

DEPARTMENT OF DEFENSE

Department of the Navy

Record of Decision for the Final Environmental Impact Statement/Overseas Environmental Impact Statement for Point Mugu Sea Range

AGENCY: Department of the Navy, Department of Defense.

ACTION: Record of Decision.

SUMMARY: The United States (U.S.) Department of the Navy (Navy), after carefully weighing the strategic, operational, and environmental consequences of the Proposed Action, announces its decision to conduct testing and training (also referred to as military readiness activities) in the manner and at the intensity as described in Alternative 1, the Navy's Preferred Alternative, of the Point Mugu Sea Range (PMSR) Final Environmental Impact Statement/Overseas Environmental Impact Statement (EIS/OEIS). Implementation of this alternative will enable the Navy and other U.S. military services to best meet their respective missions. The Navy's mission, under Title 10 United States Code (U.S.C.) Section 8062, is to maintain, train, and equip combat-ready military forces capable of winning wars, deterring aggression, and maintaining freedom of the seas. The Navy will implement the full suite of mitigation measures detailed in Chapter 5 (Standard Operating Procedures and Mitigation) of the PMSR Final EIS/OEIS to avoid or reduce potential environmental impacts during testing and training activities.

The PMSR Final EIS/OEIS supports the issuance of new authorization of marine mammal incidental take under the Marine Mammal Protection Act (MMPA) and incidental takes of threatened and endangered marine species under the Endangered Species Act (ESA).

The Navy's action proponent for this proposal is the Naval Air Systems Command, Naval Air Warfare Center Weapons Division.

FOR FURTHER INFORMATION CONTACT: Naval Air Warfare Center Weapons Division, Sustainability Office Point Mugu Sea Range, Building 53A, Room 101, Code EB2R00M 575 I Ave., Suite 1 Point Mugu, M/S 0460; CA 93042-5049, Attention: EIS/OEIS Project Manager 805-989-0927, Website: www.pmsr-eis.com.

A. SUPPLEMENTARY INFORMATION: Pursuant to Section 102(2)(C) of the National Environmental Policy Act (NEPA) of 1969, Sections 4321 et seq. of Title 42 U.S.C., Council on Environmental Quality regulations (Parts 1500–1508 of Title 40 Code of Federal Regulations [CFR]), Department of Navy regulations (32 CFR Part 775), and Executive Order 12114, *Environmental Effects Abroad of Major Federal Actions*, the Navy announces its decision to implement the Navy's Preferred Alternative, Alternative 1, including the full range of mitigation measures and standard operating procedures, as described in the PMSR Final EIS/OEIS and this Record of Decision (ROD). This decision will enable the Navy to support and conduct current, emerging, and future testing and training activities in the Study Area, which is made up of the PMSR, including portions of Naval Base Ventura County (NBVC) Point Mugu and San Nicolas Island (SNI). A detailed description of Alternative 1 is provided in Chapter 2 (Description of Proposed Action and Alternatives) of the PMSR Final EIS/OEIS. This decision will enable the Navy to meet changing military requirements to achieve the levels of operational readiness required under Title 10 U.S.C. Section 5062.

B. BACKGROUND AND ISSUES: The Navy has conducted military readiness activities in the Study Area since the PMSR was established in 1946. Over time, the tempo and types of training and testing

activities have fluctuated because of the introduction of new technologies, the evolving nature of international events, advances in warfighting doctrine and procedures, and changes in force structure (e.g., organization of ships, submarines, aircraft, and weapons). Such developments influence the frequency, duration, intensity, and location of required testing and training activities. The PMSR Final EIS/OEIS reflects the most up-to-date compilation of the types and numbers of testing and training activities deemed necessary to meet military readiness requirements into the reasonably foreseeable future.

Purpose and Need

The purpose of the Proposed Action to provide modern instrumented airspace, sea space, testing and training areas and facilities, and range infrastructure to fully support current, emerging, and foreseeable future RDT&E and Fleet testing and training requirements; and to ensure long-term viability of the PMSR while protecting human health and the environment. The need for the Proposed Action is to allow for continued testing and training in support of military readiness and Department of Defense mission requirements as required by Title 10 U.S.C. Section 5062 and to provide combat ready forces.

The National Marine Fisheries Service (NMFS) is a cooperating agency on the EIS/OEIS, and has its own distinct purpose and need, as described fully in the PMSR Final EIS/OEIS. Briefly, NMFS's purpose is to evaluate the Navy's Proposed Action pursuant to their authority under the MMPA, and to determine whether to issue incidental take regulations and a Letter of Authorization (LOA) for the action, including any conditions needed to meet the statutory mandates of the MMPA. The need for NMFS's action is to consider the impacts of the Navy's activities on marine mammals and meet their obligations under the MMPA. NMFS has issued its own ROD documenting its decision of whether to issue authorization for the Navy's Proposed Action.

Public Involvement

The Navy published a Notice of Intent for the preparation of the PMSR EIS/OEIS in the *Federal Register* (FR) (84 FR 18543) on April 27, 2018 initiating a 60-day public scoping comment period through June 26, 2018. The Navy also published notices in six local and regional newspapers (*Los Angeles Times*, *Santa Barbara Independent*, *Santa Barbara News Press*, *San Luis Obispo Tribune*, *Ventura County Star*, *Vida Newspaper*), and distributed a notification letter to 13 tribal chairpersons, founders, presidents, executive directors, and administrators, and to 170 federal, State, and local elected officials and government agencies at the beginning of the scoping period. The Navy mailed postcards to 83 recipients on the project mailing list, including individuals, community groups, nongovernmental organizations, and businesses. The Notice of Intent and public notices provided information about the Proposed Action, public scoping meetings, methods for commenting, and the project website address.

During the development of the PMSR Draft EIS/OEIS, the Navy initiated a mutual exchange of information through early and open communication and provided briefings to interested stakeholders. The Navy established a public involvement website for the project, which provided various project-related informational materials, including fact sheets and videos. Scoping comments could be submitted via the project website or by mail. A total of 12 scoping comments were received, all of which were considered during preparation of the PMSR Draft EIS/OEIS. Scoping comments included requests for additional information, recommendations related to analysis of specific resources, requests for more details related to mitigation and monitoring efforts, and suggestions for expansion of the cumulative impacts analysis.

The Navy published a Notice of Availability of the PMSR Draft EIS/OEIS in the *Federal Register* on April 24, 2021 (85 FR 23011), opening a 45-day public comment period through June 8, 2021. The Navy also

published advertisements in six newspapers (*Los Angeles Times, Santa Barbara Independent, Santa Barbara News Press, San Luis Obispo Tribune, Ventura County Star, Vida Newspaper*) announcing the availability of the Draft EIS/OEIS. Press releases were distributed and notification letters and postcards were mailed to key stakeholders, agencies, and interested parties, including 17 tribal chairpersons, founders, presidents, executive directors, and administrators of federally recognized Tribes and 20 non-federally recognized Tribes and tribal groups who have an interest in the Point Mugu Sea Range Study Area. Chairpersons of federally recognized Tribes invited to participate in government-to-government consultation received a CD-ROM of the Draft EIS/OEIS. Stakeholder letters, along with a fact sheet booklet, were mailed to 194 federal, State, and local government agencies and elected officials. Postcard were mailed to 100 nongovernmental organizations; community and business groups; fishing, aviation, and recreational groups; and researchers and universities. In accordance with federal, State, and local guidance on social distancing to prevent the widespread outbreak of respiratory illness from the novel coronavirus disease (COVID-19), the Navy was unable to hold in-person public meetings on the Draft EIS/OEIS as planned in May 2020. In lieu of public meetings, a dedicated voicemail line and email address was set up to facilitate verbal and written questions from the public. The public was also able to submit comments on the Draft EIS/OEIS through previously established channels (website and mail). In total, the Navy received five comment submissions from a federal agency, a State agency, one federally recognized Tribe, a nongovernmental organization, and an individual. Comments included concerns about potential impacts on marine species, marine habitat, and cultural resources, as well as recommendations to avoid or minimize impacts from proposed activities.

The Navy's responses to public comments on the Draft EIS/OEIS are included in the PMSR Final EIS/OEIS. In response to comments received and consultations with regulatory agencies, the Navy made adjustments to the analysis to add, clarify, or correct information, as well as add new information and scientific literature developed since the Draft EIS/OEIS was published. These changes are reflected in the PMSR Final EIS/OEIS.

The Navy published the Notice of Availability for the Final EIS/OEIS in the *Federal Register* on January 7, 2022 (87 FR 964), and similar notices were published in six newspapers (*Los Angeles Times, Santa Barbara Independent, Santa Barbara News Press, San Luis Obispo Tribune, Ventura County Star, Vida Newspaper*). The Navy sent notification letters to 35 tribal chairpersons, executive directors, and administrators, and 185 notification letters to federal, State, and local elected officials and government agencies. The Navy mailed postcards to 98 recipients on the project mailing list, including individuals, community groups, nongovernmental organizations, and businesses. A news release was disseminated to local and regional media. The Navy sent emails to individuals who subscribed on the project website to receive project announcements. All public notices announced the availability of the Final EIS/OEIS and the 30-day wait period, and provided a description of the Proposed Action, project website address, and other project information. The PMSR Final EIS/OEIS was also made available on the project website and was sent to seven libraries (*Camarillo Public Library, E.P. Foster Library – Ventura, Carpinteria Branch Library, San Luis Obispo Library, Santa Barbara Public Library, Downtown Main Library – Oxnard, and South Oxnard Branch Library*). Comments received during the 30-day wait period and the Navy's responses are provided at the end of this Record of Decision.

Alternatives Considered

The identification, consideration, and analysis of alternatives are critical components of the NEPA process and contribute to the goal of informed decision-making. The Proposed Action is a continuation of the activities addressed in the 2002 PMSR EIS/OEIS; therefore, previous screening criteria described in Section 2.4.1 (Screening Criteria) of the Final EIS/OEIS were used to identify reasonable alternatives. The Navy action alternatives are based on projected operations as identified during interviews with range

test managers, test and scheduled training mission requirements, or existing NEPA documents and the PMSR Test Resource Management System for flight operations, vessel operations, aerial targets, surface targets, and ordnance. The Navy also used data collected from Naval Air Systems Command and Naval Sea Systems Command Program Offices regarding projected and foreseeable future activities.

The range of alternatives includes a No Action Alternative and other reasonable alternatives for achieving the purpose and need. Direct, indirect, cumulative, short-term, long-term, irreversible, and irretrievable impacts were identified.

The Navy analyzed three alternatives in the PMSR Final EIS/OEIS.

- **No Action Alternative.** Under the No Action Alternative, the Navy would not conduct the proposed testing and training activities in the PMSR Study Area. Other military activities not associated with the Proposed Action would continue to occur. For NMFS, denial of an application for an incidental take authorization constitutes the NMFS No Action Alternative, which is consistent with NMFS' statutory obligation under the MMPA to grant or deny requests for take incidental to specified activities. If NMFS were to deny the Navy's application, the Navy would not be authorized to incidentally take marine mammals in the PMSR Study Area and, under the No Action Alternative, the Navy would not conduct the proposed testing and training activities in the PMSR Study Area. The No Action Alternative fails to meet the Navy's purpose and need for the Proposed Action but was carried forward in order to compare the degree of the potential environmental effects of the Proposed Action with the conditions that would occur if the Proposed Action did not occur.
- **Alternative 1: Projected Maximum Activity Levels Plus New Requirements (Preferred Alternative).** Alternative 1 is based on the highest potential annual level of increased tempo for planned operations as identified during interviews with range test managers, historical operational data, test and scheduled training mission requirements, or existing NEPA documents for flight operations, vessel operations, aerial targets, surface targets, and ordnance. The majority of test and scheduled training activities proposed under Alternative 1 are the same as or similar to those conducted currently, but also include emergent mission areas and new technologies, systems, and platforms. This alternative includes activities subject to previous analysis that are currently ongoing, and have historically occurred, on the PMSR.
- **Alternative 2: Historical Peak Activity Levels Plus New Requirements.** Alternative 2 includes all activities under Alternative 1, but with an overall decreased annual tempo from that of Alternative 1. Alternative 2 accommodates variability in tempo in any given year due to emerging technologies that need to be tested. Alternative 2 is based on actual peak (highest levels) operational tempo data between 2011 and 2018 and reflects an overall increase in annual tempo from the current baseline activity. The historical peak operational tempo represents the highest levels required historically and would capture the future needs of the PMSR. The majority of test and training activities that would be conducted under Alternative 2 are the same as or similar to those conducted currently and subject to previous analysis.

The Navy's entire suite of mitigation measures, including procedural mitigation measures and standard operating procedures, are incorporated into both action alternatives.

The Navy thoroughly considered and then eliminated from further consideration several alternatives that did not meet the purpose of and need for the Proposed Action. See Section 2.4.2 of the PMSR Final EIS/OEIS for a description of alternatives considered but not carried forward for detailed analysis.

Environmental Impacts

The following is a summary of the potential environmental impacts on each resource area associated with implementing the preferred alternative, Alternative 1. The impacts of proposed activities are minimized by established standard operating procedures and avoidance and mitigation measures described in the PMSR Final EIS/OEIS for the following resources: air quality, sediments and water quality, marine habitats, marine vegetation, marine invertebrates, marine fishes, marine birds, cultural resources, socioeconomic resources, recreation, sea and air space, and public health and safety. The discussion below summarizes the remaining environmental impacts as a result of implementing Alternative 1. Where appropriate, the Navy consulted with designated resource agencies in accordance with applicable statutes. The results of those consultations are included in the Agency and Tribal Consultation and Coordination subsection of this ROD.

Marine Mammals. The use of explosive munitions resulting in detonations at or near the water's surface presents a risk to marine mammals located near the explosion. Based on the analyses presented, the Navy predicts no non-auditory injuries or mortalities to marine mammals resulting from the Proposed Action. Because most estimated impacts from explosions are behavioral responses or temporary hearing threshold shifts, and because the number of marine mammals potentially impacted by explosives is small compared to each species' respective abundance, long-term consequences for the species or stocks are not expected.

Based on the analyses presented, the Navy does not anticipate impacts to marine mammal populations from energy, physical disturbance and strike associated with the use of vessels or in-water devices (surface targets), or from entanglement and ingestion associated with military expended materials (MEM) during testing and training activities.

The Navy determined that explosives are likely to adversely affect ESA-listed blue whales (*Balaenoptera musculus*), fin whales (*Balaenoptera physalus*), humpback whales (*Megaptera novaeangliae*), sperm whales (*Physeter macrocephalus*), and Guadalupe fur seals (*Arctocephalus townsendi*), but not likely to adversely affect eastern North Pacific right whales (*Eubalaena japonica*), gray whales (*Eschrichtius robustus*), or sei whales (*Balaenoptera borealis*).

The Navy determined, and NMFS concurred, that remaining non-acoustic stressors (an agent, condition, or other stimulus that causes stress to an organism) from energy, physical disturbance and strike, entanglement, ingestion, and indirect effects, such as explosive byproducts, metals, chemicals, will either have no effect or are not likely to adversely affect ESA-listed marine mammals. The Navy does not anticipate impacts on humpback whale critical habitat or humpback whale prey as a result of the proposed testing and training activities within the PMSR Study Area. The Navy's proposed testing and training activities will not destroy or adversely modify humpback whale critical habitat.

Sea Turtles. Exposure(s) to sound-producing activities present risks to sea turtles that could include temporary or permanent hearing threshold shift, auditory masking, physiological stress, or behavioral responses. Acoustic modeling results indicate there will be no temporary or permanent hearing threshold shift for sea turtles, and only a small number of sea turtles may behaviorally respond. No non-auditory injury or mortality were predicted from acoustic modeling. Therefore, Navy activities are unlikely to lead to any long-term consequences for individuals or populations.

The Navy determined that explosives are likely to adversely affect ESA-listed leatherback sea turtles (*Dermochelys coriacea*). However, explosives are not likely to adversely affect ESA-listed loggerhead sea turtles (*Caretta caretta*) or green sea turtles (*Chelonia mydas*).

The Navy determined, and NMFS concurred, that the remaining stressors will either have no effect or are not likely to adversely affect ESA-listed sea turtles. Testing and training in the PMSR will not result in the destruction or adverse modification of leatherback sea turtle critical habitat.

Recent Scientific Information

The scientific community continues to conduct research and generate new data in an effort to expand and improve the understanding of the marine environment. The Navy is a strong advocate for and sponsor of marine research and is vigilant in its review of new information that may inform the analyses or affect the conclusions. The Navy has identified additional references, peer-reviewed journal articles (many of them published within the last year), that are relevant to the analyses in the PMSR Final EIS/OEIS. These articles present the results of ongoing and new research on the topics of general auditory capabilities and the effects of anthropogenic sound on marine resources and were included in the Final EIS/OEIS. Furthermore, the Navy conducted a literature review between the time the Final EIS/OEIS was published in January 2022 and July 2022. Based on the review, these new references do not change the impact analyses or conclusions summarized above. The Navy will continue to monitor and review the results of new research and evaluate how those results apply to the Navy's assessment of marine resources.

Agency and Tribal Consultation and Coordination

NMFS has served as a cooperating agency throughout the EIS/OEIS process pursuant to 40 CFR Section 1501.6 because of its expertise and regulatory authority over certain marine resources. Additionally, NMFS intends to use the EIS/OEIS as its NEPA documentation in support of its rule-making process under the MMPA. The Navy also consulted and coordinated with other federal and local agencies, including California State Historic Preservation Officer (SHPO) and Coastal Zone Management Act (CZMA) administrators within the Study Area, in conjunction with actions addressed in the PMSR EIS/OEIS. A summary of the results from each consultation and coordination process is included below:

MMPA. The Navy submitted an application for incidental take authorizations to NMFS on March 2, 2020, for stressors associated with certain testing and training activities (the use of explosives), as described under the Preferred Alternative (Alternative 1). On August 28, 2020, the Navy submitted a revised request to NMFS which added clarification on procedural mitigations. NMFS published the Proposed Rule on July 16, 2021.

During the 30-day review period for the Proposed Rule, NMFS received comments from the Marine Mammal Commission (MMC). Many of the comments were related to density values used in the acoustic modeling to determine potential effects to marine mammals from the use of surface explosives. The MMC recommended NMFS, at minimum, authorize Level B harassment (behavioral) takes that are at least the mean group size reported in Table 48 of Department of the Navy (2017a) for all species in which model-estimated takes are either less than mean group size (long- and short-beaked common dolphins, offshore bottlenose dolphins, striped dolphins, northern right whale dolphins, Pacific white-sided dolphins, Risso's dolphins, and sperm whales) or zero for those species that routinely occur in the PMSR study area (e.g., Cuvier's beaked whales, Baird's beaked whales, *Kogia* spp., etc.) in the Final Rule. In recent discussion with the Navy, NMFS agreed with MMC's comment to increase the authorized Level B harassment (behavioral) takes for the noted dolphin species. However, NMFS decided not to increase takes based on group size for sperm whales. NMFS also decided not to increase takes for the other recommended species (e.g., Cuvier's beaked whales, Baird's beaked whales, *Kogia* spp.) in the Final Rule. This change increased takes by 227 for a total of 2,293 behavioral takes annually for at-sea activities, which is reflected in the Final Rule and expected in the LOA. There

is no change in the number of behavioral takes requested for pinnipeds resulting from launch events occurring from SNI, where that number remains at 11,520 annually.

NMFS plans to publish the Final Rule in the Federal Register on July 8, 2022. NMFS has indicated their intent is to conclude that the Navy's testing and training activities will have a negligible impact on marine mammal species and stocks present in the PMSR Study Area. With implementation of the mitigation measures described in the PMSR Final EIS/OEIS, the Navy will have the least practicable adverse impact on marine mammal species or stocks and their habitat. Following publication of the Final Rule, NMFS is expected to issue an LOA for Navy testing and training activities. The LOA authorizes the taking of marine mammals incidental to Navy testing and training activities conducted in the PMSR Study Area pursuant to Section 101 (a)(5)(A) of the MMPA. The LOA specifies the type and amount of incidental take that is authorized, by species, as well as the Navy's mitigation, monitoring, and reporting requirements. NMFS intends to coordinate the LOA with the Incidental Take Statement the Navy anticipates to receive for endangered marine mammals pursuant to Section 7 of the ESA, as discussed below.

- **ESA.** The Navy requested initiation of formal consultation with NMFS (Headquarters, Office of Protected Resources) on ESA-listed species with a Biological Assessment (BA) submitted on November 25, 2020. The Navy submitted a revised BA to NMFS on January 7, 2021, that added green sea turtles into the analysis and changed the overall impact determination for loggerhead sea turtles from "likely to adversely affect" to "not likely to adversely affect." The Eastern North Pacific right whale was also added to the BA as an ESA-listed species for consultation. Species addressed in the BA were black abalone (*Haliotis cracherodii*), white abalone (*Haliotis sorenseni*), steelhead (*Oncorhynchus mykiss*), leatherback sea turtle, loggerhead sea turtle, green sea turtle, blue whale, fin whale, humpback whale from the Mexico and Central America Distinct Population Segment (DPS), sei whale, Western North Pacific gray whale, sperm whale, and Guadalupe fur seal. The Navy's BA also included an analysis of the Navy's proposed activities on critical habitat for leatherback sea turtles and Central America and Mexico DPS humpback whales, which was designated on April 21, 2021.

NMFS provided the Navy with a draft Biological Opinion on July 29, 2021, and included giant manta ray (*Mobula birostris*) in the Biological Opinion, but determined that the Navy's proposed activities were "not likely to adversely affect" this species. NMFS also confirmed that explosives activities will not adversely affect loggerhead sea turtles. As an extra protection measure, Navy has agreed to provide notification to Test Managers, Test Conductors and to naval units if oceanographic conditions (sustained increases in sea surface temperature) indicate that loggerhead sea turtles may be present on the PMSR. The Navy will use information from NMFS to monitor oceanographic and environmental conditions (e.g., Temperature Observations To Avoid Loggerhead [TOTAL] tool) to assess the potential for loggerhead sea turtles to be present within the boundaries of the PMSR. When NMFS resources indicate the potential for loggerhead sea turtle presence, such as an "Alert Status" from the TOTAL tool for the given month, the Navy will notify Test Managers, Test Conductors, and naval units to increase the awareness and vigilance of personnel to the potential presence of loggerhead sea turtles. Should loggerhead sea turtles be sighted in pre-event monitoring efforts, mitigation and protective measures identified in the Navy's Protective Measures Assessment Protocol will be implemented to ensure loggerhead sea turtles are not adversely affected.

NMFS concluded that any adverse effects to ESA-listed species, as described above, are not likely to jeopardize the continued existence of threatened or endangered species. Furthermore, NMFS concluded that the Navy's proposed activities will not adversely affect critical habitat for

leatherback sea turtles and Central America and Mexico DPS humpback whales. The Final Biological Opinion was issued January 26, 2022. In addition to the Biological Opinion, NMFS will issue a LOA for the incidental take of marine mammals, pursuant to Section 101(a) (5) of the MMPA, for Navy training and testing activities, as discussed above under “MMPA.” The Biological Opinion’s Incidental Take Statement for marine mammals becomes effective once the MMPA Final Rule is issued.

There are no changes in tempo or locations proposed for land-based activities on NBVC Point Mugu and SNI from previous analyses in the 2002 EIS/OEIS and subsequent environmental assessments; therefore, in consultation with the U.S. Fish and Wildlife Service, it was determined that the existing Biological Opinions for land-based activities are still valid to support the Proposed Action, and no additional analysis was needed. The Navy will continue to implement the protective measures contained within the U.S. Fish and Wildlife Service’s Biological Opinions relative to the Proposed Action of the EIS/OEIS, which are discussed in detail in Chapter 5 (Standard Operating Procedures and Mitigation).

- **Magnuson-Stevens Fishery Conservation and Management Act.** On July 14, 2020, the Navy submitted an Essential Fish Habitat Assessment (EFH) Assessment to NMFS’ Regional Office in Long Beach, California to initiate EFH consultation. The consultation focused on MEM and their potential to adversely affect EFH from Navy testing and training activities. The Navy adopted NMFS’ conservation recommendation to offset adverse effects to EFH from MEM by establishing a Marine Debris Removal Program on SNI. The Marine Debris Removal Program supports annual debris removal from SNI. The SNI Integrated Natural Resources Management Plan will be revised to include a section on marine debris clean-up for SNI in support of this requirement. Data collected during the annual marine debris removal effort will be documented in the Ocean Conservancy’s database. Furthermore, the Navy is conducting a one-time marine debris characterization and sampling project, including debris removal, using collection methods adapted from NOAA’s Marine Debris Monitoring methodology (Lippiatt et al., 2013). Sampling was conducted twice during fiscal year 2022 on SNI. This effort will be conducted for a period of one year only and serves as a means for conducting rapid assessments of the debris material type and quantity present in a monitored location. A Draft and Final Technical Report will be developed and submitted to NMFS in 2023, comparable to other work performed in the South Coast region. The EFH consultation was concluded on November 20, 2020.
- **CZMA.** The Navy completed the CZMA federal consistency process for proposed testing and training activities in the PMSR. The Navy submitted the final Coastal Consistency Determination to the California Coastal Commission on September 2, 2020. A Commission hearing was held on December 9, 2020, and the Navy received concurrence from the Commission that the Proposed Action is consistent to the maximum extent practicable with the enforceable policies of the California Coastal Management Plan on December 11, 2020. While some California coastal zone uses and resources could have short-term, temporary effects, the Proposed Action will not have population-level effects. The Navy will implement standard operating procedures and mitigation for the Proposed Action, which will reduce the potential impacts of its proposed activities on coastal zone uses and resources. The Commission’s concurrence did not include any additional conditions, although the Navy did commit to providing the Commission with a report on the use of explosives, if any, within designated Biologically Important Areas for marine mammals that overlap the PMSR. The Navy will also provide the Commission with data from the annual marine debris removal from SNI and a copy of the final technical report resulting from the marine debris characterization and sampling project discussed above. The Navy will also provide the

Commission with copies of final reports resulting from two additional Navy-funded studies, currently in development, to determine if SNI meets the criteria as a Traditional Cultural Property (TCP) and an archaeological district, as discussed below. Additionally, the Navy committed to providing the Commission with a copy of the Navy's Lookout Effectiveness Study, anticipated in late 2022.

- **National Historic Preservation Act (NHPA).** The Navy is required to comply with Section 106 of the NHPA to support testing and training activities (an "undertaking" under the NHPA). On February 11, 2020, the Navy invited seven federally recognized Indian Tribes to participate in government-to-government consultation for the PMSR EIS/OEIS. On June 29, 2020, the Navy initiated NHPA Section 106 consultation with the California SHPO. As of June 2021, five Tribes entered into consultation for the PMSR EIS/OEIS.

The Navy re-initiated consultation with Tribes and the SHPO on January 11, 2021, to include new information provided by Tribes during consultation for a separate project on SNI. At that time, the Pechanga Band of Luiseño Indians (the Pechanga Band) informed the Navy that they view SNI as a TCP and further view all archaeological resources as contributing to an archaeological district. The Navy has initiated two studies to assess the potential National Register of Historic Places (NRHP)-eligibility of SNI as both (1) a TCP and as (2) an archaeological district. These ethnographic and archeological district studies are currently underway and will be final in late 2022 or early 2023. The Navy agreed to consult with the Tribes and SHPO on the results of the studies.

On, April 6, 2021, the Navy sent a letter to the Tribes and the SHPO stating the undertaking will not have an adverse effect on historic properties, including the proposed TCP and archaeological district.

On May 10, 2021 and May 12, 2021, the Rincon Band of Luiseño Indians (the Rincon Band) and the SHPO, respectively, informed the Navy they did not concur with Navy's finding of no adverse effect to historic properties. On June 1, 2021, the Pechanga Band informed the Advisory Council on Historic Preservation (ACHP) that they also did not concur with the Navy's finding of no adverse effect and asked the ACHP to review the finding made by the Navy regarding the PMSR undertaking in accordance with Section 106 of the NHPA and its implementing regulations, "Protection of Historic Properties" (36 CFR part 800). The Pechanga Band informed the Navy of this outreach to the ACHP on June 8, 2021. As a result of the Tribes' and the SHPO non-concurrence with the Navy's finding of no adverse effect, the Navy continued to work with the Tribes and SHPO to resolve differences. A comprehensive log of tribal communication can be found in Appendix G (Agency Correspondence) of the EIS/OEIS.

Based on the request from the Pechanga Band, the ACHP sought additional information from both the Pechanga Band and the Navy to further their understanding of the consultation process and the undertaking's finding of effect. On September 23, 2021, the Navy received a letter from the ACHP in response to the Pechanga Band's letter to the ACHP. The ACHP found no basis to disagree with the Navy's finding of no adverse effect. In reaching this conclusion, the ACHP acknowledged "that the Section 106 regulations place the responsibility on and give discretion to the federal agency in determining the level of effort to conduct appropriate identification efforts taking into account past planning, research and studies, the magnitude and nature of the undertaking and the degree of federal involvement, the nature and extent of potential effects on historic properties, and the likely nature and location of historic properties within the APE" (Advisory Council on Historic Properties, 2021). In accordance with 36 CFR

Sections 800.5(c)(3)(ii)(B), the Navy took the ACHP's advisory opinion into account and confirmed its final decision on the applicability of the finding of no adverse effect to historic properties in a summary of finding with supporting rationale for the decision and provided it to the ACHP, the SHPO, Tribal Chairs, and all consulting parties, concluding the Section 106 consultation process on November 17, 2021.

As part of its separate responsibilities under NHPA and consistent with its commitment to continue working to strengthen its long-term government-to-government, sovereign-to-sovereign relationship with the federally recognized Indian Tribes, the Navy will continue consulting with the Tribes to develop and/or implement additional agreements to address cultural resources on SNI. This includes a recently signed Consultation Protocol Agreement to guide and facilitate Navy tribal consultation, and to develop a Native American Graves Protection and Repatriation Act (NAGPRA) Comprehensive Agreement for the treatment of inadvertent discoveries and a Programmatic Agreement focusing on military readiness activities on SNI under Section 106 of the NHPA, in coordination with the Tribes, SHPO, and ACHP.

Furthermore, during the PMSR EIS Section 106 consultation with the Rincon Band, the Navy committed to providing the Tribe with annual reports on SNI activities related to the PMSR EIS/OEIS Proposed Action. This commitment will be extended to the other consulting Tribes and will also be documented in the next update to the SNI Integrated Cultural Resources Management Plan.

Mitigation Measures

Chapter 5 (Standard Operating Procedures and Mitigation) of the Final EIS/OEIS includes mitigation measures that the Navy will implement to avoid or minimize potential impacts from the PMSR EIS/OEIS Proposed Action. The Navy will also implement standard operating procedures specific to training and testing activities conducted under the Proposed Action. The Navy worked collaboratively with the appropriate regulatory agencies through the consultation and permitting processes to develop and finalize the mitigation measures included in the PMSR Final EIS/OEIS and incorporated additional mitigation measures or conservation recommendations in coordination with those agencies. The Navy's mitigation measures are also identified in the NMFS Biological Opinion, Final Rule, and LOA (see the Agency and Tribal Consultation and Coordination subsection of this ROD for further details).

In its mitigation measures, the Navy has taken all practicable means to avoid or minimize environmental harm. The Navy's mitigation measures are organized into two categories: procedural mitigation measures for at-sea activities and mitigation for land-based areas.

At-Sea Procedural Mitigation Measures. The Navy will implement procedural mitigation measures whenever and wherever training or testing activities involving applicable acoustic, explosive, and physical disturbance and strike stressors take place within the at-sea portion of the Study Area. Specific, case-by-case, mission requirements, safety, and environmental conditions will also be considered when determining whether a mitigation measure is practicable to implement (e.g., mission-essential components, risk to personnel, equipment limitations and fuel constraints, adverse weather). At-sea procedural mitigation (implemented for activities that occur on or over the open ocean) generally involves (1) the use of one or more trained Lookouts (trained observers) to observe for specific biological resources within a mitigation zone, (2) requirements for Lookouts to immediately communicate sightings of specific biological resources to the appropriate Test Conductor or watch station for information dissemination, and (3) requirements for the Test Conductor or watch station to implement appropriate mitigation or until an activity condition has been met.

Procedural mitigation for the Study Area involves environmental awareness and education, which mainly centers on the Navy's Afloat Environmental Compliance Training Program. Personnel involved in mitigation and training or testing activity associated with the Proposed Action complete one or more of the following modules of the Program: (1) Introduction to the U.S. Navy Afloat Environmental Compliance Training Series, (2) Marine Species Awareness Training, and (3) U.S. Navy Protective Measures Assessment Protocol. Procedural mitigation also involves the establishment of mitigation zones and Lookouts to detect marine mammals and sea turtles within the zones. In addition, after completion of explosive activities and when practical, the Navy will also observe the vicinity of where detonations occurred and will follow established incident reporting procedures if any injured or dead marine mammals or ESA-listed species are observed.

Land-Based Procedural Mitigation Measures. The Navy will continue to implement land-based mitigation measures identified in the U.S. Fish and Wildlife Service's Biological Opinions for NBVC Point Mugu and SNI for the following activities associated with the Proposed Action: aircraft operations and support; unmanned aircraft operations; directed energy operations on NBVC Point Mugu and SNI; and close-in weapons systems, small arms, and other countermeasure testing and training at NBVC Point Mugu and SNI. Other land-based mitigations will also apply to vehicle launches from SNI in accordance with NMFS' LOA under MMPA. Land-based mitigations include protective measures for hauled-out pinnipeds, ESA-listed nesting birds, and cultural resources on SNI and ESA-listed nesting birds at NBVC Point Mugu.

Furthermore, the PMSR Final EIS/OEIS Chapter 5 (Standard Operating Procedures and Mitigation; Section 5.1.1.10 [Cultural Resources]) describes the Navy's responsibility for implementing Standard Operating Procedures and protective measures to avoid impacts to cultural resources on SNI, such as site protection, pre- and post-event monitoring, and clean-up of the Land Impact Site. In the event of a post-review discovery, or inadvertent discovery of NAGPRA cultural items, the Navy Archaeologist on site will notify the NBVC Cultural Resources Manager, and the Navy will proceed consistent with 36 CFR Section 800.13, as well as NAGPRA and its implementing regulations, as appropriate.

Marine Species Monitoring, Research, and Reporting

The Navy is committed to environmental stewardship, complying with federal environmental laws and regulations, and providing required and relevant reports to appropriate regulatory agencies while executing its national security mission.

As a complement to the Navy's commitment to avoiding and minimizing impacts of the Proposed Action through mitigation, the Navy will continue to undertake monitoring efforts to better understand the impacts of the Proposed Action, as presented in Section 5.2.2.3 (Marine Species Research and Monitoring Programs) of the PMSR Final EIS/OEIS.

The Navy will continue submitting annual training and testing activity reports as required by the MMPA and ESA, that describe the level of training and testing conducted during the reporting period (e.g., the counts of explosives used and launch events).

The Navy will report incidents involving biological and cultural resources if they occur, such as aircraft or vessel strikes, observed injuries or mortalities to marine mammals or ESA-listed species after the use of explosives, or unanticipated effects on historic properties. The Navy and NMFS use the information contained within monitoring, research, activity, and incident reports when evaluating the effectiveness and practicality of mitigation measures and determining if adaptive adjustments may be appropriate. These reports also facilitate a better understanding of the biological resources that inhabit the Study Area and the potential impacts of military readiness activities on them.

Summary of Navy Commitments

In addition to mitigations developed through a series of consultations for the PMSR EIS/OEIS with State and Federal agencies and federally recognized Tribes and other consulting parties, additional commitments included in the table below demonstrate the Navy’s dedication to good environmental stewardship. Many of these commitments are noted in the consultation details addressed above.

Receiving Party	Product/Action	Frequency
California Coastal Commission	Marine Debris Characterization Study Technical Report	One time submittal of final report
	Marine Debris Clean-up Report	Annually
	Navy Lookout Effectiveness Study	One time submittal of final report
	Explosive Use Report for Biologically Important Areas	Annually
	Ethnographic Study and Archeological District Final Report	One time submittal of final reports
NMFS – Regional Office	Marine Debris Clean-up and Report	Annually
	Marine Debris Characterization Study Technical Report	One time submittal of final report
NMFS – HQ	Activity Reports for MMPA/ESA	Annually
Federally Recognized Tribes	SNI Activity Report	Annually
	Ethnographic Study and Archeological District Final Reports	Submittal of draft and final reports
Internal to Navy	Legacy Rocket/Jet Fueled Assisted Takeoff Bottle removal	Annually

Responses to Comments Received on the PMSR Final EIS/OEIS

The Navy reviewed and considered all comments received during the 30-day wait period following the publication of the Notice of Availability for the PMSR Final EIS/OEIS. The Navy received two comment submittals, one from the U.S. Environmental Protection Agency (EPA) Region IX and one from the Pechanga Band of Luiseño Indians (the Pechanga Band). Public comments received following the publication of the Final EIS/OEIS are consistent with public comment themes that emerged during scoping and Draft EIS/OEIS public comment periods, adding no new substantive information that was not already considered in the preparation of the Final EIS/OEIS and this ROD. Common themes identified in comments received on the Final EIS/OEIS include:

- Request for the Navy to conduct additional research into environmentally friendly materials and increase visibility of parachutes in the water column to facilitate parachute recovery
- Concerns about impacts to cultural resources on SNI

In addition to the themes above, the Navy is providing additional information for the following comments.

Comment #1: [United States Environmental Protection Agency, Region IX]. The EPA Region IX requests that the Navy research environmentally friendly options to the use of plastics in chaff and flare cartridges. Additionally, the EPA requested research efforts to identify ways to enhance parachute visibility to facilitate recovery and reduce entanglement risk. The EPA acknowledged and appreciated the Navy's responses to EPA's comments submitted on the Draft EIS/OEIS. The EPA specifically commended the Navy for committing to fund clean-up actions for expended Jet-Assisted Take-Off/Rocket Assisted Take-Off bottles and for establishing the marine debris program on SNI.

Navy Response: The Navy appreciates EPA's comments on the PMSR Final EIS/OEIS. The Navy remains committed to pursuing options for researching viable alternatives for MEM, including chaff and flare cartridges, and improving parachute recovery methods and rates, to reduce potential effects to marine life. As responded in the Final EIS/OEIS, the current recovery rate for targets/parachutes in the marine environment is approximately 95 percent. The Sea Range Division will encourage Navy's Research, Development, Test & Evaluation Program Offices to look for more environmentally friendly options to plastics and enhanced parachute visibility through programs such as the Strategic Environmental Research and Development Program, Environmental Security Technology Certification Program, and Naval Air Warfare Center Weapons Division Innovation Challenge Program.

Comment #2: [The Pechanga Band of Luiseño Indians]. The Pechanga Band submitted a letter as well as comments on the Final EIS/OEIS Section 3.10 (Cultural Resources). Comments highlighted their concerns regarding impacts to cultural resources on SNI. The Pechanga Band commented that the PMSR EIS is premature and that impacts to historic properties have not been thoroughly assessed, specifically impacts on SNI and the potential NRHP-eligibility of SNI as a TCP and archaeological district, as viewed by the Tribe.

Other key concerns that were raised related to a mishap of an errant inert missile that missed an intended target at the SNI Land Impact Site and resulted in an inadvertent impact to an archaeological site. Although related to a previously reviewed undertaking, the Tribe requested NHPA Section 106 consultation for the current proposed action to continue. The Tribe also requested information regarding protection of cultural resources, including possible exposure of ancestral remains due to erosion resulting from continuous testing activities and other actions on SNI. The Pechanga Band also requested information regarding the origin and nature of fill used to restore the Land Impact Site. The Pechanga Band claimed that the Navy continually delayed discussions and further claimed that impacts cannot be properly assessed until the TCP and archaeological studies are completed. Furthermore, the Pechanga Band stated that the Navy ignored the fact that the Tribe's historic properties, including sites with human remains and funerary objects, are being impacted while the Navy is continuing to seek approval of the EIS/OEIS, reiterating their request for the Navy to postpone approval of the EIS/OEIS to allow for a more thorough analysis of the effects to historic properties.

Navy Response: The Navy appreciates the comment regarding the prematurity of the PMSR Final EIS/OEIS and request for NHPA consultation to continue. The Navy has been consulting with the Pechanga Band regarding the potential effects to cultural resources under Section 106 of the NHPA since July 2020. Following extensive communication and phone calls, the Navy received information from the Tribes regarding historic properties and incorporated that information as part of the Section 106 analysis. All information provided to the Navy has been considered in preparation of the analysis, including the effects of the Proposed Action on a TCP and archeological district. Until the current ethnographic and archeological district studies to assess the potential NRHP-eligibility of SNI as both a TCP and as an archaeological district are completed, the Navy assumed that both historic property types

are present in its effects analysis. In response to the Pechanga Band's comment stating, "the Navy's finding of no significant impact to the TCP is an assumption," the Navy incorporated information provided by the Tribes regarding historic properties and used that information as part of its NEPA analysis to determine no significant impacts.

In the ACHP response to the Pechanga Band's request to participate in the Section 106 process for the PMSR EIS/OEIS, and following its review of the Navy's administrative record, the ACHP did not object to the Navy's efforts to comply with Section 106 and its implementing regulations, nor did it disagree with the Navy's finding of No Adverse Effect. In accordance with 36 CFR Sections 800.5(c)(3)(ii)(B), the Section 106 process for the PMSR EIS/OEIS was concluded on November 17, 2021, when the Navy sent a summary letter (dated November 8, 2021) affirming its finding of no adverse effect to the ACHP, SHPO, and Tribes. However, the Navy is committed to continued consultation for future undertakings on SNI and will continue to work closely with the Tribes to strengthen long-term relationships and to develop planning documents such as a Programmatic Agreement and a NAGPRA Comprehensive Agreement for all of SNI.

Regarding Tribal concerns over the mishap on SNI, as outlined in Chapter 5 (Standard Operating Procedures and Mitigation; Section 5.1.1.10 [Cultural Resources]), in the event of a post-review discovery the Navy will proceed consistent with 36 CFR Section 800.13. Following the unplanned mishap on SNI, the Navy notified the Tribes, SHPO, and ACHP. It is important to note that this was an unplanned/accidental event and the probability of it occurring again is very low. This was the first time in approximately 25 years that a mishap of this type has occurred. As a result of this incident, the Navy is currently consulting with the Tribes to determine actions that the Navy can take to resolve adverse effects. During Tribal consultation meetings, the Navy proposed site visits before and after activities. These proposed visits will be incorporated into the Programmatic Agreement developed for SNI. It is important to note that most MEM do not land on SNI. The only expended materials are those associated with the Land Impact Site, which are recovered to the extent practicable. All other military materials are expended at sea during the conduct of at-sea testing and training. The Navy and interested Tribes traveled to SNI for a site visit June 23-24 2022 to observe the affected archaeological site and other locations related to the Proposed Action.

To address the Pechanga Band's comments on Section 3.10 (Cultural Resources) regarding protection of cultural resources, including erosion and impacts to ancestral human remains, the Navy reiterates that the nature of testing activities are limited to previously developed areas and therefore do not have the potential to disturb human remains that may be exposed by erosion. The Navy has proposed consultation with the Tribes to develop a NAGPRA Comprehensive Agreement for SNI and looks forward to further discussion on this matter.

Regarding mitigation of impacted areas of the Land Impact Site, the Navy currently has and will continue to implement protective procedures to avoid or minimize potential adverse effects to CA-SNI-168 at the Land Impact Site on SNI, as discussed in Section 3.10.6.2.1 (Physical Disturbance and Strike) and Section 5.1.1.10 (Standard Operating Procedures, Cultural Resources). In addition, the Navy will continue to follow the procedures outlined in 36 CFR 800.13 if historic properties are discovered or unanticipated effects on historic properties are found.

To address the Pechanga Band's request for information regarding fill at the Land Impact Site, the Navy uses the soil displaced by impacts to the existing dirt pad to restore the site. If additional fill is required, it is sourced from an active borrow pit that is devoid of cultural material. The Pechanga Band also asked about the Navy's protocols in the event of unauthorized off-road driving and/or artifact collection. In that case, the Navy would treat these events, if they were to occur, as violations of the Archaeological

Resources Protection Act and follow regulatory procedures found in 32 CFR part 229, Protection of Archaeological Resources.

C. CONCLUSION: Based on factors addressed in the PMSR Final EIS/OEIS, including military testing and training objectives; best available science; potential environmental impacts; input and expertise of federal agencies, tribal cultural authorities, and non-governmental organizations; and comments from the public, I have determined that the PMSR Final EIS Preferred Alternative (Alternative 1) best meets the needs of the Navy. Implementation of Alternative 1 will enable the Navy to fully meet the Navy's current and foreseeable future testing and training requirements in the PMSR Study Area. By implementing standard operating procedures and mitigation measures identified in the Final EIS/OEIS, this ROD, and in associated regulatory documents, and by adhering to management plans and monitoring requirements described herein, the Navy has adopted all practicable means to avoid or minimize environmental harm. In addition, the Navy assessed the effects of Alternative 1 in accordance with Executive Order 12114 and concluded that there will be no significant harm to the environment in areas outside the United States and possessions.

8 July 2022

Date

Mr. Karnig Ohannessian
Deputy Assistant Secretary of the Navy
(Environment and Mission Readiness)