Issued and signed MBNMS Permits, Amendments and Authorizations (8/6/2020 to 10/5/2020)

Report created for the

October 16, 2020

Monterey Bay National Marine Sanctuary Advisory Council Meeting

Letter of Authorization (LOA) under GFNMS-2019-001 and MBNMS-2019-001

Permit Type: Authorization

Permit Holder Name (Affiliation): Jan Roletto (GFNMS), Chad King (MBNMS), and Nicole Raineault (Ocean Exploration Trust)

Authorized Activity Description:

Authorized Activities Within GFNMS management area (GFNMS and northern MBNMS): Alteration and disturbance of the seabed to collect invertebrate specimens for the purpose of habitat characterization at and around the site; Alteration and disturbance of the seabed to collect soft sediment core samples (depth 18" by width 2.5") and rock samples for the purpose of habitat characterization at and around the site; Discharge and abandonment of up to 25 XBTs in the GFNMS management area; The discharge of no more than 8 Alvin steel ballast plates (each weighing 20 pounds and 12 x 9 x 0.5 inches in size) from the ROV to maintain proper buoyancy; and Small scale manipulation or removal of sanctuary resources for sanctuary research purposes, consistent with and benefiting the sanctuaries' goals and purposes.

Authorized Activities Within Davidson Seamount Management Zone of MBNMS: Alteration of the submerged lands of the Sanctuary by making bottom contact while using a remotely-operated vehicle (ROV) to complete initial surveys of the unexplored rocky habitat to characterize the area and document distribution and abundance of deep water corals, sponges, and fishes; Possessing any Sanctuary resource the source of which is more than 3,000 feet below the sea surface within the Davidson Seamount Management Zone to collect biological specimens to accurately describe and study the species observed. Samples may include some or all of the following: whale bones, coral branches, sponges, other invertebrates, fishes; Alteration of the submerged lands to collect benthic sediment samples for analyzing PCBs and organochlorine pesticides; Alteration of the submerged lands to collect hard rock samples for geological analyses; Recovery of two temperature loggers, one temperature/Dissolved Oxygen logger and two OSMO samplers in milk crates; Discharge and abandonment of up to 25 XBTs in MBNMS management area and within the Davidson Seamount Management Zone in support of multibeam mapping which is a backup objective if weather or other events prevent ROV dives at Davidson Seamount; The discharge of no more than eight (8) steel ballast plates (each weighing 20 pounds and 12 x 9 x 0.5 inches in size) from the ROV to maintain proper buoyancy when collecting rock samples; and Small scale manipulation or removal of sanctuary resources for sanctuary research purposes, consistent with and benefiting the sanctuaries' goals and purposes.

Authorized Activities Within MBNMS: Incidental discharge and recovery of an Argus float to measure water column properties (NOTE: the float is to be deployed outside of MBNMS and north of Davidson Seamount Management Zone but may drift into MBNMS prior to recovery).

Authorized Activity Location: Within GFNMS, MBNMS and Davidson Seamount Management

Zone of MBNMS

Permitted dates: through October 31, 2020

MULTI-2019-006-A2 **Permit Type:** Research

Permit Holder Name (Affiliation): Kortney Opshaug (Blue Ocean Gear Inc.)

Project Title: Developing and Testing of a Smart Crustacean Trap.

Project Location(s): Within MBNMS:

> 1)In the nearshore waters between Stinson Beach and the SF Pilot Buoy (located between approximately 37.876°N, -122.674°W and 37.806°N, -122.572°W).

> 2)In the nearshore waters of Half Moon Bay (located near 37.469°N, -122.522°W).

3) In Monterey Bay, within a ten-mile radius of the following coordinates (36.803°N, -121.966°W)

Within GFNMS:

4)In the nearshore waters of Bodega Bay, (located near 38.288°N, -123.019°W)

5) In the nearshore waters of the Point Reyes Peninsula (outside of Point Reyes National Seashore) (located between approximately 38°10'N, 123° 00'W and 37.939°N, -122.812°W)

Permitted Activity: The permittee is allowed to alter sanctuary submerged lands and discharge (deploy) and recover equipment to test smart crustacean traps (a.k.a. Smart Traps) for the purposes of research. Each Smart Trap unit is comprised of a standard commercial Dungeness crab trap (36" in diameter and 12" high), with sensors and/or triggers mounted on the entry and exit openings, connected in different deployment configurations (by either nylon rope or cable) to a standard crab trap surface buoy and a trailer of 5-10 Smart Buoys (all buoys are 6-8 inchesin-diameter). Each Smart Buoy has a GPS receiver, depth sensor, and accelerometer, along with communications electronics to transmit the sensor data. Smart Buoys will all be connected by a short length of 2 to 3 feet of rope between each buoy. The maximum length of rope and/or cable connecting the surface buoys to the crab trap will be 240 feet, and any excess line will be coiled up inside the trap depending on the depth at which the trap is set to avoid any excess line in the water. A maximum of 25 Smart traps may be deployed at each of the four locations.

Permitted dates: September 25, 2020 and November 30, 2021

Comments/Notes: GFNMS lead

MBNMS-2019-030-A1

Permit Type: Authorization

Permit Holder Name (Affiliation): Christopher Eng (United States Army Corps of Engineers) Authorized Activity Description: for Moss Landing Harbor Federal Channels Dredge Material Disposal Activities by the U.S. Army Corps of Engineers (USACE), San Francisco District. Authorized Activity Location: SF-14 or SF-12 and adjacent area for the temporary transport pipeline and sediment samples

Permitted dates: October 1, 2020 through December 31, 2020

MULTI-2019-019-A2

Permit Type: Research/Education

Permit Holder Name (Affiliation): Salvador Jorgensen (Institute of Marine Sciences, UCSC) **Project Title:** The Changing Distribution, Ecology, and Population Dynamics of White Sharks in the Northeastern Pacific

Project Location(s): Within GFNMS: 1) White shark attraction activities are permitted outside of 300 feet and within two (2) nautical miles of the Southeast Farallon Islands, around Point Reyes National Seashore, around Tomales Point, and offshore of Bodega Head and 2) Filming activities may occur in the same regions of the sanctuaries as all permitted White shark research activities listed above. Filming white sharks attracted to the vessel will only occur in conjunction with the authorized research activities in the authorized locations listed in this amended permit. Filming activities shall occur above the water; no diving or use of cages is allowed.

Within MBNMS: 3) White shark attraction activities are permitted offshore of Año Nuevo Island; and 4) Filming activities may occur in the same regions of the sanctuaries as all permitted White shark research activities listed above. Filming white sharks attracted to the vessel will only occur in conjunction with the authorized research activities in the authorized locations listed in this amended permit. Filming activities shall occur above the water; no diving or use of cages is allowed.

Permitted Activity:

White Shark Attraction, Tagging, ID, and Sampling

- 1. Attracting White sharks (*Carcharodon carcharias*) for the purposes of tagging, obtaining photographic and video images, and taking biopsy samples of White sharks in the following locations with the following limitations:
 - a) No more than 50 external acoustic tags (approx. 10 per each year this permit is valid) and 25 pop-up satellite archival tags (PAT) (approx. 5 per each year this permit is valid) may be deployed on the sharks' dorsal musculature throughout all locations authorized in this permit.
 - b) No more than 25 internal stomach tags (approx. 5 per each year this permit is valid) may be deployed by means of feeding sharks the tags embedded in a small piece of marine mammal blubber (less than 3 kilogram [kg]).
 - c) No more than 75 biologging clamp tags (approx. 15 per each year this permit is valid) may be deployed by using non-invasive dorsal fin clamps.
 - d) No more than 150 tissue samples (approx. 30 per each year this permit is valid) shall be taken using a small biopsy punch. These samples shall be taken in conjunction with the acoustic and satellite tagging.

White shark attraction activities can be conducted near Southeast Farallon Island, Tomales Point/Point Reyes, off Bodega Head and around Año Nuevo Island. Tagging, photo/video ID, and biopsy sampling may also be conducted between Salinas River and Capitola provided that no attractants (either decoys or scent or bait) are used. No stomach tags may be deployed in the area between Salinas River and Capitola.

- 2. Discharging into the sanctuaries scent from marine mammal blubber for attracting White sharks.
- 3. Temporarily discharging into the sanctuaries PAT tags, stomach tags, and clamp tags (intended to be retrieved although some may be lost to the marine environment) and permanently discharging acoustic tags (not intended to be retrieved) into the sanctuaries.

White shark attraction methods are limited to use of a decoy made of a soft material shaped into the silhouette of a local marine mammal and use of a small (i.e., less than 3 kg) piece of pinniped or cetacean blubber as specified in the Special Terms and Conditions of this permit. Attraction of white sharks is authorized only by these means and solely for the purpose of

scientific research (e.g., sport, recreational viewing, and unauthorized film making are prohibited).

<u>Filming</u>

Filming of White sharks for documentary and educational films by the Monterey Bay Aquarium is authorized in conjunction with the White shark research activities being conducted by Dr. Salvador Jorgensen, and authorized personnel in accordance with permit number MULTI-2019-019.

Permitted dates: September 25, 2020 through September 30, 2024

Comments/Notes: GFNMS lead; The permittee has been issued a scientific collection permit

(SCP) from the California Department of Fish and Wildlife (CDFW).

MBNMS-2017-037-A1 Permit Type: Research

Permit Holder Name (Affiliation): Jamie MacMahan and Mara Orescanin (Naval Postgraduate

School)

Project Title: Nearshore Processes: Cross-shore Exchange and Graduate Student Education **Project Location(s):** The permitted activities are allowed in MBNMS between Santa Cruz and Carmel River Beach.

Permitted Activity: Discharge and recovery of buoys, autonomous underwater vehicles (AUVs), moorings, and GPS-tracking drifters; Discharge of dye; Alteration of the submerged lands of the sanctuary for sediment collections; Placement on the submerged lands of the sanctuary for bottom-mounted frames, towers, and anchors for moorings; and Operation of motorized personal watercraft (MPWC) outside the MBNMS designated MPWC operating zones.

Permitted dates: October 1, 2020 through September 30, 2022

Comments/Notes: Amended to extend the valid dates of the permit for two years, update permitted activities and relevant Terms and Conditions to incorporate equipment (e.g. moorings, bottom mounted frames, MPWC (including DiveJets), and buoys) deployments for the Coastal Land-Air-Sea Interaction (CLASI) experiment, and added Special Terms and Conditions to mitigate disturbance of Black Oystercatcher (BLOY) nests at Hopkins, mitigate impacts to endangered or threatened species, prevent introduction of introduced species and mitigate equipment loss.

MBNMS-2020-024

Permit Type: Research

Permit Holder Name (Affiliation): Marko Jaakkola (ZIVKO Aeronautics and the Center for Interdisciplinary Remotely-Piloted Aircraft Studies (CIRPAS))

Project Title: Measuring meteorological and smoke conditions for boundary layer research **Project Location(s):** The permitted activity is allowed within NOAA regulated overflight zones offshore of Moss Landing, Santa Cruz and Big Sur in MBNMS

Permitted Activity: Conducting approximately 10 low overflights below 1000 feet, on the condition the CIRPAS Twin Otter aircraft is one nautical mile or greater from shore, to collect air samples for boundary layer research.

Permitted dates: September 15, 2020 through October 31, 2020

Comments/Notes: previous permits: MBNMS-2018-016, MBNMS-2016-012, MBNMS-2011-020 and (A1 through A4), MBNMS-2005-005 and MBNMS-2002-045

MBNMS-2020-023 Permit Type: Research

Permit Holder Name (Affiliation): Kirk Lynn (California Department of Fish and Wildlife

(CDFW))

Project Title: Coastal Pelagic Species Near-shore Cooperative Survey (CPS-NCS)

Project Location(s): The permitted activity is allowed within NOAA regulated overflight zones

offshore of Moss Landing, Santa Cruz and Big Sur in MBNMS.

Permitted Activity: The following activities supporting the development of sampling methodologies for estimating Coastal Pelagic Species (CPS) biomass are authorized by this permit: Approximately ten low overflights at no less than 500 feet above sea level (ASL) by manned aircraft to identify and assist in capture of sardine and anchovy schools by seine vessels.

Permitted dates: September 14, 2020 through June 30, 2021

Comments/Notes: Special Terms and Conditions include extensive mitigations for seabird, marine mammal and sea turtle harassment; previous overflights permitted by MBNMS-2019-020 and MBNMS-2019-023

MBNMS-2019-009-A2

Permit Type: Assist in Sanctuary Management

Permit Holder Name (Affiliation): Peggy Stap (Marine Life Studies, Whale Entanglement

Team)

Project Title: Derelict Crab Pot Retrieval Project Location(s): In Monterey Bay

Permitted Activity: Alteration of submerged lands of the sanctuaries for landing the ROV, removing lost crab pots, and incidental contact of the seafloor with a grapple, while catching the lines in the water column, and Discharge (deployment) for up to 48 hours and recovery for up to 40 buoys total and associated lines. Up to 10 buoys and associated lines may be deployed at one time in order to remove lost fishing gear from MBNMS for approximately ten (10) days during the off season of crab fishing (See Special Terms and Conditions for details).

Permitted dates: September 8, 2020 through November 1, 2021

Comments/Notes: A Designated Retriever may retrieve lost or abandoned trap gear in an area starting 15 calendar days after the commercial Dungeness crab fishing season closes in that area pursuant to Fish and Game Code Section 8276. Amendment A2 added permitting of discharge (deployment) for up to 48 hours and recovery for up to 40 buoys total and associated lines, the permitted location expanded to all of Monterey Bay, the expiration date was extended to 11/1/2021and the Special Terms and Conditions were updated.

MBNMS-2020-019 Permit Type: Education

Permit Holder Name (Affiliation): Frans Lanting (Frans Lanting Studio)

Project Title: From Wind to Whales: California's Bay of Life

Project Location(s): The permitted activity is allowed within NOAA regulated overflight zones offshore of Moss Landing, Santa Cruz, and Big Sur, specifically: Flying UAS at 200 feet ASL offshore of Moss Landing, Santa Cruz, Big Sur and the Pajaro River and Flying UAS at 50 feet AGL above the intertidal areas at Davenport, Garrapata-Soberanes coast and Pacific Grove. **Permitted Activity:** Flying Unmanned Aircraft Systems (UAS) at no less than 200 feet Above Sea Level (ASL) over water within NOAA regulated overflight zones in MBNMS to conduct approximately two flights per day for up to seven days at each location to collect aerial images

and video of wildlife and land/sea connections and Flying UAS at no less than 50 feet AGL over intertidal areas within NOAA regulated overflight zones in MBNMS to conduct approximately two flights per day for up to seven days at each location in order to collect aerial images and video of intertidal areas above water.

Permitted dates: September 1, 2020 through December 31, 2021

Comments/Notes: Footage will be provided to use as educational materials by ONMS. Permittee has a California Filming Permit (#2971). The permittee has been advised to apply for a Sea Otter Refuge Flyover Authorization from California Department of Fish and Wildlife (CDFW) to fly below 1000 feet over the Sea Otter Game Refuge in Big Sur.

MBNMS-2020-007

Permit Type: Research

Permit Holder Name (Affiliation): John Farrar (Woods Hole Oceanographic Institution) **Project Title:** National Aeronautics and Space Administration (NASA) Sub-Mesoscale Ocean

Dynamics Experiment (S-MODE) **Project Location(s):** within MBNMS

Permitted Activity: Temporary discharge of up to seven Slocum gliders to transit westward through MBNMS for up to 80 hours to conduct engineering tests to collect ocean horizontal and vertical velocity, temperature and salinity data. Up to seven 500-gram emergency ballast weights can be ejected and abandoned if a glider becomes stuck in a submerged state.

Permitted dates: August 26, 2020 through August 26, 2025 **Comments/Notes:** Pre-deployment notifications requested

MBNMS-2020-020 Permit Type: Research

Permit Holder Name (Affiliation): Alexander Bailess (University of California, Santa Cruz)
Project Title: The Development and Deployment of an Automated Spectrophotometer Network

to Track Plankton Dynamics in Monterey Bay

Project Location(s): in MBNMS at a depth of approximately 70 feet

Permitted Activity: Alteration of the submerged lands of MBNMS for anchoring a mooring to a rock and discharge and recovery of the mooring with approximately five spectrophotometers and a buoy for a three month deployment to determine phytoplankton behavioral patterns and spatial distributions.

Permitted dates: August 12, 2020 through November 15, 2020

Comments/Notes: The permittee is working with California Department of Fish and Wildlife

(CDFW) to determine if a Specific Use Permit is required

Letter of Authorization (LOA) under MBNMS-2019-001

Permit Type: Authorization

Permit Holder Name (Affiliation): Michelle Knight (Adventures by the Sea)

Authorized Activity Description: discharge and recovery of a buoy 50 yards offshore at Lovers Point beach in Pacific Grove and placement on the soft submerged lands of the

Sanctuary to deploy an anchor associated with the buoy

Authorized Activity Location: within MBNMS

Permitted dates: August 11, 2020 through December 31, 2023

Comments/Notes: The authorized user is working with California Department of Fish and

Wildlife (CDFW) to determine if a Specific Use Permit is required

If you are interested in learning more about a specific permit, amendment or authorization action, please contact:

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