Appendix A: Summary of Comments and Responses

NOAA received 159 comments on the proposed rule, draft management plan, and draft environmental assessment (EA) during the July 6 through September 4, 2020 public review period. NOAA hosted three virtual public meetings with 117 participants. NOAA received written comments from members of the public submitted at regulations.gov, written comments from MBNMS’s Research Activity Panel, and oral and written comments provided during virtual public meetings and two Sanctuary Advisory Council meetings.

All substantive issues raised in the comments are summarized and addressed in this section. NOAA summarized the comments according to the content of the statement or question put forward in written statements or oral testimony regarding the proposed action and alternatives. NOAA made changes to the proposed rule, draft management plan, and draft EA, where appropriate, including updates to information where the response to comments affects the impact analysis or is relevant to sanctuary action plans in the management plan. Technical or editorial comments on any of the draft documents are incorporated in the final rule, final management plan, and final EA, and are not described in further detail here.

Overall, there was support for the proposed regulatory changes. Among these comments was strong support for the definition of beneficial use of dredged material for habitat restoration. However, a number of the comments had concerns with the following elements of the proposed definition: “habitat restoration,” “clean,” and the sources of dredged material eligible for beneficial use projects if the other criteria are met (i.e., sediment sources). Commenters interpreted the term “habitat restoration” to exclude future potential habitat protection projects along the coast. Further, commenters stated that using the term “clean” as currently defined in sanctuary regulations (15 CFR 922.131) in the proposed definition of beneficial use would prohibit future potential beneficial use projects. Finally, comments reflected confusion as to (1) what sediment sources are currently eligible for use in beneficial use projects, and (2) what dredged material sources would be eligible to be used for habitat restoration projects through the new definition and regulatory clarification of beneficial use provided in the proposed rule.

As a result of these comments, NOAA modified and clarified elements of the “beneficial use” definition to avoid future confusion as to the applicability of this definition and to address the substantive concerns raised in the comments regarding the “clean” definition and the proposed “habitat restoration” uses. Please refer to the final rule under docket “NOAA-NOS-2020-0094” for further details.

Comments on the draft management plan were diverse, with the majority focused on the need for increased wildlife and habitat protection, followed by reducing marine debris, opposition to offshore wind energy, addressing coastal erosion, and support for education programs. Additional comment topics supported increased research and monitoring, research at Davidson Seamount, addressing climate change, and improving water quality. Finally, comments expressed support for the sanctuary’s stakeholder engagement processes. Each of these issues is addressed below. A number of comments support MBNMS in implementing strategies from the 2008 management plan. Comments on the EA focused on impacts from potential beach nourishment projects and the removal of MPWC zone buoys.
# Organization of Comments and Responses

The subject matter of each comment category is first summarized, followed by the response. Responses may refer to portions of the rule, management plan, or EA that NOAA modified as a result of comments. The summarized topics and sub issues are shown in Table 8. Within the table, regulatory comments are addressed first, followed by the environmental assessment and then the draft management plan.

## Table 8. Index of Topics and Issues in Response to Comments

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Appendix A

Beneficial Use of Dredged Material Regulation

Support regulation change

Comment: NOAA should support the regulation clarifying the language in the terms of designation and MBNMS regulations prohibiting permitting the disposal of dredged material within the sanctuary (other than at sites authorized by the U.S. EPA prior to the effective date of designation), which does not preclude NOAA from authorizing the beneficial use of clean dredged material within sanctuary boundaries when suitable for habitat restoration purposes.

Response: NOAA agrees and is moving forward with the beneficial use regulation with some clarifications and modifications.

“Clean” definition

Comment: NOAA should clarify its definition of “clean” material and clarify the standards used to assess material appropriate for beneficial use projects.

Response: In this final rule, NOAA acknowledges that the proposed use of “clean” as a standard for beneficial use projects and defined at 15 CFR 922.131 created challenges given how that word is defined elsewhere in MBNMS regulations (see 15 CFR 922.131). NOAA has determined that the purpose of protection of sanctuary resources and qualities could be maintained via a revised sediment standard and implementation of permit and/or authorization review criteria. NOAA has therefore removed “clean” from the sanctuary definition of “beneficial use of dredged material.” Instead, the ONMS director must determine that the dredged material is “suitable” as a resource for habitat protection or restoration purposes. Please see Section II. “Changes from Proposed to Final Regulations” in the final rule for further information about the change from the proposed rule to the final rule, as well as a description of the standard for “suitable.”

Beneficial use standards

Comment: NOAA should use EPA’s standards for determining suitability of dredged material for placement within MBNMS for beneficial use.

Response: NOAA will apply ONMS review criteria for permits and/or authorizations. In addition to an ONMS permit or authorization, a project would also be reviewed and permitted, as appropriate, by other federal and state regulatory authorities with jurisdiction over the proposed beneficial use project, such as the EPA, as applicable. Please see Section III A. 1. “Review and permitting of beneficial use projects” in the final rule for more information on how NOAA will evaluate beneficial use projects proposed to be conducted within sanctuary boundaries.

Limited sources of dredged material (sediment)

Comment: NOAA received comments that the proposed beneficial use definition unnecessarily limits the origin of dredged material that can be considered for beneficial use to the four harbors adjacent to the sanctuary.
Response: NOAA provides several reasons in Section III. A. 2. b. “Sediment from local harbors immediately adjacent to the sanctuary” in the final rule why the four harbors immediately adjacent to the sanctuary, and not other harbors, are considered eligible sources of material for protecting or restoring habitats. First, the four harbors and the sanctuary are in the same local sediment transport cell, which means that the sediments that settle in the four harbor channels generally come from the same sources as those that settle in the sanctuary. Second, if the four harbors adjacent to the sanctuary did not exist, sand and other sediment would not settle in the harbors and would thus remain in the coastal transport cell. Therefore, the regulatory clarifications regarding the permitted use of suitable dredged material from the four named harbors for beneficial use projects achieve the intent of helping restore the normal transport of sediment along the coast within the sanctuary. Third, NOAA describes historical reasons why the original designation of MBNMS did not envision the sanctuary as a site to absorb dredged materials from harbors distant to MBNMS. In addition to the four harbors, NOAA describes several other sources of material that could be approved for beneficial use projects within the sanctuary. Please see Section III. 2. “Sources of sediment eligible for use in beneficial use projects” in the final rule for more information on other eligible sources of material.

Habitat protection and restoration

Comment: NOAA received comments that the proposed rule restricts the use of dredged material to “habitat restoration,” which could preclude using the dredge material to protect infrastructure threatened by coastal erosion, sea level rise, and coastal storms.

Response: In response to these comments, NOAA has modified the definition of the “beneficial use of dredged material” to clarify that beneficial use of dredged material includes habitat protection and habitat restoration purposes. As explained in Section II. “Changes from Proposed to Final Regulation” and Section III. A. 1. “Review and Permitting of Beneficial Use Projects” in the final rule, proactive “protection” of natural habitats serves a beneficial purpose and, by helping to prevent future degradation of habitat, may preclude or reduce the need for habitat restoration. An ancillary benefit from restoring and protecting beach habitat could include coastal infrastructure protection.

Comment: NOAA should describe habitat restoration purposes to meet the criteria for beneficial use.

Response: NOAA includes managing sediment for the purpose of habitat restoration in the two Coastal Regional Sediment Management Plans (CRSMP) that pertain to MBNMS. For example, the CRSMP for the Santa Cruz Littoral Cell mentions that sediment management projects could provide several direct benefits to the region including “mitigating shoreline erosion and coastal storm damage; allowing for biological habitat restoration and protection; increasing natural sediment supply to the coast; and providing public safety, access, and recreational benefits through beach restoration.” Further, implementation of the two CRSMPs are included in the Coastal Erosion and Sediment Management Action Plan, Strategy CESM-1. NOAA also provides additional information in Section III. A. 1. “Review and Permitting of Beneficial Use Projects” in the final rule regarding the meaning of “habitat restoration” for purposes of this final rule.
**Authorizations**

**Comment:** NOAA should clarify the process for ONMS to issue authorizations to USACE for permits to allow disposal of dredged material in the sanctuary by Santa Cruz Port District (SCPD).

**Response:** Within MBNMS, NOAA ONMS authorizes permits issued for disposal of dredged material at approved disposal sites. An authorization or permit is necessary for this prohibited activity to be conducted within the sanctuary (15 CFR 922.48, 922.49, 922.132, and 922.133). NOAA may authorize the USACE dredge disposal permit issued to SCPD and/or the CCC Coastal Development Permit (CDP) based on NOAA’s authorization review process, including in this instance, consideration of alignment of regulated activities and mitigations to protect sanctuary resources. In summary, NOAA will continue to work closely with EPA, USACE, CCC, and other state and federal resource agencies when assessing dredge disposal activities, and may authorize valid permits, leases, licenses, approvals, or other authorizations (15 CFR 922.132(e)) pertaining to dredge disposal in approved dredge disposal sites (15 CFR 922.132(a)(2)(i)(F)).

**Impact on current harbor dredge authorization and permitting processes**

**Comment:** NOAA received comments asking if NOAA’s regulatory action regarding beneficial use of dredged material will affect how ONMS authorizes current harbor dredge disposal activities.

**Response:** NOAA has issued sanctuary authorizations to Santa Cruz, Moss Landing, and Monterey harbors for depositing harbor dredge at approved disposal sites in the past. NOAA’s regulatory action regarding beneficial use of dredged material will not alter the sanctuary authorization or permitting process for depositing harbor dredge material at the approved disposal sites (15 CFR 922.132(a)(2)(i)(F)). If any of the four harbors identified in the “beneficial use” definition (the three listed here or Pillar Point) propose a project for which the material dredged from their harbor would be used for beneficial use to protect or restore habitat, NOAA would follow the process steps outlined in this rule.

**Timing and frequency of beach nourishment**

**Comment:** NOAA should reserve the right to alter the timing and frequency of beach nourishment treatments should data and analysis indicate negative ecological impacts from excessive sediment loading or seasonal conflicts with reproductive cycles of flora and fauna.

**Response:** NOAA concurs. In accordance with 15 CFR 922.49(a)(4), authorization applicants must comply with any terms and conditions the issuing NOAA official deems reasonably necessary to protect sanctuary resources and qualities. This may include terms and conditions pertaining to the timing and frequency of dredged material placement.

**Contaminated dredged materials**

**Comment:** NOAA should consider authorizing use of contaminated dredged materials for beneficial use if pre-treated to reduce toxicity levels.

**Response:** NOAA believes it is important for MBNMS to only rely upon dredged material that has been deemed suitable by the ONMS director for habitat protection or restoration projects.
As explained in Section III. A. 1. “Review and Permitting of Beneficial Use Projects,” the determination of suitability includes consideration of compatibility standards for water and physical quality of any sediment placed within the sanctuary to ensure protection of native habitats and ecology. If dredged material can be successfully pre-treated to reduce toxicity to suitable levels, it may be considered for beneficial use projects.

**Negative effects of beach nourishment**

**Comment:** NOAA should consider negative effects of beach nourishment, such as introduction of invasive species and interruption of important temporal ecological processes at receiving sites.

**Response:** NOAA concurs and has implemented regulations that prohibit the introduction of introduced species to the ecosystem of the sanctuary (15 CFR 922.131 and 922.132(a)(12)). Ecological impacts to receiving sites will be assessed through project-specific environmental reviews, including assessments of the source sediment to ensure the absence of introduced species. Further, NOAA will consult with appropriate resource management agencies for any proposed beach nourishment project in the sanctuary using beneficial use of dredge material.

**Artificial reefs, islands, and other purposes**

**Comment:** NOAA should authorize use of dredged material for artificial reefs, islands, and other purposes beyond habitat restoration.

**Response:** NOAA disagrees. Using dredged material to develop artificial reefs and islands within MBNMS is beyond the scope of this action and the intent of the original sanctuary designation. NOAA is implementing this action to protect and restore natural habitats and ecological communities and processes within sanctuaries as much as possible—not to create artificial habitats and communities for interests or development purposes that may be incompatible with the sanctuary’s primary mandate of resource protection. Furthermore, the state is the lead authority for artificial reefs in California state waters and does not have a process in place for permitting artificial reefs at this time.

**Clean fill materials**

**Comment:** NOAA should use crushed glass for clean fill material for artificial reefs.

**Response:** NOAA disagrees. There are strict prohibitions regarding ocean dumping and discharges into the sanctuary and this suggestion runs counter to these prohibitions. Also, see the response to the above comment regarding artificial reefs.

**Department of Defense Regulatory Exemption**

**List of Department of Defense exempted activities**

**Comment:** NOAA should rectify the omission of the list of exempted Department of Defense Activities at the Davidson Seamount Management Zone in the 2008 FEIS.

**Response:** NOAA is including an appendix in the 2021 final EA to serve as the published list of exempted DOD activities within the DSMZ, which is referenced and confirmed by the January 5, 2009, letter to the U.S. Air Force 30th Space Wing from the MBNMS superintendent.
Environmental Assessment

**Impacts from beach nourishment**

**Comment:** NOAA should take into consideration the impacts of future beach nourishment projects in the final EA, specifically the effects of increased sediment volume and turbidity on marine species from such projects.

**Response:** Proposed beach nourishment projects involving use of dredged material would be subject to evaluation as per the definition of beneficial use of dredged material in the final rule at CFR 922.131. NOAA would require rigorous testing and screening of the source material for habitat protection or restoration to ensure that the source material is suitable and matches the physical properties and water quality objectives of the receiving site within the sanctuary. In addition to ONMS permit and authorization requirements (15 CFR 922.48, 922.49, and 922.133), NOAA would conduct applicable project-specific reviews and consultations for proposed beneficial use projects under environmental and natural or cultural resource statutes, including NEPA.

**Green sturgeon**

**Comment:** NOAA should consider the impacts from the regulatory changes for the MPWC boundaries on green sturgeon in the final EA related to the regulatory change for MPWC zone boundaries.

**Response:** In general, ONMS’s analysis in the EA found that the proposed changes to MPWC zone boundaries would result in beneficial impacts to the physical and biological setting by reducing the extent of seafloor habitat and biota potentially impacted by mooring buoy deployment and chain drag incidental to drifting buoys. NOAA evaluated potential impacts on Endangered Species Act listed species, including the southern distinct population segment of North American green sturgeon, and determined that implementing the regulatory change was not likely to adversely affect green sturgeon and would have no effect on their designated critical habitat. See sections 5.5.3 and 5.5.4 of the EA for the analysis of potential impacts on protected species. ONMS conducted informal consultation with NMFS under Section 7 of the Endangered Species Act on these effect determinations, as described in Appendix D of the EA.

**Artificial Reefs**

**Development of artificial reefs**

**Comment:** NOAA should support development of artificial reefs in the sanctuary for recreational diving.

**Response:** The state of California is the lead authority for artificial reefs in state waters. (Federal waters of the sanctuary are largely deeper than safe diving depths for recreational divers.) MBNMS is presently recognized as one of the top, natural dive sites in the nation, and adding artificial reefs for recreational diving may be difficult to justify given the extensive, natural diving already available and the purpose for MBNMS. NOAA has the authority to authorize state permits for artificial reefs. The state has prioritized studies on the use of artificial reefs for habitat restoration purposes and has not developed any guidelines related to the
development of artificial reefs (e.g., sinking ships or other items) for recreational purposes and does not have a process in place for permitting artificial reefs at this time. The Resource Protection Action Plan, Strategy RP-19, will track, assess, and study any proposed areas for potential suitability in the sanctuary if the state expands their artificial reef program.

Climate Change

Reduction targets

Comment: NOAA should add greenhouse gas reduction targets to the Climate Change Action Plan.

Response: NOAA concurs and after completing an emissions inventory for MBNMS’s operations carbon footprint, MBNMS will consider setting an annual reduction target as outlined in the Climate Change Action Plan, Strategy CC-2.

Blue carbon studies

Comment: NOAA should conduct research on the role of blue carbon (carbon captured and stored in coastal and marine ecosystems) in mitigating climate change, as well as conduct feasibility tests for more permanent protections to keep carbon in storage in support of carbon markets.

Response: NOAA is advancing carbon market studies working with the National Estuarine Research Reserves and other key partners, and will continue to engage and seek funding for studies as appropriate. These actions are outlined in the Coastal Erosion and Sediment Management Action Plan.

Coastal Erosion and Sediment Management

Bathymetry data gaps

Comment: NOAA should monitor the bathymetric data on the main channel of Elkhorn Slough to aid in the development of better management strategies related to erosion.

Response: NOAA agrees and has added bathymetry monitoring in the main channel of Elkhorn Slough to the Coastal Erosion and Sediment Management Action Plan.

Climate Plan linkages

Comment: NOAA should explain the linkages between the Climate Change Action Plan and the Coastal Erosion and Sediment Management Action Plan.

Response: NOAA agrees the two action plans are interconnected. Strategy CC-4 of the Climate Change Action Plan directs research on sediment sources and managed retreat as a climate change adaptation option. The Coastal Erosion and Sediment Management Action Plan focuses specifically on coastal erosion and activities to restore sediment balance in nearshore habitats in the face of sea level rise as the consequence of climate change.
Peer-reviewed data

**Comment:** NOAA should consider more data from peer-reviewed sources and more monitoring studies to understand the effects of beach nourishment on invertebrates.

**Response:** NOAA agrees, and the Coastal Erosion and Sediment Management Action Plan supports research and monitoring on potential impacts to sanctuary resources, including invertebrates, from beach nourishment projects.

Cruise Ships

**Cruise ships and discharges**

**Comment:** NOAA should ban cruise ships in the sanctuary as well as any discharges of fuel and waste from them.

**Response:** The NMSA facilitates multiple uses within sanctuaries, including commercial and recreational uses, compatible with the primary objective of resource protection. NOAA believes the current MBNMS regulations prohibiting discharges from within or into MBNMS of any material or other matter from a cruise ship (e.g., fuel and waste), except clean vessel engine cooling water, clean vessel generator cooling water, vessel engine or generator exhaust, clean bilge water, or anchor wash (15 CFR 922.132(a)(2)(ii)), are adequate at this time to protect sanctuary resources, while also allowing use of the resources from a cruise ship. If data becomes available in the future that show that these regulations are not adequate, NOAA can amend regulations affecting cruise ships in the future.

Davidson Seamount

**Acoustic characterization**

**Comment:** NOAA should couple the NOAA Soundscape Initiatives with more specific methods to characterize highly mobile and vocal species at Davidson Seamount.

**Response:** NOAA has determined it is beyond the scope of this management plan to provide specific methods for characterizing all species and habitats of the sanctuary. However, NOAA notes in the Research and Monitoring Action Plan that highly mobile and vocal species will be assessed through the NOAA SanctSound Initiative.

**Geological characterization**

**Comment:** NOAA should conduct more geological characterization of Davidson Seamount.

**Response:** NOAA believes extensive geological characterization of Davidson Seamount has already been done, and continues to be done by sanctuary partners, specifically the Monterey Bay Aquarium Research Institute. For more on deep sea studies at Davidson Seamount, please see [seamounts and banks](#) and [deep sea](#).

Seafloor mining

**Comment:** NOAA should protect Davidson Seamount from potential mining for future metals of interest, in the transition to less carbon-intensive energy transmission and sourcing.
Response: Mining the seafloor for minerals is prohibited under current MBNMS regulations (15 CFR 922.132(a)(1)), and specifically within the Davidson Seamount Management Zone (15 CFR 922.132(a)(i) and (ii)). Also, in no event may the director issue a National Marine Sanctuary permit under 15 CFR 922.48 and 922.133 or a Special Use permit under section 310 of the Act authorizing, or otherwise approve the exploration for, development, or production of minerals within the sanctuary (15 CFR 922.132(f)).

Education and Outreach

Address multilingual and underrepresented audiences

Comment: NOAA should engage underrepresented and underserved communities as partners and beneficiaries, and implement where possible multilingual materials to communicate sanctuary regulations and sanctuary programs.

Response: NOAA agrees and will build multicultural elements into existing programs and materials for education, resource protection, and research based on needs identified in the management plan. Potential elements include Spanish-language signage and exhibits, interpretive center programming, and new outreach materials. NOAA also intends to expand partnerships with organizations that primarily serve diverse populations to leverage our efforts and have greater impacts in the community. The Education, Outreach, and Communications Action Plan, Strategy EOC-2, addresses this topic.

Expansion of Blue Star program

Comment: NOAA should expand the business recognition program, Blue Star, to MBNMS.

Response: NOAA agrees and is coordinating with the national program to implement a pilot business recognition program at MBNMS similar to the Blue Star program at Florida Keys National Marine Sanctuary. The MBNMS program, as outlined in the Education, Outreach, and Communications Action Plan, Strategy EOC-5, has a focus on collaborating with local businesses and the tourism industry, e.g., dive and kayak shops and whale watch operators.

Community engagement

Comment: NOAA should engage communities in more science and stewardship programs addressing resource management issues (e.g., water quality protection and marine debris removal).

Response: NOAA is already working to increase engagement in existing citizen science programs (water quality monitoring) and ancillary programs (LiMPETS, Beach COMBERS) for greater resource protection. Community-based programs that focus on the collection of science data at the local level are likely to lead to greater issue awareness by NOAA and community members, individual action, and ultimately sustained stewardship activities that can have lasting positive impacts on the protection of coastal and ocean environments.

Comment: NOAA should collaborate with the fishing community.

Response: NOAA agrees and will continue to engage and collaborate with local fishermen on various issues of mutual interest. For example, led by MBNMS staff, local fishermen and ocean
conservation advocates collaborated on the five-year review of essential fish habitat for Pacific coast groundfish, initiated by the Pacific Fishery Management Council. The collaboration resulted in a novel approach that protected sensitive areas from trawl gear and re-opened historically trawled fishing grounds in the sanctuary. MBNMS also serves as an advisor to the California Dungeness Crab Fishing Gear Working Group to reduce whale entanglement while supporting important set-gear fisheries. Both commercial and recreational fishing seats are represented on the MBNMS Sanctuary Advisory Council.

**Visitor center**

**Comment:** NOAA should support establishing a sanctuary visitor center on the Monterey Peninsula.

**Response:** NOAA is interested in supporting numerous ways to reach new audiences throughout areas adjacent to the sanctuary, and will assess opportunities for increased exhibits, outdoor signage, and additional facilities with partners as they arise.

**Climate outreach**

**Comment:** NOAA should include actions that individuals can take to help mitigate and prevent the effects of changing ocean conditions.

**Response:** NOAA agrees, and will conduct outreach with climate messaging from NOAA’s [Ocean and Climate Literacy framework](https://www.oceanservice.noaa.gov/funding/education funds/ocean literacy/framework.html). This framework will serve to guide education and outreach messages so individuals can make informed and responsible decisions regarding the ocean and the climate.

**Emerging Issues**

**Issue prioritization criteria**

**Comment:** NOAA should clarify how issues are prioritized in the Emerging Issues Action Plan.

**Response:** The process and criteria for prioritizing emerging issues were outlined during this management plan review and the action plan vetted with the advisory council for MBNMS. Strategy EI-2 of the action plan outlines the process and criteria NOAA staff will utilize to assess an emerging issue, assign an internal priority, and then present it to the Sanctuary Advisory Council for further advice. The public, advisory council members, and sanctuary staff raise initial awareness of emerging issues within the sanctuary.

**Nomination of Chumash Heritage NMS**

**Comment:** As NOAA has not designated the nominated Chumash Heritage National Marine Sanctuary, NOAA should add boundary expansion south of MBNMS to the Emerging Issues Action Plan.

**Response:** The nominated Chumash Heritage National Marine Sanctuary (CHNMS), located between MBNMS and CINMS, is currently on NOAA’s inventory of nominations that one day may move forward for designation. After a review of the CHNMS nomination, NOAA has concluded the nomination remains relevant and responsive to the 11 sanctuary nomination criteria and has maintained the nomination on the inventory for an [additional five years](https://www.noaa.gov/press-release/department-announces-extension-of-chumash-heritage-national-marine-sanctuary), until
October 5, 2025. One option NOAA could consider in the future is whether or not the MBNMS boundaries should be shifted to protect some of or all of the area nominated for CHNMS.

**Introduced Species**

**Aquaculture**

**Comment:** NOAA should develop a regional plan for aquaculture that supports conservation goals and minimizes deleterious effects, such as habitat destruction or introduction of non-native species.

**Response:** NOAA has developed a national program for Aquaculture Areas of Opportunity, which was launched in 2020. NOAA will use a combination of scientific analysis and public engagement to identify areas on a regional basis that are environmentally, socially, and economically appropriate for commercial aquaculture.

**Limit introduced species aquaculture**

**Comment:** NOAA should not allow aquaculture of introduced species.

**Response:** NOAA agrees with the premise of this comment, with the exception of the aquaculture of certain introduced species deemed non-invasive and ecologically harmless by NOAA and the state of California and authorized by both authorities for use in specified commercial shellfish aquaculture activities. In addition, it is prohibited to introduce or release introduced species into MBNMS, except striped bass (*Morone saxatilis*) that are released during catch and release fishing activity (922.132(a)(12)).

**Actions attracting non-native species**

**Comment:** NOAA should minimize the addition of hard substrates in Elkhorn Slough, and, when necessary, ensure these additions preclude colonization by non-native species, to the extent practicable.

**Response:** NOAA agrees, and the Introduced Species Action Plan, Strategy IS-1, addresses this issue.

**Marine Debris**

**Beach litter, seabirds, and enforcement**

**Comment:** NOAA should address increasing marine debris to reduce impacts to habitats and wildlife.

**Response:** NOAA agrees. The Marine Debris Action Plan focuses on reducing marine debris, especially plastic pollution, through preventions, education and outreach programs, and active removal efforts. NOAA has updated the Marine Debris Action Plan, Activity 3.3 to work with state partners to increase outreach efforts to pier fishermen and install monofilament and hook receptacles on piers. NOAA added activities in the Resource Protection Action Plan to implement enforcement programs to increase effective surveillance and enforcement activities to ensure protection of sanctuary resources.
Pollution prevention, agricultural debris, and Clean Seas

Comment: NOAA should encourage innovation regarding marine debris from a variety of sources, including agriculture, assist more with cleanups, and consider adopting the Clean Seas program, not just focus on prevention.

Response: Prevention programs are key to reducing the streams of plastic pollution and NOAA will continue to coordinate and collaborate with stakeholders in the agricultural community to prevent or reduce discharge of marine debris into waterways leading to MBNMS and to develop public outreach on best practices to avoid marine debris in sanctuary waters. NOAA will explore adapting the Clean Seas program for adoption in MBNMS, and will continue to incorporate plastic pollution information, including impacts on sanctuary wildlife and action-based solutions, into existing education and outreach programs.

Recycling operations

Comment: NOAA, MBNMS, and their advisory council should lobby the state legislature to stop depending on overseas recycling, as too much is getting into the ocean. There needs to be acknowledgment of the land-sea connection and creation of better recycling operations on land.

Response: NOAA agrees it is important to acknowledge the land-sea connection and identify better alternatives to keep debris out of the ocean. NOAA is prohibited from lobbying legislatures, but addresses marine debris in their scope of influence via several activities and tactics within the Marine Debris and the Water Quality Protection Program action plans.

Maritime Heritage

Public engagement

Comment: NOAA received one comment that maritime heritage is a great way to get people interested in marine resources and what marine sanctuaries protect.

Response: NOAA agrees. ONMS is committed to preserving historical, cultural, and archaeological resources, and seeks to increase public awareness of America’s maritime heritage. Researching and cataloguing maritime heritage resources is an important task for maritime historians and resource managers and is outlined in the Maritime Heritage Action Plan.

Motorized Personal Watercraft

Research uses

Comment: NOAA should use MPWCs to deploy sensors and other technologies.

Response: ONMS has issued multiple research permits to local research institutions to use Motorized Personal Watercraft (MPWC) to study the sanctuary. For example, the U.S. Geological Survey uses MPWC with specialized sensors to conduct bathymetric surveys to measure coastal morphology and change.
Opposition to MPWCs, closure of Pillar Point Zone

Comment: NOAA received a variety of comments regarding MPWCs, including recommendations to prohibit MPWC operation throughout MBNMS; close the year-round MPWC operating zone at Pillar Point due to low use by MPWC; prohibit MPWC operations in nearshore areas; and implement NOAA’s planned assessment of MPWC zone use.

Response: NOAA is not closing any of the five existing zones where MPWC are allowed to operate within the sanctuary. However, Strategy RP-15 in the final management plan includes assessing MPWC use levels and impacts within the MPWC zones, as well as an evaluation of the relevance of the zones in meeting their originally intended purposes. The MPWC zones were originally sited seaward of nearshore resources, such as kelp forests and rocky reefs, to minimize negative impacts to coastal wildlife and habitats. Thus, MPWC are already excluded from nearshore areas of the sanctuary, except as permitted by NOAA or approved for public safety agency training and search and rescue operations.

Offshore Wind Energy

Opposition to wind farms

Comment: NOAA received comments stating offshore wind energy development is not compatible with the purposes of MBNMS and should engage fishermen in any process discussions as wind farms will affect them directly.

Response: NOAA recognizes the implications of climate change and the need to move toward more sustainable energy sources. National marine sanctuaries also have a mandate to balance conservation and human use, as compatible with resource protection. There are currently no offshore tracts for lease within MBNMS, as the Bureau of Ocean Energy Management is restricted from issuing renewable energy leases within a national marine sanctuary. NOAA is assessing the potential impacts to resources and the socioeconomics posed by offshore wind energy development. Any consideration regarding offshore wind energy development in the sanctuary would involve an extensive public process and stakeholder engagement. BOEM and various state agencies are the leads for current proposals for offshore wind development adjacent to MBNMS.

Research and Monitoring

Share data needs, efforts utilizing new technologies

Comment: NOAA should open a dialogue with partners to share data needs and information on characterization efforts utilizing new technologies (e.g., environmental DNA (eDNA)), to understand and protect biodiversity.

Response: NOAA agrees and, as outlined in the Research and Monitoring Action Plan, MBNMS staff will continue to seek advice from its many science partners, such as the members of the Research Activity Panel of the advisory council of MBNMS or the Marine Biodiversity Observation Network.
**Whale and sea turtle research**

**Comment:** NOAA should facilitate research to better understand whale and sea turtle health, behavior, and population dynamics.

**Response:** NOAA agrees and addresses this need through the Wildlife Disturbance and Research and Monitoring plans.

**Kelp forest restoration**

**Comment:** NOAA should manage urchin populations with the goal of enhancing native kelp forests.

**Response:** NOAA does not manage urchin populations, but does coordinate with the California Department of Fish and Wildlife, which has such authority. NOAA will continue to collaborate with the efforts of interested stakeholders, state agencies, academics, divers, fishermen, and non-profits to conserve and restore native kelp forests. Further, national marine sanctuaries on the West Coast are working closely together and with various partners, including the state of California, regarding many avenues to study and ultimately restore kelp forests, which can include removal of hyper-abundant populations of grazers like urchins. The Research and Monitoring Action Plan addresses monitoring and collaborations to support science focused on sanctuary needs.

**Funding**

**Comment:** NOAA received a comment stating MBNMS needs more funding to accomplish management plan goals and should invest as much as it can in science if it aims to make a difference.

**Response:** NOAA recognizes resource limitations and how they may affect sanctuary research and other management plan activities. NOAA will continue to evaluate future resource needs of all sanctuaries in its formulation of budget requests. NOAA ONMS will continue to utilize agency assets and resources (e.g., ship time, internal funding opportunities), as well as partner on external opportunities. NOAA will continue collaborative research and monitoring efforts with the 50+ research institutions in the region to study resource conservation questions.

**Resource Protection**

**Sanctuary Ecologically Significant Areas (SESAs)**

**Comment:** NOAA should not make Sanctuary Ecologically Significant Areas (SESAs) into regulated marine protected areas.

**Response:** NOAA is not planning to implement additional regulated zones in the sanctuary. SESAs are areas that encompass remarkable, representative, and/or sensitive marine habitats, communities, and ecological processes. SESAs are focal areas for facilitating research with partners in order to better understand natural and human-caused variation, as well as resource protection.
Sanctuary Management and Administration

*Balancing resource protection and multiple use*

**Comment:** NOAA should ensure that the management plan balances resource protection and multiple uses of the sanctuary.

**Response:** NOAA agrees with this statement. The NMSA states in Sec.301(b) (16 U.S.C.1431(b)): “The purposes and policies of this chapter are... (6) to facilitate to the extent compatible with the primary objective of resource protection, all public and private uses of the resources of these marine areas not prohibited pursuant to other authorities.” NOAA engages directly with many coastal and ocean-based businesses (e.g., recreational and tourism purveyors, and fishermen) to promote sustainable ocean uses and to develop best practices to reduce potential impacts to sanctuary resources, which both supports local business and benefits the sanctuary.

**Advisory council**

**Comment:** NOAA should separate MBNMS management and the operations of the Sanctuary Advisory Council by establishing the advisory council under a local joint powers authority (JPA) to allow for a more open and inclusive process for representation in the SAC with more representation of local governments.

**Response:** Section 315 of the National Marine Sanctuaries Act (NMSA; 16 U.S.C. 1445(a)) describes the responsibilities of sanctuary advisory councils. Similar suggestions to this comment have been received before and NOAA has studied them and decided to leave the organizational arrangement for the advisory council as constructed. As outlined in the 2008 Final Environmental Impact Statement’s Response to Comments (pg 7-45), the advisory council’s 20 voting members represent a variety of local user groups, as well as the general public, plus seven local and state governmental jurisdictions. The Association of Monterey Bay Area Governments (AMBAG) currently appoints three members from local governments to serve on the advisory council for MBNMS; the primary and both alternate seats are invited to participate in council meetings. All other elected officials are invited to participate in council meetings as well. Multiple opportunities for involvement by government officials exist at Sanctuary Advisory Council meetings.

**Water Quality**

*Total Maximum Daily Load (TMDL) studies*

**Comment:** NOAA should outline how it will be involved in various TMDLs in MBNMS watersheds, including the current nutrient/biostimulation TMDL in Elkhorn Slough.

**Response:** NOAA agrees with this comment and has added an activity in the Water Quality Action Plan, to include review of TMDLs when resources permit. With many TMDL studies throughout the sanctuary watershed though, the activity does not specifically mention the Elkhorn Slough TMDL study.
**Agricultural pesticides**

**Comment:** NOAA should better characterize agricultural pesticide effects on sanctuary resources in Elkhorn Slough.

**Response:** Strategy WQPP-2 of the Water Quality Protection Program Action Plan addresses pollutants. While the strategy does not call out pesticides specifically, they are a known classification of pollutants of concern flowing from agriculturally dominated watersheds. The need to improve the research community’s understanding of agriculture pesticide effects on sanctuary resources in Elkhorn Slough will be added to the list of research questions.

**Mercury and polychlorinated biphenyls (PCBs) in marine life**

**Comment:** NOAA received a comment that there should be some mention made of mercury and PCBs in mussels, fish, and marine mammals in Monterey Bay and elsewhere in MBNMS.

**Response:** NOAA agrees with this comment, as it relates to ocean water quality, and a paragraph was added to the Introduction of the Water Quality Protection Program Action Plan describing the Central Coast Long-term Environmental Assessment Network (CCLEAN) monitoring program and the general condition of the Monterey Bay related to persistent organic pollutants in water, sediment, and muscle tissue samples.

**Wildlife Disturbance**

**Large numbers of beach goers, enforcement**

**Comment:** NOAA should address impacts of large numbers of beach goers on wildlife and provide greater enforcement efforts to protect sensitive coastal wildlife from human disturbance.

**Response:** NOAA is working closely with NOAA’s Office of Law Enforcement and other enforcement partners to respond to reported incidents regarding beach visitors disturbing coastal wildlife. The Wildlife Disturbance Action Plan, Strategy WD-6, includes three law enforcement activities to help ensure public compliance with wildlife protection regulations by MBNMS and others (15 CFR 922.131(a)(5)). Several activities in Strategy WD-1 will help address wildlife disturbance issues along the coastal recreational trail in Pacific Grove specifically. A key relevant activity is expansion of the Bay Net (land-based) and Team OCEAN (ocean-based) docent programs to the maximum extent possible to establish regular field presence at existing and additional sites where public/wildlife interactions occur. The docents are trained to promote respectful wildlife viewing with coastal visitors, thereby protecting marine mammals and other wildlife from disturbance.

**Kayak/paddleboard outreach, labeling of kayaks**

**Comment:** NOAA should address kayaker disturbance of wildlife by increasing outreach to kayakers and paddle boarders who are landing at marine mammal haulout and rookery beaches; install signage or buoys to keep kayakers away from marine mammals and birds; and require kayak rental companies to label their boats with company name and identifying numbers to aid enforcement whenever renters disturb or harass wildlife.
Response: NOAA will implement Wildlife Disturbance Action Plan Strategy WD-1 to enhance outreach to kayakers regarding responsible wildlife viewing and approach. NOAA has collaborated with kayak vendors and local jurisdictions to develop best management practices for reduced wildlife disturbance by kayak renters. Strategy WD-6 includes three law enforcement activities to help ensure public compliance with MBNMS wildlife protection regulations, including compliance by kayakers.

Overflight zones

Comment: NOAA should establish a new NOAA Regulated Overflight Zone (NROZ) over coastal waters from Santa Cruz to Yankee Point to protect wildlife from aerial disturbance.

Response: At this time, NOAA does not believe such a zone is warranted. The four NROZs within MBNMS span large portions of the sanctuary coastline to the seaward limit of state waters (3 nautical miles offshore) from Pescadero Point in the north to the sanctuary’s southern boundary in Cambria. Due to long-established aircraft approach and departure vectors over the ocean from airports at Watsonville, Marina, and Monterey, establishing NROZ boundaries over such waters would be impractical and would conflict with airspace management and safety requirements of the Federal Aviation Administration.

Fireworks

Comment: NOAA received one comment indicating fireworks are not only disturbing to wildlife, especially harbor seals, but also polluting the waters and coastal habitat.

Response: Section 310 of the National Marine Sanctuaries Act (16 U.S.C. § 1441; NMSA) allows the Secretary of Commerce, delegated to the Office of National Marine Sanctuaries, to issue special use permits to authorize the conduct of specific activities in a sanctuary, including firework displays. MBNMS authorizes U.S. Coast Guard Marine Event Permits for firework displays and adds special terms and conditions in the authorization to mitigate wildlife disturbance and discharge of debris into MBNMS. Mitigations include a before and after survey of wildlife within 0.5 miles of the detonation location, a cleanup requirement, and adherence to best practices. MBNMS has also been issued a Letter of Authorization (LOA) by NMFS to issue a small number of permits for firework events that may potentially disturb harbor seals and California sea lions incidental to commercial firework displays within the sanctuary since 2005. The LOA also includes mitigations, including prohibiting firework displays between March 1 and June 30th and limiting the frequency and duration of displays. All firework display authorization holders in MBNMS have been encouraged to explore other options, such as drone shows over land and silent fireworks.

Drone activities

Comment: NOAA should increase signage about drone (i.e., unmanned aerial systems (UAS)) use restrictions; develop a new activity within Wildlife Disturbance Action Plan to establish and enforce guidelines for drone use within the sanctuary; and support the use of drones within MBNMS for research purposes.

Response: The Wildlife Disturbance Action Plan, Strategy WD-2, includes consideration of signage as one of several outreach methods for addressing wildlife disturbance by UAS.
However, since UAS can be launched from virtually any location, signage must be strategically placed for optimal effect and requires close coordination with local authorities and landowners. Furthermore, the Wildlife Disturbance Action Plan describes additional activities aimed at reducing wildlife disturbance by UAS. NOAA agrees that UAS can serve as an effective tool for marine research and has issued numerous research permits authorizing drone operation requests within NOAA Regulated Overflight Zones.

**Marine mammal harassment**

**Comment:** NOAA should develop activities specifically addressing wildlife disturbance threats from MPWC, UAS (aerial drones), and whale-watch charter vessels, and should also develop a specific activity for protecting marine mammals from human harassment.

**Response:** Strategies WD-1 and WD-2 of the Wildlife Disturbance Action Plan address disturbance from marine vessels, shore-based activities, and aircraft, including UAS. One activity includes an assessment of boater compliance (both commercial and non-commercial) with whale approach guidelines and potential regulatory action, should voluntary compliance prove insufficient to reduce disturbance. This action plan aims to reduce wildlife disturbance and provide added protection for marine mammals and seabirds.

**Seal bombs, fishermen engagement**

**Comment:** NOAA should sit down with fishermen using an informal approach regarding concerns about seal bombs. Seal bombs are a legal deterrent to protect seals and sea lions.

**Response:** NOAA agrees with this recommendation, and will assess ancillary impacts from seal bombs through the Research and Monitoring Plan and the associated NOAA SanctSound Initiative.

**Sea lions exceeding carrying capacity**

**Comment:** NOAA received one comment expressing concern about the sea lion population exceeding carrying capacity as it could affect the health of the California Current ecosystem.

**Response:** NOAA ONMS does not have authority to regulate sea lion populations. NOAA’s National Marine Fisheries Service manages marine mammals under the Marine Mammal Protection Act, including pinnipeds (sea lions). Sea lion populations naturally fluctuate depending on changes in ocean conditions, which impact the location and abundance of fish species, upon which they forage.

**Shell collection**

**Comment:** NOAA should enforce violations of shell collecting and harvesting.

**Response:** MBNMS regulations do not prohibit the taking of shells from the sanctuary. However, state and local laws and ordinances prohibit and enforce shell collection and harvesting in certain areas. MBNMS is not taking action at this time, as intertidal monitoring does not show any current impacts related to shell collection.
Wildlife Entanglement

Solutions to prevent whale and turtle mortality from entanglement

Comment: NOAA received a number of comments regarding the urgency to rescue and protect whales and sea turtles from entanglement in fishing gear, and a request for a new regulation related to entanglement.

Response: NOAA recognizes the importance of reducing whale and sea turtle mortality and will continue working with fishermen, state agencies, and nonprofit organizations to protect whales and sea turtles from entanglement. MBNMS considers whale entanglement a priority resource management issue. MBNMS collaborates with the state of California, the NOAA West Coast Entangled Whale Response Network, the NMFS Marine Mammal Stranding Network, and the National Marine Sanctuary Foundation to ensure responders are equipped with the latest tracking technology and equipment to launch effective missions to rescue whales within the sanctuary. MBNMS also serves on the California Dungeness Crab Fishing Gear Working Group to advise and provide whale data for risk assessment purposes, as the state and working group consider fishery management measures to reduce entanglement risks to whales and sea turtles.

Ropeless fishing gear

Comment: NOAA should support collaborative pilot projects to test ropeless and pop-up fishing gear for commercial and recreational users and research uses, and NOAA needs to listen to fishermen on their concerns with ropeless crab pots.

Response: NOAA agrees and is committed to participating in collaborative testing of ropeless fishing gear with the state of California, fishermen, and other partners, such as the National Marine Sanctuary Foundation.

Ship Strikes

Vessel Speed Reduction Incentive programs, propeller shrouds

Comment: NOAA should continue and expand work on Vessel Speed Reduction Incentive programs to reduce ship strikes and support more studies on the issue; consider the issue of smaller boats with otter and seal/sea lion strikes; and look into the use of propeller shrouds to protect whales and other marine mammals from further harm when ship strikes happen.

Response: NOAA agrees and these topics are addressed in Resource Protection Action Plan, Strategy RP-1. MBNMS staff will continue to coordinate with Channel Islands, Greater Farallones, and Cordell Bank national marine sanctuaries on joint efforts to reduce the risk of ship strikes to large whales, which includes developing risk assessments and studies. Sanctuary staff work with many partners including USCG, NMFS, and the maritime industry to implement vessel speed reduction programs and evaluate the location of vessel traffic lanes for large vessels entering and existing ports. Small boat strikes of other species of marine mammals have not been reported as an issue to date, so requesting use of propeller shrouds would require more data.
Appendix B: Outline of Final Management Plan

**Issue Based Action Plans**

**Climate Change Strategies**
- Strategy CC-1: Address coastal resilience and adaptation planning
- Strategy CC-2: Reduce greenhouse gas emissions
- Strategy CC-3: Communicate ocean-climate impacts and solutions
- Strategy CC-4: Implement Coastal Regional Sediment Management Plans (CRSMP)
- Strategy CC-5: Track and share ocean acidification research

**Coastal Erosion and Sediment Management Strategies**
- Strategy CESM-1: Support progress on Coastal Regional Sediment Management Plans (CRSMPs) for MBNMS
- Strategy CESM-2: Collaborate on land management plan for CEMEX site
- Strategy CESM-3: Reduce the loss of Elkhorn Slough habitat
- Strategy CESM-4: Implement site-specific habitat protection or restoration projects
- Strategy CESM-5: Coordinate with regulatory agencies to determine appropriate disposal of dredge material
- Strategy CESM-6: Track and reduce coastal armoring
- Strategy CESM-7: Reduce impacts to sanctuary resources due to landslides and subsequent emergency responses
- Strategy CESM-8: Reduce impacts to sanctuary resources due to anthropogenic coastal changes to river mouths

**Davidson Seamount Strategies**
- Strategy DS-1: Conduct site characterization
- Strategy DS-2: Conduct ecological processes investigations
- Strategy DS-3: Conduct seamount education and outreach initiatives

**Emerging Issues Strategies**
- Strategy EI-1: Identify and track emerging issues
- Strategy EI-2: Utilize a defined process to address emerging issues

**Introduced Species Strategies**
- Strategy IS-1: Manage pathways and promote prevention
- Strategy IS-2: Promote early detection and rapid response
- Strategy IS-3: Implement eradication or control
- Strategy IS-4: Sustain research and monitoring
- Strategy IS-5: Implement restoration
- Strategy IS-6: Implementation in Elkhorn Slough
Marine Debris Strategies

- Strategy MD-1: Assess scope and scale of marine debris
- Strategy MD-2: Foster public participation and support policies leading to reduced marine debris (focus on plastic pollution)
- Strategy MD-3: Reduce marine debris threats by removing the debris and preventing point source inputs
- Strategy MD-4: Monitor and assess golf ball deposition and remediation efforts associated with area golf courses

Water Quality Protection Program Strategies

- Strategy WQ-1: Facilitate and coordinate regional efforts to improve water quality through the Water Quality Protection Program Committee (and MOA), Agriculture Water Quality Alliance (AWQA), stormwater programs and Integrated Regional Water Management programs
- Strategy WQ-2: Understand the land-sea connection
- Strategy WQ-3: Quantify effectiveness of management practices
- Strategy WQ-4: Monitor and reduce pollutant loads flowing into MBNMS
- Strategy WQ-5: Promote public engagement and stewardship through citizen science monitoring programs and other WQPP efforts
- Strategy WQ-6: Communicate findings of projects and monitoring conducted by the WQPP

Wildlife Disturbance Strategies

- Strategy WD-1: Mitigate wildlife disturbance from marine vessels and shore-based activities
- Strategy WD-2: Mitigate wildlife disturbance from aircraft
- Strategy WD-3: Develop acoustic baseline profiles within MBNMS
- Strategy WD-4: Reduce underwater low-frequency mechanical sound emissions
- Strategy WD-5: Use administrative methods to reduce wildlife disturbance
- Strategy WD-6: Use law enforcement resources to reduce wildlife disturbance
- Strategy WD-7: Reduce the risk of wildlife entanglement in fishing gear
- Strategy WD-8: Respond to wildlife entangled in fishing gear

Program Based Action Plans

Education, Outreach, and Communication Strategies

- Strategy EO-1: Coordinate education programs through sanctuary visitor centers
- Strategy EO-2: Enhance sanctuary interpretation and outreach programs
- Strategy EO-3: Promote public engagement and stewardship through citizen science monitoring programs
- Strategy EO-4: Maintain and develop sanctuary-wide exhibits and interpretive signage
- Strategy EO-5: Foster and promote government and community relations
• Strategy EO-6: Increase awareness of the sanctuary through effective media and communication tools
• Strategy EO-7: Engage in local, regional, and national collaborations to leverage education and outreach opportunities
• Strategy EO-8: Evaluate effectiveness of sanctuary education and outreach efforts

**Maritime Heritage Strategies**

• Strategy MH-1: Inventory and assess submerged sites
• Strategy MH-2: Threat assessment for shipwrecks and submerged structures
• Strategy MH-3: Protect and manage submerged archaeological resources
• Strategy MH-4: Develop maritime cultural landscape-focused education and outreach programs

**Operations and Administration Strategies**

• Strategy OA-1: Management of MBNMS budget
• Strategy OA-2: Support management plan priorities
• Strategy OA-3: Coordinate and support Sanctuary Advisory Council
• Strategy OA-4: Support staff and facilities
• Strategy OA-5: Facilitate field operations
• Strategy OA-6: Support diversity, equity, and inclusion

**Research and Monitoring Strategies**

• Strategy RM-1: Characterize biological and physical features in MBNMS
• Strategy RM-2: Maintain and expand the Sanctuary Integrated Monitoring Network (SIMoN)
• Strategy RM-3: Support science focused on priority sanctuary needs
• Strategy RM-4: Facilitate the flow of science information among academic institutions, government agencies, and other institutions
• Strategy RM-5: Coordinate with and participate in implementing research components of the Office of National Marine Sanctuaries West Coast Regional Office
• Strategy RM-6: Coordinate with and participate in implementing policies of the Office of National Marine Sanctuaries Conservation Science Program
• Strategy RM-7: Interpret select technical science information

**Resource Protection Strategies**

• Strategy RP-1: Continue to build partnerships and leverage opportunities for protecting sanctuary wildlife, habitats, qualities, and cultural resources through collaborative planning and management
• Strategy RP-2: Enhance socioeconomic program through collaboration with ONMS Headquarters socioeconomic team.
• Strategy RP-3: Maintain and enhance permitting and environmental review program
• Strategy RP-4: Review projects, plans, and permits of other agencies
• Strategy RP-5: Implement enforcement programs
● Strategy RP-6: Interpret and distribute resource protection information
● Strategy RP-7: Coordinate resource protection programs including interpretive enforcement and citizen science programs
● Strategy RP-8: Coordinate with and participate in implementing resource protection components of the Office of National Marine Sanctuaries West Coast Regional Office
● Strategy RP-9: Coordinate with and participate in implementing policies and programs of the Office of National Marine Sanctuaries
● Strategy RP-10: Review and revise the sanctuary’s spill response plan and emergency response information
● Strategy RP-11: Develop and implement restoration and recovery plans to address habitat damages and endangered species
● Strategy RP-12: Implement sanctuary ecologically significant areas (SESAs)
● Strategy RP-13: Track and monitor vessel traffic compliance
● Strategy RP-14: Collaborate on fishery management issues
● Strategy RP-15: Assess motorized personal watercraft (MPWC) zones
● Strategy RP-16: Coordinate regionally, nationally and internationally on marine protected areas
● Strategy RP-17: Maintain aircraft overflight zones
● Strategy RP-18: Track and respond to offshore wind and wave energy proposals
● Strategy RP-19: Initiate assessment for the use of artificial reefs for recreation, restoration, or other uses in MBNMS
Appendix C:
ONMS Best Management Practices for Field Activities

All ONMS vessels must comply with the operational protocols and procedures in the NOAA Small Boats Policy (NAO 209-125). In addition, the following best management practices are used as applicable during ONMS-related field activities:

Lookouts/Staying at the Helm

- While underway, vessel operators should always stay alert for marine mammals, sea turtles, and other collision hazards.
- While transiting in areas where marine mammals and sea turtles are likely to occur, vessel operators should post a minimum of one dedicated lookout and operators should remain vigilant at the helm controls (keeping hands on the wheel and throttle at all times) and be ready to take action immediately to avoid an animal in their path.
- When operating in areas where marine mammals and sea turtles are present, a dedicated lookout is required in addition to the operator. A second lookout may be posted in circumstances where visibility is restricted.
- When marine mammals are riding the bow wake, or porpoising nearby, operators should exercise caution and take actions that avoid possible contact or collisions.
- When operating within visual range of whales, vessel operators should follow NOAA National Marine Fisheries Service (NMFS) Whale Watching guidelines unless otherwise covered by a NMFS permit, and only then with extreme caution.

Vessel Speed

- All vessels must reduce to prudent speed when marine mammals and sea turtles are visible within 1 nautical mile (nm) of the vessel and should not exceed 10 knots.

Maintaining Distance

- Once large whales are sighted, vessel operators should stay at least 100 yards away, 200 yards away from killer whales and 50 yards away from sea turtles.
- If large whales surface within 100 yards, vessel operators should stop immediately and use prudent seamanship to decide to either move away slowly or wait for the animal to move away on its own.
- In the case of northern right whales, a distance of at least 500 yards should be maintained per NMFS regulations.

Towing Divers

- Divers will be towed at approximately 3 knots.

Operation of Vessels during Daylight Hours

- Due to the increased risk of collision at night, vessel operations, whenever possible, should be planned for daylight hours (i.e., between ½ hour before sunrise and ½ hour after sunset when possible).
• Restricted visibility can hinder an operator's ability to see and respond to marine mammals and sea turtles. Prudent seamanship should be applied, including posting an additional lookout when there is the potential for marine animals in the vicinity.

**Operation of Vessels during Night Hours**

• Standing Order for Nighttime Operations – If night time operations are essential and integral to the mission, the principal investigator must discuss mitigations for avoiding whales and other objects within the vessel operation corridor and incorporate them into the cruise plan. Mitigation measures could include: speed restrictions, additional lookouts, use of navigation lights, and use of sound signals, etc.

**Standing Order for Operations around Marine Mammals**

• This order requires several precautionary measures such as: incorporating whale sighting information in cruise planning, slowing to 10 knots, in a Seasonal or Dynamic Management Area, following the Whale Watching Guidelines, maintaining a constant lookout for whales, and following specific procedures if a whale is struck.

**Anchoring and Deployment of Instruments**

• In the West Coast region, anchoring will be limited to sandy-bottom substrates to avoid damage to seagrasses and coral habitat.
• In the West Coast region, sargassum interaction is limited, as much as is reasonably feasible, to prevent impact on sea turtle hatchling habitat.
• In general, instruments are deployed and lowered onto sandy substrate whenever possible; deployment of instruments occurs slowly and under constant supervision to minimize risk and mitigate impacts if a collision or entanglement occurs; and while vehicles or personnel are deployed, spotters monitor the activities at all times.

**Safety**

• Safety Briefings: All ONMS vessel captains include safety information during pre-cruise briefings for staff and volunteers.
• All divers working on ONMS vessels are diver-certified.
Appendix D:
Consultation Documents and Protected Species List

For the purposes of this analysis, protected species include:

- Marine and terrestrial species believed to be present in the action area that are listed or proposed or are candidate species for listing as Threatened or Endangered by the U.S. Fish and Wildlife Service (USFWS) or National Marine Fisheries Service (NMFS) pursuant to the Endangered Species Act (ESA);
- Marine species believed to be present in the action area that are listed as Rare, Threatened, or Endangered by California Department of Fish and Wildlife (CDFW) pursuant to the California Endangered Species Act (CESA) that are protected by MBNMS regulations (i.e., white shark);
- Marine species believed to be present in the action area that are protected under the Marine Mammal Protection Act (MMPA).

**ESA-Listed Species under USFWS Jurisdiction**

ONMS identified 5 ESA-listed species under USFWS jurisdiction that are found in the project action area and could be affected by the proposed action. These species are: southern sea otter, California red-legged frog, marbled murrelet, tidewater goby and western snowy plover.

ONMS does not believe the following ESA-listed species or designated critical habitat occur in the action area or that MBNMS activities would affect these species because the majority of MBNMS activities would occur in marine environments or at a few onshore locations outside of the habitat and range of these terrestrial species: giant kangaroo rat, salt marsh harvest mouse, San Joaquin kit fox, Least Bell’s vireo, northern spotted owl, southwestern willow flycatcher, yellow-billed cuckoo, blunt-nosed leopard lizard, San Francisco garter snake, California tiger salamander, Santa Cruz long-toed salamander, delta smelt, Kern primrose sphinx moth, mission blue butterfly, Myrtle’s silverspot butterfly, ohlone tiger beetle, San Bruno elfin butterfly, Smith’s blue butterfly, Zayante band-winged grasshopper, vernal pool fairy shrimp, beach layia, Ben Lomond spineflower, Ben Lomond wallflower, California jewelflower, Chorro Creek bog thistle, clover lupine, coastal dunes milk-vetch, Contra Costa goldfields, Hickman’s potentilla, Marin dwarf-flax, marsh sandwort, Menzies’ wallflower, Monterey clover, Monterey gilia, Monterey spineflower, salt marsh bird’s-beak, San Mateo woolly sunflower, Santa Cruz tarplant, Scotts Valley polygonon, Scotts Valley spineflower, showy indian clover, spreading navarretia, white-rayed pentachaeota, Yadon’s piperia, Gowen cypress, Santa Cruz cypress. In addition, we removed the green sea turtle, California condor, California least tern, short tailed albatross, and the California clapper rail based on our consultation with USFWS.

The species lists obtained through the USFWS IPaC website from the Sacramento and Ventura Fish and Wildlife Offices are provided below.

**ESA-Listed Species under NMFS Jurisdiction**

ONMS identified 23 ESA-listed species (or distinct population segment (DPS)/evolutionarily significant unit (ESU)) under NMFS jurisdiction that are found in the project action area and
could be affected by the proposed action. These species are: black abalone, Sacramento River winter-run chinook salmon, Central Valley spring-run chinook salmon, California coastal chinook salmon, Central California coast coho salmon, Central California coast steelhead, South Central California coast steelhead, North American green sturgeon southern DPS, longfin smelt, tidewater goby, eulachon, leatherback sea turtle, green sea turtle, loggerhead sea turtle, olive ridley sea turtle, Guadalupe fur seal, blue whale, humpback whale, fin whale, sperm whale, killer whale, North Pacific right whale, Western North Pacific gray whale, and sei whale.

ONMS does not believe the following species or DPS/ESU occur in the action area or that MBNMS activities would affect these species: white abalone, Puget Sound DPSs of bocaccio and yelloweye rockfish, Eastern Pacific DPS of scalloped hammerhead shark, and Gulf grouper. In addition, ONMS determined that the following DPSs or ESUs of West Coast salmon and steelhead do not occur in the action area: Hood Canal summer-run chum salmon, Ozette Lake sockeye salmon, Puget Sound chinook salmon, Puget Sound steelhead, Middle Columbia River steelhead, Snake River fall-run chinook salmon, Snake River spring / summer-run chinook salmon, Snake River sockeye salmon, Snake River steelhead, Upper Columbia River spring-run chinook salmon, Upper Columbia River steelhead, Columbia River chum salmon, Lower Columbia River chinook salmon, Lower Columbia River coho salmon, Lower Columbia River steelhead, Upper Willamette River chinook salmon, Upper Willamette River steelhead, Oregon Coast coho salmon, Southern OR / Northern CA Coasts coho salmon, Northern California steelhead, California Central Valley steelhead, and Southern California steelhead.

**Protected Species Table**

*Table D1* provides a list of the protected species known or likely to occur in the action area, the species listing status, habitat requirements, regional occurrence and potential to occur in the MBNMS action area.
### Table D1. List of Protected Species in the Action Area

<table>
<thead>
<tr>
<th>Common Name</th>
<th>Listing Status</th>
<th>Habitat Requirements</th>
<th>Designated Critical Habitat found in Action Area</th>
<th>Regional Occurrence</th>
<th>Potential to Occur in the Action Area</th>
<th>References</th>
</tr>
</thead>
<tbody>
<tr>
<td>Southern sea otter</td>
<td>ESA Threatened; MMPA</td>
<td>A top carnivore in its coastal range and a keystone species of the nearshore coastal zone and associated with kelp forests.</td>
<td>No</td>
<td>Year-round, Common</td>
<td>High. Otters are commonly found in the nearshore waters of Monterey Bay, along the Big Sur Coastline and in Elkhorn Slough.</td>
<td>Listing Notice: 01/14/77, 42 FR 2965</td>
</tr>
<tr>
<td>California sea lion</td>
<td>MMPA</td>
<td>Coastal waters of Monterey Bay are used for foraging with haul-out sites near Fisherman's Wharf; most abundant pinniped in MBNMS.</td>
<td>No</td>
<td>Seasonal, Common</td>
<td>High. Main haul-out sites are located up and down the coast.</td>
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</table>
| Steller sea lion  | MMPA          | Occasional visitor in fall and winter utilizing the coastal waters of Monterey Bay for foraging, usually found among the California sea lions on the Coast Guard jetty in Monterey harbor. | Yes, 3000 feet seaward of basepoint of rookery at Año Nuevo and extending 3000 feet above rookery. | Seasonal, Occasional | Low. A small population breeds on Año Nuevo Island, just north of Monterey Bay and occasional individuals transit through MBNMS waters. | Final Recovery Plan: 03/05/08, 73 FR 11872
Listing Notice: 05/05/97, 62 FR 24345
Designated Critical Habitat: 08/27/93, 58 FR 45269 |
<p>| Harbor seal       | MMPA          | Commonly observed pinniped along MBNMS coastline. Use the offshore waters of Monterey Bay for foraging and beaches for resting. Occur on offshore rocks, on sand and mudflats in estuaries and bays, and on some isolated beaches. | No                                              | Year-round, Common  | High. Residents of the study area throughout the year, occurring mainly close to shore. |                                                                           |
| Northern fur seal | MMPA Depleted | Usually come ashore in California only when debilitated, however, few individuals observed on Año Nuevo Island. Occur off of central California during winter following migration from northern breeding grounds. | No                                              | Seasonal, Rare      | Low. Usually, 18-28 km from shore in California, however, they have been observed within 5 km of Point Pinos. |                                                                           |</p>
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<tr>
<td>Northern elephant seal</td>
<td>MMPA</td>
<td>Usually observed offshore swimming and foraging and only come ashore to one of the established rookeries. Three rookeries are on mainland beaches in MBNMS at Pt. Piedras Blancas, Cape San Martin/Gorda, and Año Nuevo State Park.</td>
<td>No</td>
<td>Year-round, Common</td>
<td>Low. Northern elephant seals are widely distributed in MBNMS. They are sighted regularly over shelf, shelf-break, and slope habitats and they are also present in deep ocean habitats seaward of the 2000 m isobaths.</td>
<td></td>
</tr>
<tr>
<td>Guadalupe fur seal</td>
<td>ESA Threatened; MMPA Depleted</td>
<td>Breed along the eastern coast of Guadalupe Island, approximately 200 km west of Baja California. In addition, individuals have been sighted in the southern California Channel Islands, including two males who established territories on San Nicolas Island. Guadalupe fur seals have been reported on other southern California islands, and the Farallon Islands off northern California with increasing regularity since the 1980s and only occasional observed foraging and swimming in the waters of Monterey Bay.</td>
<td>No</td>
<td>Seasonal, Very Rare</td>
<td>Low. Not known to regularly haul out or breed in MBNMS, but occasionally individuals have been sighted in MBNMS waters or have stranded on beaches located within the study area.1 Reference: Monterey Bay National Marine Sanctuary (MBNMS), 2016a. Marine Mammals. II. Pinnipeds (seals and sea lions). <a href="http://montereybay.noaa.gov/sitecaptcha/mamm2.html">http://montereybay.noaa.gov/sitecaptcha/mamm2.html</a>. Accessed on June 15, 2016.</td>
<td>Listing Notice: 01/15/86, 50 FR 51252</td>
</tr>
<tr>
<td>Harbor porpoise</td>
<td>MMPA</td>
<td>Observed in shallow sandy bottom areas of the Monterey Bay shelf where they forage.</td>
<td>No</td>
<td>Year-round, Common</td>
<td>Moderate. The main population is located offshore Sunset Beach State Park, individuals have been reported in the nearshore waters adjacent to the former Fort Ord military base.</td>
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<tr>
<td>Risso’s dolphin</td>
<td>MMPA</td>
<td>Generally found in waters greater than 1,000m in depth and seaward of the continental shelf and slopes but have been sighted associated with squid congregations in the nearshore environment of Monterey Peninsula.</td>
<td>No</td>
<td>Year-round, Occasional</td>
<td>High. An increase in the number of Risso’s dolphins in MBNMS has occurred since 1973. They feed on squid.</td>
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</tr>
<tr>
<td>Common dolphin – long-beaked</td>
<td>MMPA</td>
<td>Found relatively close to shore swimming and foraging.</td>
<td>No</td>
<td>Year-round, Common</td>
<td>High. The common dolphin is the most abundant cetacean found in the coastal waters of California, and the abundance within MBNMS has increased in recent years.</td>
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<tr>
<td>Common dolphin – short-beaked</td>
<td>MMPA</td>
<td>A more pelagic species than the long-beaked common dolphin, they utilize Monterey Bay for foraging.3</td>
<td>No</td>
<td>Year-round, Rare</td>
<td>Low. Generally found offshore. Short-beaked common dolphins are often found in association with underwater ridges, seamounts, and continental shelves where upwelling occurs and prey is abundant.</td>
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</tr>
<tr>
<td>Dall’s porpoise</td>
<td>MMPA</td>
<td>The most pelagic of the porpoises in MBNMS, they utilize Monterey Bay for foraging.</td>
<td>No</td>
<td>Year-round, Rare</td>
<td>Low. Most frequently seen off of Point Pinos and over the Monterey Canyon</td>
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</tr>
<tr>
<td>Bottlenose dolphin</td>
<td>MMPA Depleted</td>
<td>Includes coastal and offshore populations. Both species use the waters of Monterey Bay for foraging.</td>
<td>No</td>
<td>Year-round, Common</td>
<td>Moderate. More than 45 individuals have been sighted during one recent survey. This species is now considered a resident of Monterey Bay, and is confined to within one km of shore.3</td>
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<tr>
<td>Pacific white-sided dolphin</td>
<td>MMPA</td>
<td>Commonly seen near the shelf break in the offshore waters of Monterey Bay.</td>
<td>No</td>
<td>Year-round, Common</td>
<td>Moderate. This had been the most frequently seen dolphin in Monterey Bay but has recently been replaced by the common dolphin. Occurs primarily within 15km west of Carmel Bay and within 25km southwest of Santa Cruz</td>
<td></td>
</tr>
<tr>
<td>Northern right whale dolphin</td>
<td>MMPA</td>
<td>Deep, cold temperate waters over the continental shelf and slope in offshore Monterey Bay.</td>
<td>No</td>
<td>Year-round, Rare</td>
<td>Low. Sighting patterns from aerial and shipboard surveys suggest seasonal north-south movements, with animals found primarily off California during the colder water months and shifting northward into Oregon and Washington as water temperatures increase in late spring and summer.</td>
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<tr>
<td>Minke whale</td>
<td>MMPA</td>
<td>Can be in coastal/inshore and oceanic/offshore areas of Monterey Bay.</td>
<td>No</td>
<td>Year-round, Occasional</td>
<td>Low. Occasional sightings in the nearshore waters of Monterey Bay. Sightings are usually of single individuals</td>
<td></td>
</tr>
<tr>
<td>Blue whale</td>
<td>ESA Endangered; MMPA Depleted</td>
<td>In Monterey Bay, blue whales often occur near the edges of the submarine canyon and shelf-break edges where krill tends to concentrate. Blue whales feed only on krill and are in Monterey Bay between June and October, during times of high krill abundance. Blue whales begin to migrate south during November.</td>
<td>No</td>
<td>Seasonal, Common</td>
<td>Moderate. Regularly observed in Monterey Bay but mostly in deep waters.</td>
<td>Listing Notice: 12/02/70, 35 FR 18319 Final Recovery Plan (November 2020)</td>
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<tr>
<td>Humpback whale</td>
<td>ESA Endangered; MMPA Depleted</td>
<td>Central California population of humpback whales migrates from their winter calving and mating areas off Mexico to their summer and fall feeding areas off coastal California. Humpback whales occur in Monterey Bay from late April to early December.</td>
<td>No. Proposed critical habitat for the Central American and Mexico DPSs of humpback whales include the waters of MBNMS (84 FR 54354).</td>
<td>Seasonal, Common</td>
<td>High. Observed throughout Monterey Bay. The humpback whale ESA listing final rule (81 FR 62259, September 8, 2016) established 14 distinct population segments (DPSs) with different listing statuses. The CA/OR/WA humpback whale stock primarily includes whales from the endangered Central American DPS and the threatened Mexico DPS, plus a small number of whales from the non-listed Hawaii DPS.</td>
<td>Listing Notice: 35 FR 8491 (1970) Revised Listing Notice: 09/08/16, 81 FR 62259 Recovery Plan (NMFS 1991)</td>
</tr>
<tr>
<td>Fin whale</td>
<td>ESA Endangered; MMPA Depleted</td>
<td>More common farther from shore; occasionally encountered during the summer and fall in Monterey Bay.</td>
<td>No</td>
<td>Seasonal, Occasional</td>
<td>Moderate. Fin whales found mainly farther offshore in deep waters. Most migrate from the Arctic and Antarctic feeding areas in the summer to tropical breeding and calving areas in the winter.</td>
<td>Listing Notice: 12/02/70, 35 FR 18319 Recovery Plan: 08/06/10, 75 FR 47538</td>
</tr>
<tr>
<td>Sperm whale</td>
<td>ESA Endangered; MMPA Depleted</td>
<td>Occur in many open oceans; live at the surface of the ocean but dive deeply to catch giant squid.</td>
<td>No</td>
<td>Year-round, Occasional</td>
<td>Low. Offshore mostly in deep waters.</td>
<td>Listing Notice: 12/02/70, 35 FR 18319 Recovery Plan: 12/28/10, 75 FR 81584</td>
</tr>
<tr>
<td>Eastern North Pacific gray whale</td>
<td>MMPA</td>
<td>Predominantly occur within the nearshore coastal waters of Monterey Bay. This species has been delisted under ESA but remains protected under MMPA.</td>
<td>No</td>
<td>Seasonal, Common</td>
<td>Moderate. Occurring in coastal waters during late fall-winter southward migration and again late winter to early summer during their northward migration.</td>
<td>Delisting notice: 6/16/94, 59 FR 31094</td>
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<tr>
<td>Western North Pacific gray whale</td>
<td>ESA Endangered; MMPA depleted</td>
<td>May occur within the nearshore coastal waters of Monterey Bay.</td>
<td>No</td>
<td>Rare</td>
<td>Low. Information from tagging, photo-identification, and genetic studies show that some whales identified in the WNP off Russia have been observed in the eastern North Pacific (ENP), including coastal waters of Canada, the U.S., and Mexico.</td>
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</table>
| Killer whale                        | ESA Endangered; MMPA               | Transient species observed throughout coastal California waters. The Southern Resident DPS is endangered and occurs mainly within the inland waters of Washington State and southern British Columbia, but also in coastal waters from Southeast Alaska through California | No (however, critical habitat for Southern Resident Killer Whale DPS might be revised based on 80 FR 9682 from February 24, 2015). | Seasonal, Occasional | Moderate. Most common during April, May, and June as they feed on northbound migrating gray whales. | Listing Notice: 11/18/05, 70 FR 69903  
Depleted stock: 06/03/04, 69 FR 31321  
Critical Habitat proposed revision: 84 FR 49214 (2019)  
Recovery Plan (NMFS 2008)                                                                                                                                 |
| North Pacific right whale           | ESA Endangered; MMPA Depleted      | Seasonally migratory; inhabit colder waters for feeding, and then migrate to warmer waters for breeding and calving. Although they may move far out to sea during their feeding seasons, right whales give birth in coastal areas. | No                                              | Seasonal, Very Rare | Low. Sightings in MBNMS are very rare. Migration patterns of the North Pacific right whale are unknown, although it is thought the whales spend the summer in far northern feeding grounds and migrate south to warmer waters, such as southern California, during the winter. | Original ESA Listing Notice: 35 FR 8491 (1970)  
Updated Listing Notice: 03/06/08, 73 FR 12024  
Recovery Plan: 78 FR 34347   |
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<td>Sei whale</td>
<td>ESA Endangered; MMPA Depleted</td>
<td>Sighted in offshore waters throughout the latitudinal range of MBNMS, though usually occur seaward of the sanctuary’s western boundary. Observed generally in deep water habitats including along the edge of the continental shelf, over the continental slope, and in the open ocean.</td>
<td>No</td>
<td>Seasonal, Very Rare</td>
<td>Low. Sightings have become rare in MBNMS since the 1980s. The movement patterns of sei whales are not well known, but they are typically observed in deeper waters far from the coastline. Sei whales have an unpredictable distribution. Many whales may be found in one area for a period and then not return for years or decades.</td>
<td>Listing Notice: 7/30/70, 35 FR 12222 Recovery Plan: 7/22/11, 76 FR 43985</td>
</tr>
<tr>
<td>Short-finned pilot whale</td>
<td>MMPA</td>
<td>Found primarily in deep waters in warmer tropical and temperate waters. Forage in areas with high densities of squid.</td>
<td>No</td>
<td>Year-round, Very Rare</td>
<td>Low. Generally found in deep water</td>
<td></td>
</tr>
<tr>
<td>Baird’s beaked whale</td>
<td>MMPA</td>
<td>Inhabit deep offshore waters in the North Pacific. Baird’s beaked whales generally migrate seasonally based on surface water temperature. During summer and fall they are found in or near the waters of the continental slope. Between April and October, Baird’s beaked whales have been observed in the nearshore waters of the Bering Sea and Okhotsk Sea. They will move farther offshore during winter and spring when sea temperatures have decreased.</td>
<td>No</td>
<td>Seasonal-Rare</td>
<td>Low. Sightings in the fall in Monterey Bay and in deep waters.</td>
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<tr>
<td>Cuvier’s beaked whale</td>
<td>MMPA</td>
<td>Deep pelagic waters (usually greater than 1,000m deep) of the continental shelf and slope. Seasonality and migration patterns are unknown.6</td>
<td>No</td>
<td>Seasonality unknown, Very Rare</td>
<td>Low. Generally, occur in the deep waters. Infrequent strandings in Monterey Bay.</td>
<td>Listing Notice: 06/03/70, 35 FR 8491 Critical Habitat Designation Notice: 01/26/12, 77 FR 4169 Recovery Plan: 05/22/1998, 63 FR 28359</td>
</tr>
<tr>
<td>Leatherback sea turtle</td>
<td>ESA Endangered</td>
<td>Offshore pelagic environment and often associated with the 50 m isobaths, and can be found quite close to shore, even reported as such in Monterey Bay.</td>
<td>Yes</td>
<td>Seasonal, Occasional</td>
<td>Low. Leatherback sea turtles are most commonly seen between July and October, when the surface water temperature warms to 15-16° C and large jellyfish, the primary prey of the turtles, are seasonally abundant offshore.</td>
<td>Original ESA Listing Notice: 43 FR 32800 (1978) Updated Listing Notice: 04/06/16, 81 FR 20057 Recovery Plan (NMFS and USFWS 1998)</td>
</tr>
<tr>
<td>Green sea turtle</td>
<td>ESA Threatened</td>
<td>Common inhabitants of coastal regions, embayments, and lagoons, but mainly occur in tropical regions, occasionally ranging into Monterey Bay during periods of warm water.</td>
<td>No</td>
<td>Seasonal, Occasional</td>
<td>Low. In the eastern Pacific, green turtles have been sighted from Baja California to southern Alaska but most commonly occur from San Diego south.</td>
<td>Original ESA Listing Notice: 43 FR 32800 (1978) Updated Listing Notice: 10/24/11, 76 FR 58868 Recovery Plan (NMFS and USFWS 1998)</td>
</tr>
<tr>
<td>Loggerhead sea turtle</td>
<td>ESA Endangered</td>
<td>An oceanic species in temperate and tropical regions.</td>
<td>No</td>
<td>Seasonal, Occasional</td>
<td>Low. In the U.S., most recorded sightings are of juveniles off the coast of California but occasional sightings are reported along the coasts of Washington and Oregon.</td>
<td>Original ESA Listing Notice: 43 FR 32800 (1978) Updated Listing Notice: 10/24/11, 76 FR 58868 Recovery Plan (NMFS and USFWS 1998)</td>
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<tr>
<td>Olive ridley sea turtle</td>
<td>ESA Threatened</td>
<td>Found in warm temperate and tropical waters, typically &lt; 15 km from mainland shores but also in oceanic waters. In the eastern Pacific, the range of the Olive Ridley turtle extends from southern California to northern Chile.</td>
<td>No</td>
<td>Year-round, Very Rare</td>
<td>Not expected. An olive ridley sea turtle stranded in Pacific Grove in the fall of 2011 and if the surface waters are warm (approaching 60 degrees), In the eastern Pacific, olive ridley sea turtles are highly migratory and those migratory pathways vary annually.</td>
<td>Listing Notice: 08/27/78, 43 FR 32800 Recovery Plan (NMFS and USFWS 1998)</td>
</tr>
<tr>
<td>California red-legged frog</td>
<td>ESA Threatened</td>
<td>This species occurs from sea level to elevations of about 1,500 meters (5,200 feet). It has been extirpated from 70 percent of its former range and now is found primarily in coastal drainages of central California, from Marin County, California, south to northern Baja California, Mexico (74 FR 51825).</td>
<td>Yes, found in rivers within which water sampling during Snapshot Day occurs</td>
<td>Seasonal, rare</td>
<td>Low. Uses a variety of habitats but do require a breeding pond, or slow-flowing stream reaches or deep pools which hold water long enough for the tadpoles to metamorphosize. The breeding season runs from November through April and mating depends on seasonal climatic patterns but commonly occurs in February or March.</td>
<td>Listing Notice: 05/23/96, 61 FR 25813 Critical Habitat Designation: 09/16/08, 73 FR 53492</td>
</tr>
<tr>
<td>Chinook salmon (Sacramento River winter-run ESU)</td>
<td>ESA Endangered</td>
<td>Anadromous and semelparous. As adults they migrate from a marine environment into the freshwater streams and rivers of their birth (anadromous) where they spawn and die (semelparous).</td>
<td>No</td>
<td>Seasonal</td>
<td>Moderate. Chinook salmon typically enter the Sacramento River from November to June and spawn from late-April to mid-August, with a peak from May to June. They inhabit nearshore coastal waters of Central California throughout the year, but especially during migration periods.</td>
<td>Listing Notice: 55 FR 46515 (1990) Critical Habitat Designation: 09/02/05, 70 FR 52487 Recovery Plan (NMFS 2014)</td>
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<tr>
<td>Chinook salmon (Central Valley spring-run ESU)</td>
<td>ESA Threatened</td>
<td>Anadromous and semelparous. As adults they migrate from a marine environment into the freshwater streams and rivers of their birth (anadromous) where they spawn and die (semelparous).</td>
<td>No</td>
<td>Seasonal</td>
<td>Moderate. Chinook salmon typically enter the Sacramento River from November to June and spawn December to April. They inhabit nearshore coastal waters of Central California throughout the year, but especially during migration periods.</td>
<td>Listing Notice: 64 FR 50394 (1999) Critical Habitat Designation: 09/02/2005, 70 FR 52487 Recovery Plan (NMFS 2014)</td>
</tr>
<tr>
<td>Chinook salmon (California Coastal ESU)</td>
<td>ESA Threatened</td>
<td>Juveniles may spend 3 months to 2 years in freshwater before migrating to estuarine areas as smolts and then into the ocean to feed and mature. They prefer streams that are deeper and larger than those used by other Pacific salmon species.</td>
<td>No</td>
<td>Seasonal</td>
<td>Low. Historically, the range extended from Oregon to the Ventura River in California. Chinook salmon in this ESU exhibit an ocean-type life history and use Monterey Bay waters for foraging.</td>
<td>Listing Notice: 64 FR 50394 (1999) Critical Habitat Designation: 09/02/2005, 70 FR 52487 Recovery Plan (NMFS 2016)</td>
</tr>
<tr>
<td>Coho Salmon (Central California coast ESU)</td>
<td>ESA Endangered</td>
<td>Spend approximately the first half of their life cycle rearing and feeding in streams and small freshwater tributaries with stable gravel substrates. The remainder of the life cycle is spent foraging in estuarine and marine waters of the Pacific Ocean.</td>
<td>Yes, found in rivers within which water sampling during Snapshot Day occurs</td>
<td>Seasonal</td>
<td>Moderate. Historically, runs were common in the Pajaro and Salinas Rivers but have not been observed since the 1990s. Current runs exist in Waddell Creek, Scott Creek, San Lorenzo River, Soquel Creek, and Aptos Creek. In Monterey County, only two small runs in the Carmel and Big Sur Rivers exist. May potentially occur in the waters adjacent to the Action Area during migration.</td>
<td>Original Listing Notice: 61 FR 56138 (1996) Updated Listing Notice: 79 FR 20802 (2014) Critical Habitat Designation: 05/05/1999, 64 FR 24049 Recovery Plan (NMFS 2012)</td>
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<tr>
<td>Steelhead (Central California Coast DPS)</td>
<td>ESA Threatened</td>
<td>Steelhead are anadromous and can spend up to 7 years in fresh water prior to smoltification, and then spend up to 3 years in salt water prior to first spawning.</td>
<td>Yes, found in rivers within which water sampling during Snapshot Day occurs</td>
<td>Seasonal</td>
<td>Low. The nearest naturally spawned populations occur in Aptos Creek, north of the Project site within Santa Cruz County: In estuarine areas extreme high water is the best descriptor of lateral extent for critical habitat. We are designating the area inundated by extreme high tide because it encompasses habitat areas typically inundated and regularly occupied during the spring and summer when juvenile salmon are migrating in the nearshore zone and relying heavily on forage, cover, and refuge qualities provided by these occupied habitats.</td>
<td>Original Listing Notice: 08/18/1997, 62 FR 43937 Updated Listing Notice: 04/14/2014, 79 FR 20802 Critical Habitat Designation: 09/02/2005, 70 FR 52487 Recovery Plan (NMFS 2016)</td>
</tr>
<tr>
<td>Steelhead (South Central California Coast DPS)</td>
<td>ESA Threatened</td>
<td>Steelhead are anadromous and can spend up to 7 years in fresh water prior to smoltification, and then spend up to 3 years in salt water prior to first spawning.</td>
<td>Yes, found in rivers within which water sampling during Snapshot Day occurs</td>
<td>Seasonal</td>
<td>Moderate. This DPS occupies rivers from the Pajaro River in Santa Cruz County to (but not including) the Santa Maria River in Santa Barbara County.</td>
<td>Listing Notice: 62 FR 43937 (1997) Updated Listing Notice: 79 FR 20802 (2014) Critical Habitat Designation: 09/02/2005, 70 FR 52487 Recovery Plan (NMFS 2013)</td>
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<td>North American green sturgeon, southern DPS</td>
<td>ESA Threatened</td>
<td>Within the marine environment, the Southern DPS occupies coastal bays and estuaries from Monterey Bay to Puget Sound in Washington. Individuals occasionally enter coastal estuaries to forage. All of Monterey Bay is designated critical habitat for green sturgeon.</td>
<td>Yes, within 60 fathoms (fm) depth from Monterey Bay, California (including Monterey Bay)</td>
<td>Seasonal</td>
<td>Low to moderate. Subadult and adult green sturgeon mainly occupy coastal marine and estuarine habitats throughout the water column but typically feed in benthic environments (Erickson and Hightower 2007; Dumbauld et al. 2008). Subadult and adult green sturgeon may undergo extensive seasonal migrations to reach productive feeding grounds, including Monterey Bay (NOAA, 2009). In marine waters off the Rogue River, Green sturgeon primarily occupied the water column between 40 and 70 m (~130’ to ~230’) depths (Erickson and Hightower 2007). However, off Newport, Oregon, tagged sturgeon were found mainly in association with highly complex seafloor habitats (e.g., boulders) between 20–60 m (Huff et al. 2011). Subadult Green sturgeon have been recorded just outside of San Francisco Bay at average depths of 24 m (Ethan Mora, University of California, Santa Cruz, pers. comm.).</td>
<td>Listing Notice: 71 FR 17757 (2006) Critical Habitat Designation: 74 FR 52299 (2009) Recovery Plan (NMFS 2018)</td>
</tr>
<tr>
<td>Longfin smelt</td>
<td>ESA Candidate for Listing</td>
<td>Anadromous estuarine species occupying the middle or bottom of water column in salinities between 15-30 ppt.</td>
<td>No</td>
<td>Seasonal</td>
<td>Low. A single longfin smelt collected from the Monterey Bay area was reported by Eschmeyer et al. (1983) but the San Francisco Bay-Delta population is considered to be the southernmost population for the species.</td>
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<tr>
<td>Tidewater goby</td>
<td>ESA Endangered</td>
<td>California's coastal estuaries and enclosed lagoons near the mouths of coastal streams, and can also be found in brackish waters of adjoining marshes and streams.</td>
<td>Yes</td>
<td>Year-round</td>
<td>Low. Seasonally present in estuarine habitats within Monterey Bay including Elkhorn Slough, Bennet Slough, and Salinas River, all of which are outside of the study area.</td>
<td>Listing Notice: 02/04/94, 59 FR 5494 Critical Habitat Designation: 11/20/2000, 65 FR 69693</td>
</tr>
<tr>
<td>Eulachon</td>
<td>ESA Threatened</td>
<td>Spawning and rearing in estuarine river habitat; migrate to saltwater where they spend three years and then return to river spawning locations.</td>
<td>No</td>
<td>Seasonal, Very Rare</td>
<td>Low. Monterey Bay is at the southernmost limit of this species distribution, and the population is in decline (NMFS, 2016).</td>
<td>Listing Notice: 75 FR 13012 (2010) Critical Habitat Designation: 10/20/2011, 76 FR 65323 Recovery Plan (NMFS 2017)</td>
</tr>
<tr>
<td>Black abalone</td>
<td>ESA Endangered</td>
<td>Coastal and offshore island intertidal habitats on exposed rocky shores where bedrock provides deep, protective crevices for shelter.</td>
<td>Yes</td>
<td>Year-round, Common</td>
<td>Moderate. Could be present on hard substrate areas in the nearshore, intertidal portions of the Action Area.</td>
<td>Listing Notice: 02/13/09, 74 FR 1937 Critical Habitat Designation: 11/28/11, 76 FR 66806 Recovery Plan (NMFS 2020)</td>
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<tr>
<td>California condor</td>
<td>ESA Endangered</td>
<td>Adults will lay a single egg between January and March; in 2006, a Big Sur pair was found nesting in a Coast Redwood and also condors were discovered feeding on a Gray Whale carcass on the Big Sur coast; captive bred condors have release sites in Big Sur area.</td>
<td>No</td>
<td>Year-round, Occasional</td>
<td>Low. Often flies over MBNMS in Big Sur area and could feed on dead marine mammals in or adjacent to MBNMS.</td>
<td>Listing Notice: 03/11/67, 32 FR 4001</td>
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<tr>
<td>California least tern</td>
<td>ESA Endangered</td>
<td>The Pacific Coast of California, from San Francisco to Baja California. See 5-year review (PDF) for detailed, up-to-date distribution information. California least terns winter in Mexico. When feeding, they follow schools of fish and are sometimes seen as far north as southern Oregon. Nest on open beaches kept free of vegetation by the tide. Mating in April or May.</td>
<td>No</td>
<td>Seasonal (April-September); rare</td>
<td>Not expected. Highest frequency of birds seen in July and early August (eBird bar chart for Monterey, Santa Cruz and San Luis Obispo Counties Jan-Dec 1900-2019).</td>
<td>Listing Notice: 05/28/85, 50 FR 21784</td>
</tr>
<tr>
<td>Short-tailed albatross</td>
<td>ESA Endangered</td>
<td>Both adult and juvenile birds extensively use areas of the western Pacific east of Japan.</td>
<td>No</td>
<td>Year-round; very rare</td>
<td>Not expected. Short-tailed albatross 5-year review states juvenile (&lt; 1 year old) short-tailed albatrosses travel much more broadly throughout the North Pacific than adult birds; breed in Japan (USFWS, 2014).</td>
<td>Listing Notice: 06/02/70, 35 FR 8491</td>
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<td>California clapper rail</td>
<td>ESA Endangered</td>
<td>Historically, the range may have extended from salt marshes of Humboldt Bay to Morro Bay. The salt marshes of San Francisco Bay have been the center of its abundance. The California clapper rail now occurs only within the tidal salt and brackish marshes around San Francisco Bay where it is restricted to less than 10 percent of its former geographic range.</td>
<td>No</td>
<td>Year-round; very rare</td>
<td>Not expected. South of the San Francisco Bay Area (Bay Area), clapper rails formerly occurred in Elkhorn Slough, Monterey County (Silliman 1915), and Morro Bay, San Luis Obispo County (Brooks 1940). Clapper rails were consistently detected in Elkhorn Slough up to 1972, when an estimated 10 pairs were observed (Varoujean 1972). Subsequently, rails were observed only sporadically (Winter and Laymon 1979), and were last documented there in 1980 (Roberson 1985). (p.7); breeding begins by February, nesting starts mid-march and extends into August (USFWS, 2013).</td>
<td>Listing Notice: 10/13/70, 35 FR 16047</td>
</tr>
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<td>Marbled murrelet</td>
<td>ESA Threatened</td>
<td>Nest in forested areas containing characteristics of older forests; For nesting habitat to be accessible to marbled murrelets, it must occur close enough to the marine environment for marbled murrelets to fly back and forth. The farthest inland distance for a site with nesting behavior detections is 24 mi (39 km), respectively (81 FR 51348).</td>
<td>Yes, 81 FR 51348</td>
<td>Seasonal; occasional</td>
<td>Low. Often in small flocks on coastal waters, where it dives underwater searching for fish.</td>
<td>Listing Notice: 10/01/92, 57 FR 45328 Critical Habitat Designation: 05/24/96, 61 FR 26257</td>
</tr>
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| Western snowy plover  | ESA Threatened | Barren to sparsely vegetated sand beaches, dry salt flats in lagoons, dredge spoils deposited on beach or dune habitat, levees and flats at salt-evaporation ponds, river bars, along alkaline or saline lakes, reservoirs, and ponds. Nests are a natural or scraped depression on dry ground | Yes, Critical habitat: 06/19/2012: 77 FR 36727 | Year-round          | Moderate to High. Nesting: March-September | Listing Notice: 03/05/93, 58 FR 12864  
Critical Habitat Designation: 06/19/2012, 77 FR 36727 |
| White sharks          | CSC            | In California, important white shark habitat occurs around Monterey Bay and Greater Farallones, national marine sanctuaries. White shark populations are impacted by purposeful and incidental capture by fisheries, marine pollution, and coastal habitat degradation. “Protected” by MBNMS regulations: prohibited to attract any white shark within the Sanctuary (15 CFR 922.132 (a)(13). | Not applicable | Year-round          | Moderate to High. Present in coastal waters throughout the State and juveniles and adults are known to frequent the nearshore coastal waters along Monterey Bay coastline. |
Sent via electronic mail only  

June 10, 2020

Mr. Jack Ainsworth  
Executive Director  
California Coastal Commission  
45 Fremont Street, Suite 2000  
San Francisco, CA 94105

Subject: Federal Consistency Review for proposed action to revise Monterey Bay National Marine Sanctuary Management Plan and four sanctuary-wide regulations.

Dear Mr. Ainsworth:

The National Oceanic and Atmospheric Administration’s (NOAA) Office of National Marine Sanctuaries (ONMS) is proposing a revised management plan and revised regulations for Monterey Bay National Marine Sanctuary (MBNMS), as described in the attached draft environmental assessment (EA). In accordance with Section 304(e) of the NMSA, NOAA conducted a review of the management plan for MBNMS to evaluate substantive progress toward implementing the management plan and goals for the sanctuary, and make revisions to the plan and regulations as necessary to fulfill the purposes and policies of the NMSA. Through this public process, NOAA identified environmental concerns and management priorities for inclusion in the proposed new management plan and revised regulations. As part of the management plan review process, NOAA is now publishing a proposed new management plan and proposed changes to the MBNMS regulations. On July 6, 2020, NOAA released a notice of proposed rulemaking, draft management plan, and draft EA for public comment. The documents are available for public comment until September 4, 2020 at https://www.regulations.gov/docket?D=NOAA-NOS-2020-0094.

NOAA is consulting with appropriate federal and state government agencies, management authorities, and other interested parties on this proposed action. In accordance with the Coastal Zone Management Act (CZMA; 16 U.S.C. § 1451-1464), NOAA is requesting your concurrence with its determination that the proposed action is consistent to the maximum extent practicable with the enforceable policies of the approved California Coastal Management Program (i.e. Chapter 3 of the Coastal Act).

While NOAA has made no final decisions, the proposed action and alternatives are the result of an environmental analysis required by the National Environmental Policy Act in a draft EA, and reflect consideration of scoping comments received from the public, the MBNMS advisory council, federal, state, and local agencies, and stakeholder groups.

**Description of the Proposed Action**  
The proposed action is to update the management activities occurring within MBNMS conducted by NOAA staff that are related to research, monitoring, education, outreach, community
engagement, and resource protection. The proposed management activities include implementing routine field activities, updating the sanctuary management plan, and updating sanctuary-wide regulations. The proposed action is intended to continue the protection of living marine resources and their habitats in MBNMS and nationally significant seascapes and shipwrecks, while allowing compatible recreational and commercial uses, as outlined in the National Marine Sanctuaries Act (NMSA). The proposed action would guide management decision-making and contribute to the attainment of the goals and objectives of the NMSA and purposes for which MBNMS was established (Section 2.1).

The proposed new sanctuary management plan revises the 2008 management plan, and focuses on how best to understand and protect the sanctuary’s resources. The management plan includes 14 action plans grouped into issue- and program-based themes to guide NOAA staff over the coming decade. During the management plan review process NOAA identified the following new environmental concerns to be addressed in the proposed new management plan:

- Climate change;
- Implementation of coastal erosion and sediment management plans;
- Marine debris;
- Impacts to and management options for Sanctuary Ecologically Significant Areas;
- Assessing use of motorized personal watercraft in the sanctuary; and,
- Evaluating offshore wind energy and artificial reefs.

The proposed new management plan would address these issues through education and outreach, research and monitoring, collaborative planning and management efforts, regulation, and enforcement.

During the management plan review process NOAA identified proposed regulatory changes to address resource protection concerns in the sanctuary. The proposed rule would:

1. Add a definition for the “beneficial use of dredged material.” The new definition would clarify that the existing prohibition on permitting the disposal of dredged material in Monterey Bay National Marine Sanctuary does not apply to habitat restoration projects using clean dredged sediment material because such a beneficial use of dredged material would not be considered “disposal.”

Pursuing this proposed action is consistent with current state and federal coastal management practices that favor softscape approaches to restoring and protecting beaches and shorelines over hardscape methods (e.g., riprap, groins and seawalls) as well as being a critical tool to address climate change and sea level rise. This activity was recommended by your office in a letter dated July 3, 2014 to the Greater Farallones NMS Superintendent during the federal consistency review for their sanctuary expansion.

2. Reduce the sea state condition required for motorized personal watercraft access to the Mavericks seasonal-conditional zone.

Allowing motorized personal watercraft access to Mavericks during High Surf Advisory (not just during High Surf Warning) conditions would allow for their presence at the surf
break approximately 3 to 5 more days per year to provide safety assistance to surfers operating in a highly energized surf zone. This is consistent with Section 30210 and 30214 of the Coastal Act regarding public access and recreation.

3. Correct an administrative error to properly document the list of exempted Department of Defense activities within the Davidson Seamount Management Zone.

This is a purely administrative activity to correct the administrative record and regulations from the 2008 Management Plan update to properly document the exempted Department of Defense activities within the Davidson Seamount Management Zone. It should have no effect on this federal consistency determination.

4. Modify the boundaries of four existing year-round motorized personal watercraft zones.

NOAA proposes to change the size and shape of the four zones at Half Moon Bay, Santa Cruz, Moss Landing, and Monterey, while maintaining the original intent of the zones: to provide recreational opportunities for motorized personal watercraft within the sanctuary, while safeguarding sensitive sanctuary resources and habitats from unique threats of disturbance by these watercraft. NOAA proposes to reduce the number of boundary buoys by utilizing more existing marks and geographical features (e.g., U.S. Coast Guard navigational buoys and points of land), with a goal of reducing navigational hazards, mooring failures, and aesthetic impacts. This is also consistent with Section 30210 and 30214 of the Coastal Act regarding public access and recreation while minimizing impacts to sensitive resources.

**Consistency Determination**

NOAA has evaluated the proposed action and determined that it is consistent to the maximum extent practicable with the California Coastal Management Program. NOAA has also reviewed the State's enforceable policies found in the California Coastal Act of 1976 and believes this proposed action is consistent with the applicable enforceable policies of the California Coastal Management Program. As such, NOAA requests your concurrence with our determination that the proposed action is consistent to the maximum extent practicable with the enforceable policies of the California Coastal Management Program.

If you have any questions regarding this determination request, please contact Bridget.Hoover@noaa.gov.

Sincerely,

Paul Michel
Superintendent

Cc: Mark Delaplaine, CCC
September 2, 2021

Lisa Wooninck
Acting Superintendent
Monterey Bay National Marine Sanctuary
99 Pacific Street Building 455A
Monterey, CA 93940

Re: Negative Determination No. ND-0023-21, Monterey Bay National Marine Sanctuary Management Plan Update

Dear Dr. Wooninck:
We have received your letter dated July 6, 2020, in which you have determined that the above-referenced proposal to revise the Monterey Bay National Marine Sanctuary’s 2008 management plan and regulations would have no adverse effect on coastal resources for the reasons identified in Negative Determination No. ND-0023-21. The Coastal Commission staff agrees that the proposed project will not adversely affect coastal zone resources. We therefore concur with your negative determination made pursuant to 15 CFR Section 930.35 of the NOAA implementing regulations.

Please contact Alexis Barrera at alexis.barrera@coastal.ca.gov if you have any questions regarding this matter.

Sincerely,

CASSIDY TEUFEL
Federal Consistency Coordinator
(for)

JOHN AINSWORTH
Executive Director
Sent via electronic mail only

July 10, 2020

Mr. Paul Souza  
Regional Director  
U.S. Fish and Wildlife Service  
Region Eight — Pacific Southwest  
Federal Building  
2800 Cottage Way, Room W-2605  
Sacramento, CA 95825-1846

Dear Mr. Souza:

NOAA’s Office of National Marine Sanctuaries (ONMS) is contacting you to initiate informal consultation under Section 7(a)(2) of the Endangered Species Act for the proposed revised management plan and revised regulations for Monterey Bay National Marine Sanctuary, as described in the attached draft environmental assessment (EA). The EA analyzes NOAA’s proposed action to implement routine field activities, update the sanctuary management plan, and update sanctuary-wide regulations. NOAA’s preferred alternative (Alternative C) would continue implementation of routine field activities, adopt a revised sanctuary management plan, and revise four sanctuary-wide regulations. On July 6, 2020, NOAA released a notice of proposed rulemaking, draft management plan, and draft EA for public comment. The documents are available for public comment until September 4, 2020 at https://www.regulations.gov/docket?D=NOAA-NOS-2020-0094.

Pursuant to our request for informal consultation, NOAA ONMS prepared the enclosed draft EA that provides the following information:

☐ A description of the action to be considered (Chapter 3);
☐ A description of the action area (Section 4.3.1.1);
☐ A description of any listed species or designated critical habitat that may be affected by the proposed action (Section 4.3.1.2);
☐ A description of habitat requirements, occurrence patterns, and federal status for each of the listed species (Appendix D); and,
☐ An analysis of the potential routes of effect on any listed species or designated critical habitat (Section 5.5.1 and Section 5.5.2).

NOAA used the USFWS’s Environmental Conservation Online System (ECOS) Information for Planning and Conservation (iPaC) tool to search for ESA-listed species that may be present in the action area. The ECOS iPaC tool identified 55 species listed as endangered or threatened under USFWS jurisdiction that could occur in the action area, as well as designated critical habitat for 6 species (USFWS, June 18, 2020; Consultation Code: 08ESMF00-2019-SLI-2224 and 08EVEN00-2019-SLI-0565).

Based on an evaluation of the species ranges, habitat use, and the components of the proposed action, NOAA determined that 9 ESA-listed species and designated critical habitat for 4 species under USFWS jurisdiction may occur within the action area and could be affected by the proposed action. These 9
species are: southern sea otter, green sea turtle, California Red-legged frog, Tidewater Goby, California Condor, California Least Tern, Short-Tailed Albatross, Marbled Murrelet, and Western Snowy Plover. The designated critical habitats are: Western Snowy Plover, Marbled Murrelet, California Red-legged Frog, and Tidewater Goby.

Description of the Proposed Action
The proposed action is to update NOAA’s management activities occurring within Monterey Bay National Marine Sanctuary related to research, monitoring, education, outreach, community engagement, and resource protection. The proposed management activities include implementing routine field activities, updating the sanctuary management plan, and updating sanctuary-wide regulations. The proposed action is intended to continue the protection of living marine resources and their habitats in Monterey Bay National Marine Sanctuary and nationally significant seascapes and shipwrecks, while allowing compatible recreational and commercial uses, as outlined in the National Marine Sanctuaries Act (NMSA). The proposed action would guide management decision-making and contribute to the attainment of the goals and objectives of the NMSA and purposes for which Monterey Bay National Marine Sanctuary was established (Section 2.1).

Determination
In the enclosed draft EA, NOAA reviewed the proposed action for its impacts to nine listed species and designated critical habitat for four species under USFWS jurisdiction within the action area. NOAA concluded that any impacts resulting from the implementation of a revised management plan, proposed regulations, and routine field activities would be beneficial, insignificant, or discountable for the following reasons:

- Noise and disturbances from sanctuary operational activities would be of limited duration, management activities would strive to reduce disturbance, and implementation of best management practices would minimize potential impacts.
- The revisions to the Monterey Bay National Marine Sanctuary management plan and regulations would have a beneficial impact on listed species because they would continue to protect important foraging and breeding grounds within coastal and shoreline habitats and contribute to improvement in water quality.

NOAA concluded that the proposed action may affect, but is not likely to adversely affect listed species under USFWS jurisdiction. In addition, the proposed action would have no effect or would not adversely modify designated critical habitat under USFWS jurisdiction (Sections 5.5.1.4 and 5.5.2). NOAA requests your written concurrence with these determinations. If you have any questions, please contact Karen.Grimmer@noaa.gov regarding this consultation request.

Sincerely,

Paul Michel,
Superintendent

Enclosure: Draft Environmental Assessment of Monterey Bay National Marine Sanctuary Draft Management Plan and Regulatory Changes
February 26, 2021

Paul Michel, Superintendent
U.S. Department of Commerce
National Oceanic and Atmospheric Administration
99 Pacific Street, Building 455a
Monterey, California 93940

Subject: Informal Consultation on the Proposed Draft Management Plan for the Monterey Bay National Marine Sanctuary, Monterey County, California

Dear Paul Michel:

We are responding to the National Oceanic and Atmospheric Administration’s (NOAA) request, dated July 10, 2020 and revised on January 8, 2021, on NOAA’s Office of National Marine Sanctuaries (ONMS) proposed management plan for the Monterey Bay National Marine Sanctuary (MBNMS). You are requesting our concurrence with your determination that the activities described within the management plan, specifically those that would be implemented by NOAA staff and excluding those that conducted by other entities (K. Grimmer, NOAA, pers. comm. 2021), may affect, but is not likely to adversely affect the federally threatened southern sea otter (Enhydra lutris nereis), marbled murrelet (Brachyramphus marmoratus), western snowy plover (Charadrius nivosus nivosus), and California red-legged frog (Rana draytonii) and its critical habitat, and critical habitat for the federally endangered tidewater goby (Eucyclogobius newberryi). Because tidewater gobies have the potential to occur within the action area, we include this species in this consultation. Your request and our response are made pursuant to section 7 of the Endangered Species Act of 1973, as amended (16 U.S.C. 1531 et seq.).

NOAA proposes the following field operations, which are necessary to support National Marine Sanctuaries Act’s primary goal of resource protection, through direct management, research, education, and enforcement:

- conducting MBNMS operations for research emergency response and other sanctuary management activities;
- operating scuba diving operations and kayaks within MBNMS;
Appendix D

Paul Michel

- operating crewed and remotely-operated vehicles (ROV) and other tethered research equipment within MBNMS; and
- coordinating volunteers during the annual Snapshot Day event.

Action Area and Project Activities
For the purposes of this consultation, NOAA determined that the action area includes the boundaries of MBNMS, the main operation routes for vessels within the sanctuary, shorelines adjacent to the MBNMS where MBNMS activities would impact wildlife, and rivers in the local watersheds where NOAA staff and volunteers conduct periodic water sampling.

NOAA proposes to allow MBNMS staff to implement standard field activities. These activities are critical to ensuring effective and efficient sanctuary activities for research, resource protection, emergency response, and education. These activities include vessel operations as part of research, emergency response, and other sanctuary management activities; scuba operations and kayak use; ROV use and other tethered research equipment; and water sampling activities during the annual Snapshot Day. MBNMS-led vessel operations occur infrequently, approximately 90 days per year on three ONMS vessels.

Impacts to Listed Species
NOAA determined that the NOAA staff field activities would result in potential impacts to the aforementioned listed species and critical habitats. NOAA stated the field operations within the updated management plan would have the same level of intensity of impacts from the original 2008 management plan.

Southern sea otter
The southern sea otter occurs within the action area year-round and are commonly found in the nearshore waters of Monterey Bay, along the Big Sur coastline and in Elkhorn Slough. At any point when a MBNMS vessel is in use, there is risk of negatively affecting southern sea otter behavior or injuring a southern sea otter during a collision. However, these potential impacts are reduced due the infrequent operation of MBNMS-led vessels and the implementation of best management practices for field activities, including employing lookouts on the helm, and reducing vehicle speed to a maximum of 10 knots when marine mammals are visible within one nautical mile of the vessel. Southern sea otters may be disturbed during kayak use associated with the Ocean Conservation Education Action Network (Team OCEAN) program in the main channel of Elkhorn Slough or offshore along Cannery Row. The Team OCEAN program would minimize disturbance to southern sea otters. The program’s trained and knowledgeable naturalists promote safe and respectful wildlife viewing, including distance thresholds to avoid disturbing marine mammals, and educating the public on the importance of protecting ocean and coastal ecosystems.
*California red-legged frog*

California red-legged frogs and its critical habitat may be disturbed during an annual volunteer water quality monitoring program (Snapshot Day). On the first Saturday of May, NOAA coordinates an annual water sampling event with local agencies and other non-profits to collect data for monitoring the health of watersheds flowing into MBNMS (MBNMS 2019). Trained volunteers simultaneously collect water quality samples at a variety of upstream locations in San Mateo, Santa Cruz, Monterey, and San Luis Obispo Counties. Over 100 sites are annually monitored for Snapshot Day and the specific sites vary every year, but in 2019, Snapshot Day occurred within the following California red-legged frog critical habitat units: SNM-1, SNM-2, SCZ-1, SCZ-2, MNT-2, MNT-3 and SLO-2. California red-legged frogs are occasionally observed in these upstream environments, however there is a low likelihood of encountering a California red-legged frog during Snapshot Day because the survey occurs in May, outside of California red-legged frog breeding season (November to April). Additionally, the survey occurs once a year, is completed in less than 4 hours, and volunteers would not go into the water. Because the survey is infrequent, is a short-duration, and would not impact water quality, quantity, or substrate, it is not likely to result in adverse effects to California red-legged frogs or its critical habitat.

*Marbled murrelet*

Marbled murrelets forage in small flocks in coastal waters, predominantly north of Monterey Bay. They can occur in the action area year round, however more often are observed within the action area during the summer months (ONMS 2020b). Marbled murrelets occasionally feed along the coastal bluffs and in the surf zone at MBNMS. At any point when a MBNMS-led vessel is in use, the vehicle may disturb or injure foraging marbled murrelets. However, marbled murrelets are known to flush or dive when a boat is approaching and NOAA has proposed employing lookouts on the helm and reducing vehicle speed around marine mammals. Although the action area overlaps with marbled murrelet critical habitat units CA-14 and CA-15 and the Snapshot Day activities occur near both critical habitat units, activities and other MBNMS surveys are short in duration and are not expected to change primary constituent elements for marbled murrelet critical habitat (Grimmer, pers. comm. 2021). Due to the marbled murrelet’s avoidance behavior, the infrequent use of MBNMS-led vessels, ONMS’s minimization measures, the short duration of the Snapshot Day activities, the proposed activities are not likely adversely affect marbled murrelets or their critical habitat.

*Western snowy plover*

The western snowy plover is present on shorelines within the action area and their designated critical habitat occurs throughout the entire coastline adjacent to the sanctuary, including units CA-17, CA-18, CA-19, CA-20, CA-22, and CA-24. Western snowy plovers may be disturbed during standard sanctuary management activities, including onshore fieldwork. However, these disturbances to western snowy plover and their critical habitat are short in duration, occur infrequently, and are expected to remain similar to current levels (ONMS 2020b). Therefore, field activities are not likely to adversely affect western snowy plovers and are not expected to change essential features of the critical habitat.
Tidewater goby
Tidewater gobies and their critical habitat may be disturbed during the annual Snapshot Day activities; 20 of 65 critical habitat units occur adjacent to MBNMS and many of these areas may overlap with where MBNMS conducts annual water sampling for Snapshot Day. However, you determined that the risk of disturbance to tide water goby critical habitat is limited to the Pajaro River (Grimmer, pers. comm. 2021). Although primary constituent elements for critical habitat are present in the areas that the Snapshot Day activities would occur, Snapshot Day activities are unlikely to result in adverse effects to tidewater goby critical habitat because activities would be limited to the collection of water at the water’s edge without going into the water, and be completed within 4 hours on one day per year. Because the Snapshot Day survey is infrequent, is a short-duration, and would not impact water quality, quantity, or substrate, it is not likely to result in adverse effects to California red-legged frogs or its critical habitat.

Conclusion
We concur with NOAA’s determination that the project may affect, but is not likely to adversely affect the southern sea otter, marbled murrelet, western snowy plover, California red-legged frog, tidewater goby, and the critical habitats of California red-legged frog and tidewater goby. Our concurrence is based on the following:

1. The updated MBNMS management plan includes routine field activities as described in the 2008 management plan. Because these activities have been implemented for 12 years resulting in negligible impacts to listed species, we do not expect a change in impacts to the listed species.
2. Noise and disturbance to southern sea otter and marbled murrelets from MBNMS-led vessels would occur infrequently and ONMS staff would implement best management practices, such as a biological monitor on watch and reducing speeds around marine mammals, to minimize potential impacts.
3. The majority of the field activities conducted by NOAA staff would be of limited duration, management activities include measures to reduce disturbance, and implementation of best management practices would minimize potential impacts.
4. Surveys that may result in impacts to California red-legged frogs and its critical habitat, tidewater goby and its critical habitat, and marbled murrelet critical habitat would occur over the course of one day per year and would be completed within 4 hours. Additionally, these activities would occur in May and would be outside of the breeding season for California red-legged frogs.

This concludes the subject project informal consultation. If you have any questions regarding this consultation, please contact Karen Sinclair of my staff by electronic mail at karen_sinclair@fws.gov. Additionally, as a reminder, we understand that NOAA will consult on future activities in the management plan, once sufficient detail about the activity are available.
These activities include:

- use of NOAA aircraft and unmanned aerial systems;
- removal of grounded vessels or other large marine debris from coastal areas;
- beach and other marine debris clean up events;
- issuance of any permits by MBNMS to conduct activities otherwise prohibited by sanctuary regulations, per NOAA’s current protocol for permit issuance; and
- projects involving beneficial use of dredged material, consistent with sanctuary regulations.

Sincerely,

Leilani Takano
Assistant Field Supervisor
LITERATURE CITED


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Regional Administrator  
National Marine Fisheries Service West Coast Region  
1201 Northeast Lloyd  
Portland, OR 97232  
ATTN: Barry Thom  

Dear Mr. Thom:  

NOAA’s Office of National Marine Sanctuaries (ONMS) is contacting you to initiate informal consultation under Section 7(a)(2) of the Endangered Species Act for the proposed revised management plan and revised regulations for Monterey Bay National Marine Sanctuary, as described in the attached draft environmental assessment (EA). The EA analyzes NOAA ONMS’s proposed action to implement routine field activities, update the sanctuary management plan, and update sanctuary-wide regulations. NOAA ONMS’s preferred alternative (Alternative C) would continue implementation of routine field activities, adopt a revised sanctuary management plan, and revise four sanctuary-wide regulations. On July 6, 2020, NOAA released a notice of proposed rulemaking, draft management plan, and draft EA for public comment. The documents are available for public comment until September 4, 2020 at https://www.regulations.gov/docket?D=NOAA-NOS-2020-0094.  

Pursuant to our request for informal consultation, NOAA ONMS prepared the enclosed draft EA that provides the following information:  
- A description of the action to be considered (Chapter 3);  
- A description of the action area (Section 4.3.1.1);  
- A description of any listed species or designated critical habitat that may be affected by the proposed action (Section 4.3.1.3);  
- A description of habitat requirements, occurrence patterns, and federal status for each of the listed species (Appendix D); and,  
- An analysis of the potential routes of effect on any listed species or designated critical habitat (Section 5.5.3 and Section 5.5.4).  

To compile the list of protected species and habitats under National Marine Fisheries Service (NMFS) jurisdiction, NOAA ONMS accessed the NMFS West Coast Region Protected Resource Division’s threatened and endangered species directory in March 2020. These lists are composed of 10 marine mammal species or distinct population segments (DPS), 2 marine invertebrate species, 7 fish species, 5 sea turtle species, and 26 DPSs or evolutionarily significant units (ESU) of West Coast Salmon and Steelhead. Critical habitat is designated for 37 species (or DPS/ESUs) under the jurisdiction of NMFS West Coast Region, in addition to proposed revisions to designated critical habitat for 2 species.  

Based on evaluation of the species ranges, habitat use and the components of the proposed action, NOAA ONMS determined that 22 ESA-listed species and designated critical habitat for 4 species under
NMFS jurisdiction occur in the action area and could be affected by the proposed action (Sections 4.3.1.3 and 5.5.3).

Description of the Proposed Action
The proposed action is to update NOAA’s management activities occurring within Monterey Bay National Marine Sanctuary related to research, monitoring, education, outreach, community engagement, and resource protection. The proposed management activities include implementing routine field activities, updating the sanctuary management plan, and updating sanctuary-wide regulations. The proposed action is intended to continue the protection of living marine resources and their habitats in Monterey Bay National Marine Sanctuary and nationally significant seascapes and shipwrecks, while allowing compatible recreational and commercial uses, as outlined in the National Marine Sanctuaries Act (NMSA). The proposed action would guide management decision-making and contribute to the attainment of the goals and objectives of the NMSA and purposes for which Monterey Bay National Marine Sanctuary was established (Section 2.1).

Determination
In the enclosed draft EA, NOAA ONMS reviewed the proposed action for its impacts to 22 listed species and designated critical habitat for four species under NMFS jurisdiction within the action area. NOAA ONMS concluded that any impacts resulting from the implementation of a revised management plan, proposed regulations, and routine field activities would be beneficial, insignificant, or discountable for the following reasons:

- Noise and disturbances from sanctuary operational activities would be of limited duration, management activities would strive to reduce disturbance, and implementation of best management practices would minimize potential impacts.
- The revisions to the Monterey Bay National Marine Sanctuary management plan and regulations would have a beneficial impact on listed species because they would continue to protect important foraging and breeding grounds within coastal and shoreline habitats and contribute to improvement in water quality.

NOAA ONMS concluded that the proposed action may affect, but is not likely to adversely affect listed species under NMFS jurisdiction. In addition, the proposed action would have no effect or would not adversely modify designated critical habitat under NMFS jurisdiction (Sections 5.5.3.4 and 5.5.4). ONMS requests your written concurrence with these determinations. If you have any questions, please contact Lisa.Wooninck@noaa.gov regarding this consultation request.

Sincerely,

Paul Michel,
Superintendent

Cc: Rosalie del Rosario, West Coast Region Section 7 Consultations Coordinator

Enclosure: Draft Environmental Assessment of Monterey Bay National Marine Sanctuary Draft Management Plan and Regulatory Changes
Regional Administrator
National Marine Fisheries Service West Coast Region
1201 Northeast Lloyd
Portland, OR 97232
ATTN: Barry Thom

July 10, 2020

Dear Mr. Thom;

NOAA’s Office of National Marine Sanctuaries (ONMS) is contacting you to consult pursuant to
Section 305(b) of the Magnuson-Stevens Fishery Conservation and Management Act for the
proposed revised management plan and regulatory update for Monterey Bay National Marine
Sanctuary, as described in the attached draft environmental assessment (EA). The draft EA
analyzes NOAA ONMS’s proposed action to update the sanctuary management plan and four
sanctuary-wide regulations. NOAA ONMS’s preferred alternative (Alternative C) would continue
implementation of routine field activities, adopt a revised sanctuary management plan, and revise
four sanctuary-wide regulations. On July 6, 2020, NOAA released a notice of proposed
rulemaking, draft management plan, and draft EA for public comment. The documents are
available for public comment until September 4, 2020 at

As part of a programmatic evaluation of the potential impacts of ONMS’s routine field activities,
ONMS prepared an Essential Fish Habitat (EFH) Assessment that analyzed the impacts of
routine operational activities on EFH in the West Coast national marine sanctuaries. By letter
dated July 26, 2016, NMFS concurred with ONMS’s determination that field operations would
have minimal adverse impacts on designated EFH and provided general concurrence for all field
operations, except for the removal or relocation of grounded vessels and removal of large marine
debris. NMFS agreed that deployment of equipment on the seafloor would meet the criteria for
general concurrence under 50 CFR § 600.920(g)(2) provided that the minimization measure of
limiting deployment to sandy substrate were followed for all deployments. NMFS stated that the
activity of removal or relocation of grounded vessels and removal of large marine debris do not
meet the criteria stated in 50 CFR § 600.920(g)(2) and should be consulted on individually as
necessary.

NOAA ONMS reviewed the proposed action for potential impacts on designated EFH. Section
4.3.2 of the enclosed draft EA describes EFH present in Monterey Bay National Marine
Sanctuary. NOAA ONMS determined that all activities proposed to be conducted as part of the
proposed action would fit within the scope of NMFS’s general concurrence except for the
removal of grounded vessels. Section 5.5.5 of the enclosed draft EA provides an analysis of the
potential impacts on designated EFH of removal of grounded vessels that could occur as part of
the proposed action. Based on this analysis, NOAA ONMS determined that the proposed action
would result in minimal adverse impacts on designated EFH for the following reasons:
The number of vessel removal activities that would occur annually would be low.

Any temporary increase in turbidity that could occur during removal activities would be minimized by implementing mechanical operations and best management practices.

NOAA ONMS would coordinate with the towing and salvage industry to implement best management practices for certain towing and salvage operations.

In addition, the NOAA ONMS would implement of the best management practices and mitigation measures described in Appendix C of the enclosed draft EA to ensure that any adverse impacts to designated EFH remain below the minimum threshold.

NOAA ONMS requests your written concurrence with this determination. If you have any questions, please contact Lisa.Wooninck@noaa.gov regarding this consultation request.

Sincerely,

[Signature]

Paul Michel
Superintendent

Cc: John Stadler, West Coast Region EFH Coordinator

Enclosure: Draft Environmental Assessment of Monterey Bay National Marine Sanctuary Draft Management Plan and Regulatory Changes
December 1, 2020

Refer to NMFS No: WCR-2020-03225

Paul Michel
Superintendent
NOAA National Ocean Service
Monterey Bay National Marine Sanctuary
99 Pacific Street, Bldg 455a
Monterey, CA 93940


Dear Mr. Michel:

This letter responds to your July 10, 2020, request for concurrence from the National Marine Fisheries Service (NMFS) pursuant to Section 7 of the Endangered Species Act (ESA) for the subject action. In addition, we are responding to your essential fish habitat (EFH) consultation request.

Your ESA request qualified for our expedited review and concurrence because it met our screening criteria and contained all required information on your proposed action and its potential effects to listed species and designated critical habitat. We also determined that the proposed revisions to the MBNMS management plan and regulations would not adversely affect EFH. We determined that the routine field activities continue to meet the criteria under 50 CFR 600.920(g)(2) and qualify for inclusion in the General Concurrence, except for the removal of large marine debris and the removal or relocation of grounded vessels. These two activities do not meet the criteria and do not qualify for inclusion in the General Concurrence, because we cannot adequately anticipate the size or frequency of effects. Therefore, the removal of large marine debris and the removal or relocation of grounded vessels should be consulted on individually as necessary.

**ENDANGERED SPECIES ACT**

We reviewed your consultation request document and related materials. Based on our knowledge, expertise, and the materials you provided, we concur with your conclusions that the proposed action is not likely to adversely affect the NMFS ESA-listed species and/or designated critical habitat.

This letter underwent pre-dissemination review using standards for utility, integrity, and objectivity in compliance with applicable guidelines issued under the Data Quality Act (section
515 of the Treasury and General Government Appropriations Act for Fiscal Year 2001, Public Law 106-554). The concurrence letter will be available through NMFS’ Environmental Consultation Organizer [https://appscloud.fisheries.noaa.gov]. A complete record of this consultation is on file at the NMFS Long Beach Office.

Reinitiation of consultation is required and shall be requested by NOAA’s Office of National Marine Sanctuaries (ONMS) or by NMFS, where discretionary Federal involvement or control over the action has been retained or is authorized by law and (1) new information reveals effects of the action that may affect listed species or critical habitat in a manner or to an extent not previously considered; (2) the identified action is subsequently modified in a manner that causes an effect to the listed species or critical habitat that was not considered in this concurrence letter; or if (3) a new species is listed or critical habitat designated that may be affected by the identified action.

MAGNUSON-STEVENS FISHERY CONSERVATION AND MANAGEMENT ACT

We also reviewed the proposed action for potential effects on EFH designated under the Magnuson-Stevens Fishery Conservation and Management Act (MSA), including conservation measures and any determination you made regarding the potential effects of the action. This review was pursuant to section 305(b) of the MSA, implementing regulations at 50 CFR 600.920, and agency guidance for use of the ESA consultation process to complete EFH consultation.

Under the MSA, this consultation is intended to promote the protection, conservation, and enhancement of EFH as necessary to support sustainable fisheries and the managed species’ contribution to a healthy ecosystem. For the purposes of the MSA, EFH means “those waters and substrate necessary to fish for spawning, breeding, feeding, or growth to maturity,” and includes the associated physical, chemical, and biological properties that are used by fish (50 CFR 600.10), and “adverse effect” means any impact which reduces either the quality or quantity of EFH (50 CFR 600.910(a)). Adverse effects may include direct, indirect, site-specific or habitat-wide impacts, including individual, cumulative, or synergistic consequences of actions.

MBNMS encompasses EFH for various life stages of fish species managed under the Pacific Coast Salmon, Pacific Coast Groundfish, Coastal Pelagic Species, and Highly Migratory Species Fishery Management Plans. ONMS field activities within the MBNMS may affect designated EFH. In 2016, ONMS determined and NMFS concurred that the ONMS’ routine operational field activities within the West Coast national marine sanctuaries (including MBNMS) would have minimal adverse effects on designated EFH, except for the removal or relocation of grounded vessels and removal of large marine debris (NMFS 2016). NMFS provided a General Concurrence for all field operations except for these two activities, stating that the removal or relocation of grounded vessels and the removal of large marine debris do not meet the criteria for general concurrence and should be consulted on individually as necessary.

Under the proposed action, ONMS will revise the MBNMS management plan and regulations as well as continue to implement routine field activities within the MBNMS.

Proposed revisions to the sanctuary management plan focus on the sanctuary’s non-regulatory activities for sanctuary management. Proposed revisions include new actions plans to address
environmental concerns such as climate change, marine debris, coastal erosion and sediment management plans, Sanctuary Ecologically Significant Areas, the use of motorized personal watercraft in the sanctuary, and evaluating offshore wind energy and artificial reefs. Revisions will also be made to existing action plans to address wildlife entanglement, anthropogenic ocean noise, invasive species, visitor center programs, research and monitoring at Davidson Seamount and Sur Ridge, and media for education, outreach, and communications.

Proposed revisions to the sanctuary-wide regulations include technical revisions as well as the following:

- Beneficial use of dredged material: A definition for the phrase “beneficial use of dredged material” will be added along with new regulatory language to clarify that MBNMS has the authority to authorize the beneficial use of clean and suitable dredged material for habitat restoration purposes within the sanctuary. Beneficial use of dredged material would require a sanctuary permit or authorization, which may require a separate consultation under the ESA and/or EFH, in addition to other environmental reviews.

- Motorized personal watercraft access to the riding zone at Mavericks surf break: Regulations would be revised to allow motorized personal watercraft access to Mavericks during High Surf Advisory conditions. This revision would increase access by approximately three to five more days per year. The purpose of this revision is to provide safety assistance to surfers during High Surf Advisory conditions.

- Motorized personal watercraft zone boundary changes: Boundaries for four zones (Half Moon Bay, Santa Cruz, Moss Landing, and Monterey) would be revised to reduce the number of deployed boundary buoys from 15 to 9. This would reduce the associated navigational hazards, aesthetic impacts, mooring failures, and maintenance efforts needed.

Routine field activities include:

- Vessel Operations: to support on-the-water research, sampling, and monitoring activities; routine maritime heritage activities; resource protection and stewardship; and on-the-water monitoring and enforcement activities. Vessel operations are generally conducted using three vessels shared among the Cordell Bank, Greater Farallones, and Monterey Bay national marine sanctuaries. Vessels are operated according to NOAA Small Boat Program guidelines and additional voluntary guidelines to minimize impacts to sanctuary resources. MBNMS estimates up to 90 days at sea per year for all three vessels.

- Vessel Maintenance: Vessels are hauled out annually for dry dock maintenance and undergo minor maintenance up to 10 times per year.

- Scuba and Snorkel Operations: to support on-the-water research, sampling, and monitoring activities; routine maritime heritage activities; and resource protection and stewardship. MBNMS estimates NOAA staff will conduct up to 250 dives per year.

- Onshore Fieldwork: includes collection of water samples at storm drain outfalls or from creeks and rivers, visual beach surveys to record marine bird and mammal strandings, and other monitoring activities. Onshore fieldwork can also include restoration projects, eradication of introduced species, and removal of marine debris or grounded vessels.
MBNMS estimates up to 1200 person days per year for beach and water quality surveys and up to 60 person days per year for grounded vessels.

- Operations of Non-motorized Craft: to support education, outreach, and citizen science activities. Operations include docents out on kayaks to interact with the public. MBNMS estimates up to 50 days at sea per year for up to 50 docents.

- Deployment of Equipment on the Seafloor: to support research and monitoring. MBNMS deploys equipment on the seafloor, including water sampling devices, hydrophones, particle traps, weighted markers, and camera systems. MBNMS also deploys and maintains mooring hardware on the seafloor for deployment of buoy-based scientific equipment and marker buoys. MBNMS estimates up to 20 deployments of equipment per year and up to 15 buoy deployments per year.

- Deployment of Autonomous Underwater Vehicles (AUVs), Remotely Operated Vehicles (ROVs), Gliders, and Drifters: to support resource protection and research, routine maritime heritage activities, and resource damage assessments. MBNMS estimates up to 40 ROV deployments, 20 AUV deployments, 8 drifter deployments, and 7 glider deployments per year. MBNMS would also support deployment of AUVs, ROVs, gliders, and drifters by other individuals and organizations; those deployments would require an MBNMS permit and may require an individual EFH consultation.

- Aircraft Operations: to support mapping, monitoring, enforcement, and emergency response activities. Aircraft operations include the use of aerial drones for research. MBNMS estimates up to 40 flight hours per year. If occurring below 1,000 feet within the MBNMS, individual permits are required.

ONMS determined that the proposed revisions to the management plan and regulations would not adversely affect EFH and that routine field activities would have minimal adverse effects on EFH. ONMS cited NMFS’ 2016 General Concurrence, in which NMFS concurred with ONMS’ determination that field operations would have minimal adverse effects on EFH, except for the removal of large marine debris and the removal or relocation of grounded vessels. ONMS again analyzed the potential effects of removing or relocation grounded vessels and determined that this activity would result in minimal adverse effects on EFH. However, ONMS subsequently decided to address the removal of grounded vessels in a separate EFH consultation.

NMFS reviewed the ONMS request and determined that the proposed revisions to the MBNMS management plan and regulations would not adversely affect EFH. NMFS also determined that the routine field activities continue to meet the criteria under 50 CFR 600.920(g)(2) and qualify for inclusion in the General Concurrence, except for the removal of large marine debris and the removal or relocation of grounded vessels. We cannot adequately anticipate the size or frequency of effects from activities such as the removal of large marine debris and the removal or relocation of grounded vessels. Therefore, these activities do not meet the criteria under 50 CFR 600.920(g)(2)(i)(A) – The actions must be similar in nature and similar in their impact on EFH – and should be consulted on individually as necessary.

Each time ONMS conducts routine field activities (including removal of large marine debris, removal or relocation of grounded vessels, and other field operations listed above), ONMS must review the expected effects of the activities. ONMS is required to consult with NMFS on
activities that may result in more than minimal adverse effects on EFH both individually and cumulatively.

NMFS requests that ONMS track the actions covered by this General Concurrence and provide an official annual report to NMFS, due on January 1st each year. The annual report should include the number and type of actions, the amount and type of EFH adversely affected, and the baseline environmental conditions against which the effects are being evaluated. Failure to fulfill this requirement will invalidate the General Concurrence until this requirement is met.

ONMS shall reinitiate consultation if any activities are substantially revised in a manner that may adversely affect EFH, or if new information becomes available that affects the basis for NMFS’ EFH Conservation Recommendations (50 CFR 600.920(1)). ONMS and NMFS agree to complete a review of this General Concurrence every five years for revision, amendment, and renewal. NMFS reserves the option to revoke this agreement at any time. Should NMFS determine at any time that modifications or revocation has become necessary, we will notify you as early as possible.

Thank you for consulting with NMFS. Please direct questions regarding this letter to Susan Wang at Susan.Wang@noaa.gov.

Sincerely,

Chris Yates
Assistant Regional Administrator
West Coast Region
Protected Resources Division

cc: Bridget Hoover, MBNMS
Sophie Godfrey-McKee, MBNMS
Joel Casagrande, NMFS WCR
Dan Lawson, NMFS WCR
Josh Fuller, NMFS WCR
Penny Ruvelas, NMFS WCR

bcc: CHRON File (pdf)
Division - File copy
Administrative Record Number: 151422WCR2020PR00234
Ms. Julianne Polanco  
California State Historic Preservation Officer  
Office of Historic Preservation  
1725 23rd Street, Suite 100  
Sacramento, CA 95816  

NOTIFICATION OF “NO ADVERSE EFFECT” DETERMINATION REGARDING THE UPDATE OF THE MONTEREY BAY NATIONAL MARINE SANCTUARY MANAGEMENT PLAN  

Dear Ms. Polanco:  

NOAA’s Office of National Marine Sanctuaries (ONMS) is notifying you of the proposed revised management plan and revised regulations for Monterey Bay National Marine Sanctuary (MBNMS), as described in the attached draft environmental assessment (EA). The draft EA analyzes NOAA’s proposed action to implement routine field activities, update the sanctuary’s management plan, and update sanctuary-wide regulations. NOAA’s proposed action is intended to continue the protection of living marine resources and their habitats in MBNMS and nationally significant seascapes and maritime heritage resources that include shipwrecks, while allowing compatible recreational and commercial uses, as outlined in the National Marine Sanctuaries Act (NMSA; 16 U.S.C. §§1431 et seq.). The documents are available for public comment until September 4, 2020 at https://www.regulations.gov/docket?D=NOAA-NOS-2020-0094.  

Description of the Proposed Action  

In accordance with Section 304(e) of the NMSA, NOAA conducted a review of the management plan for MBNMS to evaluate substantive progress toward implementing the management plan and goals for the sanctuary, and make revisions to the plan and regulations as necessary to fulfill the purposes and policies of the NMSA. Through this public process, NOAA identified environmental concerns and management priorities for inclusion in the proposed new management plan and revised regulations. As part of the management plan review process, NOAA has published a proposed new management plan and proposed changes to the MBNMS regulations.  

The proposed new sanctuary management plan revises the 2008 management plan, and focuses on how best to understand and protect the sanctuary’s resources. The management plan includes 14 action plans grouped into issue- and program-based themes to guide NOAA staff over the coming decade. During the management plan review process, NOAA identified the following new environmental concerns to be addressed in the proposed new management plan:  

- Climate change;  
- Implementation of coastal erosion and sediment management plans;
□ Marine debris;
□ Impacts to and management options for Sanctuary Ecologically Significant Areas;
□ Assessing use of motorized personal watercraft in the sanctuary; and,
□ Evaluating offshore wind energy and artificial reefs.

The proposed new management plan would address these issues through education and outreach, research and monitoring, collaborative planning and management efforts, regulation, and enforcement.

During the management plan review process, NOAA also identified proposed regulatory changes to address resource protection concerns in the sanctuary. The proposed rule would:

1. Add a definition for the “beneficial use of dredged material.” The new definition would clarify that the existing prohibition on permitting the disposal of dredged material in Monterey Bay National Marine Sanctuary does not apply to habitat restoration projects using clean dredged sediment material because such a beneficial use of dredged material would not be considered “disposal.”
2. Reduce the sea state condition required for motorized personal watercraft access to the Mavericks seasonal-conditional zone.
3. Correct an administrative error to properly document the list of exempted Department of Defense activities within the Davidson Seamount Management Zone.
4. Modify the boundaries of four existing year-round motorized personal watercraft zones.

Effects Determination
Pursuant to NHPA section 106 and implementing regulations at 36 CFR Part 800, and as part of the NEPA compliance process, NOAA submits the proposed undertaking for your review, requesting concurrence on our finding of “No Adverse Effect” to historic properties for the proposed action and alternatives presented in the draft EA.

Section 4.5 of the enclosed EA includes NOAA’s identification of historic properties in the area of potential effects. Chapter 5 of the enclosed EA includes NOAA’s analysis of the potential impacts of the proposed action and alternatives. Based on this analysis and the application of the Section 106 adverse effect criteria, NOAA has determined that this undertaking would result in no adverse effects to historic properties due to the following factors:

□ This undertaking is a planning and administrative effort not likely to have current physically direct or indirect effects to potential historic properties.

NOAA respectfully requests your response within 30 days of receiving this consultation request. Please contact Robert.Schwemmer@noaa.gov if you have any questions or concerns about the Project.

Sincerely,

[Signature]
Paul Michel
Superintendent
NOAA's Office of National Marine Sanctuaries (ONMS)

draft EA analyzes NOAA's proposed action to implement routine field activities, update the sanctuary's wide regulations. NOAA's proposed act of no adverse effect to historic properties affected for this undertaking and seeks concurrence.

- includes NOAA's identification of historic properties in the area of potential effects. Chapter 5 of the enclosed EA includes NOAA's

"This undertaking is a planning and administrative effort not likely to have current"
revised regulations for the Monterey Bay National Marine Sanctuary (MBNMS) and finds that there will be no adverse effects to historic properties by this undertaking and seeks concurrence that their finding is appropriate pursuant to 36 CFR 800. (3)(a)(1), *Initiation of the Section 106 Process*. Following review of the documentation, the following comments are offered:

The regulation at 36 CFR 800 (3)(a)(1), *Initiation of the Section 106 Process* states in full:

- (a) Establish undertaking. The agency official shall determine whether the proposed Federal action is an undertaking as defined in § 800.16(y) and, if so, whether it is a type of activity that has the potential to cause effects on historic properties.
- (1) No potential to cause effects. If the undertaking is a type of activity that does not have the potential to cause effects on historic properties, assuming such historic properties were present, the agency official has no further obligations under section 106 or this part.

As NOAA-ONMS states that it has determined that this undertaking is a planning and administrative effort not likely to have current physically direct or indirect effects to potential historic properties, NOAA-ONMS has determined it has no further obligations under Section 106. Therefore, the SHPO has no comments for the action as described and documented.

Should you require further information, please contact Lead Reviewer, Jeanette Schulz at Jeanette.Schulz@parks.ca.gov or (916) 445-7031.

Sincerely,

Julianne Polanco
State Historic Preservation Officer

cc: Ms. Bridget Hoover, Director, Water Quality Protection Program
Monterey Bay National Marine Sanctuary
Appendix E: 
Department of Defense Exempted Activities in Davidson Seamount Management Zone

The current Monterey Bay National Marine Sanctuary (MBNMS) regulation at 15 CFR 922.132(c)(1) states, in part, that a list of exempted Department of Defense (DOD) activities at the Davidson Seamount Management Zone (DSMZ) is published in the 2008 MBNMS Management Plan Final Environmental Impact Statement (FEIS). However, due to an administrative error, the list of exempted activities (identified in a December 18, 2006 letter to NOAA from the U.S. Air Force 30th Space Wing) was never included in the 2008 FEIS. The MBNMS Superintendent subsequently confirmed in a January 5, 2009 letter to the U.S. Air Force 30th Space Wing that NOAA acknowledged the list of exempted activities as valid from the effective date of inclusion of the DSMZ within MBNMS (March 9, 2009) and that NOAA would subsequently correct the administrative record and regulations to properly document the exempted DOD activities within the DSMZ.

Accordingly, NOAA proposes to modify 15 CFR 922.132(c)(1) by replacing “2008 Final Environmental Impact Statement” with “2020 Environmental Assessment for MBNMS Management Plan Review”. This appendix serves as the published list of exempted DOD activities within the DSMZ referenced and confirmed by the MBNMS Superintendent’s January 5, 2009 letter to the U.S. Air Force 30th Space Wing. NOAA herein affirms that the exemptions requested by the Air Force in 2006 and confirmed by NOAA in 2008 have been valid since the effective date of the DSMZ’s addition to MBNMS - March 9, 2009.

The December 18, 2006 letter to NOAA from the U.S. Air Force 30th Space Wing identifying existing DOD activities at the DSMZ, and NOAA’s March 9, 2009 affirmation letter to the U.S. Air Force 30th Space Wing are included in this appendix.

Below is a summarized list of U.S. Air Force exempted activities within the DSMZ:

1) **Spacelift Operations**
   a. Rocket launches for the purpose of inserting satellites into orbit.
   b. In-flight jettisoning into the ocean of spent booster stages, strap-on boosters, and other launch vehicle debris (including residual propellant).
   c. Discharge into the ocean of launch vehicle debris from positive flight termination actions that halt thrust or destroy vehicles following non-nominal trajectories.

2) **Intercontinental Ballistic Missile (ICBM) Testing**
   a. Missile launches for the purpose of testing ICBMs.
   b. In-flight jettisoning into the ocean of spent booster stages, strap-on boosters, and other launch vehicle debris (including residual propellant).
   c. Discharge into the ocean of launch vehicle debris from positive flight termination actions that halt thrust or destroy vehicles following non-nominal trajectories.

3) **Missile Defense Testing and Operations**
   a. Missile defense tests that destroy both attack and target vehicles in-flight.
   b. In-flight jettisoning into the ocean of spent booster stages, post-boost vehicles, and other launch vehicle debris (including residual propellant).
c. Discharge into the ocean of launch vehicle debris from purposeful mid-air impact and multiple launch vehicle destruction.

d. Discharge into the ocean of launch vehicle debris from positive flight termination actions that halt thrust or destroy vehicles following non-nominal trajectories.

4) Aircraft Operations and Short/Medium Range Missile Testing

a. Testing of military and civilian aircraft, ballistic missiles, guided missiles, anti-aircraft artillery, and other weapon systems, launched over the ocean from land, sea, and air.

b. Routine military aircraft operations (fixed-wing and rotary wing), such as training, transfer, and transport.

c. Discharge into the ocean of flares, chaff, sea dye, and other debris related to aircraft training operations.

d. Water survival training, including, but not limited to, simulated emergency egress through a cockpit frame, life raft deployment and use, low-altitude helicopter evacuation operations.

e. Discharge into the ocean of aircraft debris from positive flight termination actions that halt thrust or destroy vehicles following non-nominal trajectories.
Mr. Ronald Cortopassi  
30 SW/CD  
747 Nebraska Boulevard, Suite 201  
Vandenberg Air Force Base, California 93437-5000  

Dear Mr. Cortopassi:  

This letter acknowledges and identifies previous and ongoing United States Air Force (USAF) activities in and adjacent to the Davidson Seamount area (off central California) that are exempted from federal prohibitions for the Monterey Bay National Marine Sanctuary (MBNMS or Sanctuary).  

Two years ago, the National Marine Sanctuary Program (NMSP) of the National Oceanic and Atmospheric Administration (NOAA) published for public review and comment a Draft Management Plan and Environmental Impact Statement for the MBNMS. Subsequently, the NMSP received a 6-page correspondence (enclosure 1) from you on behalf of the 30th Space Wing dated December 18, 2006.  

Your letter and attachment identified several previous and ongoing activities by the USAF in the vicinity of the Davidson Seamount, an underwater formation that had been identified in NOAA’s Draft Management Plan for potential inclusion within the boundaries of the MBNMS. Specifically, the USAF requested that certain activities be exempted from any future MBNMS prohibitions promulgated for the Davidson Seamount.  

On November 20, 2008, NOAA published a Final Rule (73 FR 70488) that, among other things, expanded the boundaries of the MBNMS to incorporate the waters and submerged lands of the Davidson Seamount area, henceforth referred to as the Davidson Seamount Management Zone (DSMZ). Page 70537 of the Final Rule (enclosure 2) includes revised regulatory text for 15 CFR 922.132(c)(1) providing that military activities listed in the 2008 MBNMS Final Environmental Impact Statement (FEIS) are exempted from the indicated MBNMS prohibitions within the DSMZ. However, due to an error, pre-existing military activities in the DSMZ were not listed in the FEIS as intended.  

This letter thus serves as official acknowledgement and confirmation by the NMSP, NOAA that the activities specifically identified in the USAF December 18, 2006 letter to the NMSP (enclosure 1) are exempted from the indicated MBNMS prohibitions within the DSMZ. In the remainder of the MBNMS, only those USAF activities specifically identified in the 1992 MBNMS FEIS are exempt from the indicated Sanctuary prohibitions. New activities may be exempted from MBNMS prohibitions by the Director of the Office of National Marine Sanctuaries, NOAA after consultation between the Director and the Department of Defense. Should any discharges occur within the Sanctuary such as those described in your December 18, 2006 comment letter, or other incidents, please notify our office as soon as possible in accordance with the regulatory requirements of 15 CFR 922.132(c)(2) (enclosure 2).
The USAF has been cooperative throughout the management plan revision process, and we appreciate your participation. We apologize for the omitted list of USAF activities in the FEIS. Thank you for bringing this to our attention. If you have any further questions regarding USAF exemptions applicable within the DSMZ or other parts of the MBNMS, please do not hesitate to contact me.

Sincerely,

[Signature]
Paul Michel
Superintendent

Enclosures: (2)

cc: Walter Schobel, USAF
    Daniel J. Basta, NOAA
    William Douros, NOAA
DEPARTMENT OF THE AIR FORCE
30TH SPACE WING (AFSPC)

Mr. Ronald Cortopassi
30 SW/CD
747 Nebraska Blvd, Suite201
Vandenberg AFB, CA 93437-5000

Brady Phillips
JMPR Coordinator
NOAA-National Marine Sanctuary Program
1305 East-West Hwy, NORM-6
Silver Spring, MD 20910

Dear Mr. Phillips,

The 30th Space Wing (30 SW) appreciates the opportunity to comment on the proposed changes to 15 CFR Part 922, and will continue, to the maximum extent practicable as has been done in the past, avoid any adverse impacts to the Monterey Bay National Marine Sanctuary. In particular, 30 SW concurs with the language found on section 922.132(c) of the proposed regulation.

The 30 SW located at Vandenberg AFB conducts military activities off the Coast of California. Some of these operations are conducted within the scope of the Monterey Bay National Marine Sanctuary Draft Management Plan/Environmental Impact Statement. Per the Federal Register/Vol. 71, No. 194/Friday, October 6, 2006/Proposed Rules, Page 59062, Paragraph 922.132 (c ) (1), (All Department of Defense Activities...), we are submitting the required documentation to be incorporated within the Final Draft Management Plan/Environmental Impact Statement describing our military activities to be exempt from Sanctuary regulations (Attachment 1).

If you any questions, or need any clarifications, please call me at 805-606-4752.

RONALD B. CORTOPASSI, GM-15
Executive Director

Attachment:
30th Space Wing Military Activities

cc: Sean Morton, NOAA

GUARDIANS OF THE HIGH FRONTIER

Enclosure 1
Appendix E

17 Oct 2006

Vandenberg AFB Baseline Activities
Monterey Bay National Marine Sanctuary (MBNMS)
Draft Management Plan

1.0 Overview

Vandenberg Air Force Base (AFB) is located on California’s central coast between Los Angeles and San Francisco, about 55 miles northwest of Santa Barbara. Vandenberg’s unique location provides 42 miles of Pacific Ocean shoreline, over 99,000 acres of varied terrain and restricted airspace for spacelift, ballistic test, aeronautical operations, and military exercises. A 15,000-foot runway, boat dock, railway system and several major highways service Vandenberg AFB.

Most of Vandenberg’s coastline faces West, with the remainder facing South. This unique geography permits a wide range of over-ocean launch azimuths, from the southeast to the northwest. Vandenberg is the only location in the continental United States where spacecraft can be launched into polar orbit without overflying land. Additionally, the West Coast Offshore Operating Area (WCLOA) provides approximately 200,000 square miles of over-water and sea-land transition zones for launch, aeronautical and cruise missile testing/operations.

2.0 Vandenberg AFB Activities

The types of activities conducted at Vandenberg AFB, which may have an impact on marine resources, can be categorized into the following areas:

- Spacelift Operations
- Intercontinental Ballistic Missile (ICBM) Testing
- Missile Defense Testing and Operations
- Aircraft Operations and Short/medium Range Missile Testing

A description of each category is provided below.

2.1 Spacelift Operations

Spacelift operations consist of launching rockets for the purpose of inserting satellites into earth orbit. Launch vehicles, such as, but not limited to Atlas, Delta, and Pegasus, are generally composed of multiple stages that are stacked one upon another. Each stage consists of a rocket motor and a supply of propellant (fuel and oxidizer). After the propellant in one stage is consumed, the entire stage is jettisoned from the rest of the launch vehicle and the next stage is ignited to resume powered flight. Some launch vehicles are configured with two or more strap-on boosters, which are attached to the

Enclosure 1

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sides of the launch vehicle. Strap-on boosters and the vehicle’s first stage are fired concurrently in order to provide additional thrust during the initial minutes of flight.

Spent booster stages, strap-on boosters, and other launch vehicle debris are jettisoned into the Pacific Ocean during spacelift operations. Ground launches from Vandenberg (e.g., Delta and Atlas) are not expected under any circumstance to impact the Monterey Bay National Marine Sanctuary (MBNMS), but air-launched vehicles (i.e., Pegasus) could. Historically our launch rates for spacelift have varied and our future launch rates are subject to change based on mission need. From 2000-2005, there have been at total of 30 spacelift operations, or an average of 5 launches per year. In 1966, the number of spacelift launches peaked at about 48 in that year alone. A large majority of these launches were ground-based and did not impact the MBNMS. The small number of launches that were air-based could have resulted in debris being deposited in or near the MBNMS.

As previously mentioned, a typical booster stage consists of a rocket motor and a large tank used for storing propellant. Booster stages of air-launched vehicles of the type that can impact the MBNMS are less than 30 feet in height. Comparatively, the size of ground-launched booster stages vary from vehicle to vehicle, but some of the larger booster stages can have a 10-foot diameter and be nearly 90 feet in height. Large strap-on boosters can have a 10-foot diameter and exceed 110 feet in height. Booster stages, which consist primarily of metal components, fall into the ocean after their propellant has been consumed. Residual amounts of propellant may reside inside booster stages when they fall into the ocean.

Jettisoned objects sink to the ocean floor and are not recovered due to the extreme difficulty in locating and recovering such objects in deep ocean waters. Furthermore, the high costs associated with deep recovery operations would be prohibitive. On rare occasion, launch anomalies occur. Various sized fragments from a destroyed vehicle as well as pieces of unburned solid propellants could be dispersed over a wide area potentially inside portions of the MBNMS. Liquid propellants would likely burn during the explosion or evaporate shortly thereafter.

The Department of Defense (DoD), the National Aeronautics and Space Administration (NASA), other government agencies, and various commercial enterprises conduct spacelift operations at Vandenberg AFB. As the appointed executive agent for space, the AF is responsible for ensuring public safety. As such, positive control measures are employed during all missile and space launch activities. All launch vehicles are equipped with flight termination packages and tracking systems that offer operators the ability to terminate thrust or destroy vehicles that follow non-nominal trajectories. DoD personnel are entrusted with this responsibility during powered flight (that phase of flight when thrust is provided by engines/motors that may include overflight near the MBNMS). In this role, the DoD is responsible for positive flight termination actions taken for all launches whether they are DoD, civil or commercial in nature.
2.2 ICBM Testing

Vandenberg AFB is the primary location in the United States where ICBMs are launched for testing purposes. Ballistic missiles, such as, but not limited to, Minuteman, are usually launched to targets located near the Kwajelein Atoll in the Western Pacific; however, some missiles are launched to targets in other broad ocean areas. The marine impact of ballistic missile testing is similar to the impact of space lift operations.

Spent booster stages fall into the Pacific Ocean during ICBM testing operations. Highly variable testing configurations result in jettisoned objects falling over a wide area of the ocean. Jettisoned objects and other missile debris sink to the ocean floor and are not recovered due to the extreme difficulty in locating and recovering such objects in deep ocean waters. Furthermore, the high costs associated with deep recovery operations would be prohibitive. Deposition of ICBM stages into the MBNMS would be rare, but could happen.

In the event of ICBM launch anomalies, variously sized fragments from a destroyed vehicle as well as unburned solid propellants and some unburned liquid propellant (upper stages such as post boost vehicles), could be dispersed over a very wide area and potentially inside portions of the MBNMS. Such launch anomalies are rare.

ICBM operations at Vandenberg AFB are conducted by the Department of Defense (DoD). As the appointed executive agent for space, the AF is responsible for ensuring public safety. As such, positive control measures are employed during all missile and space launch activities. All launch vehicles are equipped with flight termination packages and tracking systems that offer operators the ability to terminate thrust or destroy vehicles that follow non-nominal trajectories. DoD personnel are entrusted with this responsibility during powered flight (that phase of flight where ICBM stages or debris could be deposited into or near the MBNMS).

2.3 Missile Defense Testing and Operations

Missile defense testing operations also occur from Vandenberg AFB, where a target is destroyed down range by an interceptor missile, laser, or other weapon system. Missile intercept operations result in debris being dispersed over a wide area of the ocean and potentially inside portions of the MBNMS. In addition to missile defense testing operations, a number of operational interceptors are on alert at Vandenberg AFB in the even of an actual missile attack on the United States.

Spent booster stages fall into the Pacific Ocean during missile defense testing operations. Highly variable testing configurations result in jettisoned objects falling over a wide area of the ocean. Jettisoned objects and other missile debris sink to the ocean floor and are not recovered due to the extreme difficulty in locating and recovering such objects in deep ocean waters. Furthermore, the high costs associated with deep recovery operations would be prohibitive. Depositing stages from missile defense testing in the MBNMS would be rare, but could happen.
In the event of a missile defense launch, variously sized fragments from a destroyed vehicle as well as unburned solid propellants and some unburned liquid propellant (upper stages such as post boost vehicles), could be dispersed over a very wide area and potentially inside portions of the MBNMS. Such launch anomalies are rare.

Missile defense testing operations at Vandenberg AFB are conducted by the Department of Defense (DoD). As the appointed executive agent for space, the AF is responsible for ensuring public safety. As such, positive control measures are employed during all missile and space launch activities. All launch vehicles are equipped with flight termination packages and tracking systems that offer operators the ability to terminate thrust or destroy vehicles that follow non-nominal trajectories. DoD personnel are entrusted with this responsibility during powered flight (that phase of flight where missile stages or debris could be deposited into or near the MBNMS).

2.4 Aircraft Operations, Space Operations, and Short/Medium Range Missile Testing

Extending 200 miles offshore and traversing the entire west coast of the United States, the West Coast Offshore Operating Area (WCOOA) provides the ideal airspace for testing military and civilian aircraft, ballistic missiles, guided missiles, and other weapon systems. Most WCOOA tests/operations are conducted off the California coast due to the stable air mass, utilizing radar, telemetry and optical sensors at Vandenberg AFB and the Naval Air Warfare Center at Point Mugu.

Different types of ballistic and guided missiles are launched from land, sea and air (over water) for various reasons, including, but not limited to, testing guided missiles, intercept technologies for a national missile defense system, and testing anti-aircraft artillery. The target area for some short range missiles may only be a couple miles offshore, which could result in missile debris being deposited into the MBNMS. Past aircraft overflight operations have occurred inside the MBNMS and such activity is expected to continue in the future.

Other operations conducted in the WCOOA consist of aircraft and aeronautical test operations. Airspace corridors (over-land and over-water) are routinely used for aircraft flight test operations. Additionally, aircraft from other military installations routinely use the 15,000-foot landing strip at Vandenberg AFB for refueling and training exercises. Training exercises, involving both fixed wing and rotor aircraft, are conducted at all altitudes within the MBNMS Study Area. Devices used for training include, but are not limited to, flares, chaff, and sea dye. Water survival training is also conducted within the study area, which consists of, but is not limited to, simulating emergency egress through a cockpit, practicing life raft usage, and hoisting people from the ocean. Low altitude flights near the shore are infrequent, but do occur occasionally.

Missile testing, space operations, and aircraft operations in the WCOOA are conducted by the Department of Defense. As the executive agent for space, the AF is responsible
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for ensuring public safety. As such, positive control measures are employed during all missile, aircraft, and space operations. Except for some small missile systems having a maximum affected flight area entirely over water and away from population areas, all vehicles are equipped with flight termination packages and tracking systems that offer operators the ability to terminate thrust or destroy vehicles that follow non-nominal trajectories. DoD personnel are entrusted with this responsibility during powered flight (that phase of flight where missile stages or debris could be deposited into or near the MBNMS).
Part III

Department of Commerce

National Oceanic and Atmospheric Administration

15 CFR Part 922
Gulf of the Farallones National Marine Sanctuary Regulations; Monterey Bay National Marine Sanctuary Regulations; and Cordell Bank National Marine Sanctuary Regulations; Final Rule
harvesting, aquaculture, or lawful fishing activities.

(4) Drilling into, dredging, or otherwise altering the submerged lands of the Sanctuary; or constructing, placing, or abandoning any structure, material, or other matter on or in the submerged lands of the Sanctuary, except as incidental and necessary to:
   (i) Conduct lawful fishing activities;
   (ii) Anchor a vessel;
   (iii) Conduct aquaculture or kelp harvesting;
   (iv) Install an authorized navigational aid;
   (v) Conduct harbor maintenance in an area necessarily associated with a Federal Project in existence on January 1, 1993, including dredging of entrance channels and repair, replacement, or rehabilitation of breakwaters and jetties;
   (vi) Construct, repair, replace, or rehabilitate a dock or pier; or
   (vii) Collect jade pursuant to paragraph (a)(1) of this section, provided that there is no constructing, placing, or abandoning any structure, material, or other matter on or in the submerged lands of the Sanctuary, other than temporary placement of an authorized hand tool as provided in paragraph (a)(1) of this section. The exceptions listed in paragraphs (a)(ii) through (a)(vii) of this section do not apply within the Davidson Seamount Management Zone.

(5) Taking any marine mammal, sea turtle, or bird within or above the Sanctuary, except as authorized by the Marine Mammal Protection Act, as amended, (MMPA), 16 U.S.C. 1361 et seq., Endangered Species Act, as amended, (ESA), 16 U.S.C. 1531 et seq., Migratory Bird Treaty Act, as amended, (MBTA), 16 U.S.C. 703 et seq., or any regulation, as amended, promulgated under the MMPA, ESA, or MBTA.

(6) Flying motorized aircraft, except as necessary for valid law enforcement purposes, at less than 1,000 feet above any of the four zones within the Sanctuary described in Appendix E to this subpart.

(7) Operating motorized personal watercraft within the Sanctuary except within the five designated zones and access routes within the Sanctuary described in Appendix E to this subpart. Zone Five at Pillar Point exists only when a High Surf Warning has been issued by the National Weather Service and is in effect for San Mateo County, and only during December, January, and February.

(8) Possessing within the Sanctuary (regardless of where taken, moved, or removed from), any marine mammal, sea turtle, or bird, except as authorized by the MMPA, ESA, MBTA, by any regulation, as amended, promulgated under the MMPA, ESA, or MBTA, or as necessary for valid law enforcement purposes.

(9) Deserting a vessel aground, at anchor, or adrift in the Sanctuary.

(10) Leaving harmful matter aboard a grounded or deserted vessel in the Sanctuary.

(11) (i) Moving, removing, taking, collecting, catching, harvesting, disturbing, breaking, cutting, or otherwise injuring, or attempting to move, remove, take, collect, catch, harvest, disturb, break, cut, or otherwise injuring, any Sanctuary resource located more than 3,000 feet below the sea surface within the Davidson Seamount Management Zone. This prohibition does not apply to fishing below 3,000 feet within the Davidson Seamount Management Zone, which is prohibited pursuant to 50 CFR part 660 (Fisheries off West Coast States).

(ii) Possessing any Sanctuary resource the source of which is more than 3,000 feet below the sea surface within the Davidson Seamount Management Zone.

(12) Introducing or otherwise releasing from within or into the Sanctuary an introduced species, except striped bass (Morone saxatilis) released during catch and release fishing activity.

(13) Attracting any white shark within the Sanctuary.

(14) Interfering with, obstructing, or preventing an investigator, search, seizure, or disposition of seized property in connection with enforcement of the Act or any regulation or permit issued under the Act.

(b) The prohibitions in paragraphs (a)(2) through (11) of this section do not apply to existing military activities carried out by the Department of Defense activities must be carried out in a manner that avoids to the maximum extent practicable any adverse impacts on Sanctuary resources and qualities. The prohibitions in paragraphs (a)(2) through (12) of this section do not apply to responding to an emergency threatening life, property, or the environment.

(12) All Department of Defense activities must be carried out in a manner that avoids to the maximum extent practicable any adverse impacts on Sanctuary resources and qualities. The prohibitions in paragraphs (a)(2) through (12) of this section do not apply to responding to an emergency threatening life, property, or the environment.

(13) All Department of Defense activities must be carried out in a manner that avoids to the maximum extent practicable any adverse impacts on Sanctuary resources and qualities.