that the promulgation of a 5-yr Rule and issuance of LOAs and MBNMS authorizations for fireworks displays will not significantly impact the quality of the human environment as described above and in the Environmental Assessment. In addition, all beneficial and adverse impacts of the proposed action have been addressed to reach the conclusion of no significant impacts. Accordingly, preparation of an Environmental Impact Statement or Supplemental Environmental Impact Statement for this action is not necessary.

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