



LETTER OF AUTHORIZATION

The University of California Santa Cruz's Partnership for the Interdisciplinary Studies of Coastal Oceans (UCSC/PISCO) is hereby authorized under section 101(a)(5)(A) of the Marine Mammal Protection Act (MMPA; 16 U.S.C. 1371(a)(5)(A)) to harass marine mammals incidental to rocky intertidal monitoring surveys along the Oregon and California coasts, subject to the provisions of the MMPA and the Regulations Governing the Taking of Marine Mammals Incidental to Research and Monitoring in Southern Alaska National Parks (50 CFR Part 217, Subpart C) (Regulations).

1. This Letter of Authorization (LOA) is valid for a period of five years from May 3, 2020 through April 11, 2025.
2. This LOA is valid only for specified activities associated with rocky intertidal monitoring surveys at specific sites along the Oregon and California coasts, described in the preamble to the Regulations.
3. General Conditions
 - (a) A copy of this LOA must be in the possession of UCSC/PISCO, its designees, and work crew personnel operating under the authority of this LOA.
 - (b) The species authorized for taking are the harbor seal (*Phoca vitulina richardii*), California sea lion (*Zalophus californianus*), northern elephant seal (*Mirounga angustirostris*), and Steller sea lion (*Eumetopias jubatus*).
 - (c) The taking, by Level B harassment only, is limited to the species listed in condition 3(b). See Table 1 (attached) for numbers of take authorized.
 - (d) The taking by injury (Level A harassment), serious injury, or death of any species listed in condition 3(b) of the Authorization or any taking of any other species of marine mammal is prohibited and may result in the modification, suspension, or revocation of this LOA.
 - (e) UCSC/PISCO must conduct briefings prior to the start of all monitoring surveys and when new personnel join the work, in order to explain responsibilities, communication procedures, marine mammal monitoring protocol, and operational procedures.

4. Mitigation Measures

The holder of this Authorization is required to implement the following mitigation measures:



- (a) Researchers must observe a site from a distance for at least five minutes, using binoculars if necessary, to detect any marine mammals prior to approach to determine if mitigation is required.
- (b) Researchers must approach a site with caution (slowly and quietly), keep bodies low to the ground, avoid making loud noises (i.e., using hushed voices) and avoid pinnipeds along access ways to sites by locating and taking a different access way if possible.
- (c) Researchers must avoid pinnipeds along access ways to sites by locating and taking a different access way. Researchers will keep a safe distance from and not approach any marine mammal while conducting research, unless it is absolutely necessary to flush a marine mammal in order to continue conducting research (i.e. if a site cannot be accessed or sampled due to the presence of pinnipeds).
- (d) Researchers must monitor the offshore area for predators (such as killer whales and white sharks) and avoid flushing of pinnipeds when predators are observed in nearshore waters.
- (e) Intentional approach must not occur if dependent pups are present. Staff shall reschedule work at sites where pups are present, unless other means of accomplishing the work can be done without causing disturbance to mothers and dependent pups.
- (f) Any site where northern fur seals or Guadalupe fur seals are present must not be approached and must be sampled at a later date.
- (g) Researchers must promptly vacate the sites at the conclusion of sampling.
- (h) Researchers must cease activities if authorized take numbers are met or if a species for which takes have not been authorized is present.

5. Monitoring

The holder of this LOA is required to conduct monitoring of marine mammals present at study sites prior to approaching the sites:

- (a) Project field biologists will function as marine mammal observers. Minimum qualifications for MMOs include an undergraduate degree in biology.
- (b) Information to be recorded must include the following:
 - (i) Species counts (with numbers of pups/juveniles) of animals present before approaching;
 - (ii) Number of disturbances, by species and age, according to a three-point scale of disturbance (see Table 2). Observations of disturbance Levels 2 and 3 must be recorded as takes.

- (iii) Descriptions of the disturbance behaviors during the monitoring surveys, including location, date, and time of the event.
- (iv) Information regarding physical and biological conditions pertaining to a site.
- (v) In addition, observations regarding the number and species of any marine mammals observed, either in the water or hauled out, at or adjacent to a site, are recorded as part of field observations during research activities.

6. Reporting

The holder of this Authorization is required to report as follows:

- (a) Report observations of unusual behaviors, numbers, or distributions of pinnipeds, or of tag-bearing carcasses, to NMFS Southwest Fisheries Science Center (858-546-7000).
- (b) Submit a draft annual monitoring report to NMFS Office of Protected Resources within 90 days after the conclusion of each field season. A final annual report must be prepared and submitted within 30 days following resolution of any comments on the draft report from NMFS. This report must contain the informational elements described above, at minimum. If no comments are received from NMFS, the draft annual report will be considered the final report.
- (c) Submit a draft final monitoring report to NMFS Office of Protected Resources within 60 days after the conclusion of the fifth year. The final annual report after year five may be included as part of the final report. A final report must be prepared and submitted within 30 days following resolution of any comments on the draft report from NMFS. This report must contain the informational elements described above, at minimum. If no comments are received from NMFS, the draft annual report will be considered the final report.
- (d) Reporting injured or dead marine mammals:
 - (i) In the unanticipated event that the specified activity clearly causes the take of a marine mammal in a manner prohibited by this LOA, such as an injury (Level A harassment), serious injury, or mortality, UCSC/PISCO must immediately cease the specified activities and report the incident to the Office of Protected Resources (301-427-8401), NMFS, and the West Coast Regional Stranding Coordinator (562-980-3230), NMFS. The report must include the following information:
 1. Time and date of the incident;
 2. Description of the incident;

3. Environmental conditions (e.g., wind speed and direction, Beaufort sea state, cloud cover, and visibility);
4. Description of all marine mammal observations in the 24 hours preceding the incident;
5. Species identification or description of the animal(s) involved;
6. Fate of the animal(s); and
7. Photographs or video footage of the animal(s)(if available).

Activities shall not resume until NMFS is able to review the circumstances of the prohibited take. NMFS will work with UCSC/PISCO to determine what measures are necessary to minimize the likelihood of further prohibited take and ensure MMPA compliance. UCSC/PISCO may not resume their activities until notified by NMFS.

- (ii) In the event that UCSC/PISCO discovers an injured or dead marine mammal, and the lead observer determines that the cause of the injury or death is unknown and the death is relatively recent (e.g., in less than a moderate state of decomposition), UCSC/PISCO must immediately report the incident to the Office of Protected Resources, NMFS, and the West Coast Regional Stranding Coordinator, NMFS.

The report must include the same information identified in 6(c)(i) of this LOA. Activities may continue while NMFS reviews the circumstances of the incident. NMFS will work with UCSC/PISCO to determine whether additional mitigation measures or modifications to the activities are appropriate.

- (iii) In the event that UCSC/PISCO discovers an injured or dead marine mammal, and the lead observer determines that the injury or death is not associated with or related to the activities authorized in the LOA (e.g., previously wounded animal, carcass with moderate to advanced decomposition, or scavenger damage), UCSC/PISCO must report the incident to the Office of Protected Resources, NMFS, and the West Coast Regional Stranding Coordinator, NMFS, within 24 hours of the discovery. UCSC/PISCO must provide photographs or video footage or other documentation of the stranded animal sighting to NMFS if available.

7. This Authorization may be modified, suspended or withdrawn if the holder fails to abide by the conditions prescribed herein, or if NMFS determines the authorized taking is having more than a negligible impact on the species or stock of affected marine mammals.

Donna S. Wieting,
Director, Office of Protected Resources,
National Marine Fisheries Service.

Date

Table 1. Authorized Take Numbers by Species

Species	Authorized Take
Harbor seal (<i>Phoca vitulina</i>)	1466
California sea lion (<i>Zalophus californianus</i>)	636
Northern elephant seal (<i>Mirounga angustirostris</i>)	156
Steller sea lion (<i>Eumetopais jubatus</i>)	25

Table 2. Levels of Pinniped Behavioral Disturbance

Level	Type of response	Definition
1	Alert	Seal head orientation or brief movement in response to disturbance, which may include turning head towards the disturbance, craning head and neck while holding the body rigid in a u-shaped position, changing from a lying to a sitting position, or brief movement of less than twice the animal's body length.
2	Movement	Movements in response to the source of disturbance, ranging from short withdrawals at least twice the animal's body length to longer retreats over the beach, or if already moving a change of direction of greater than 90 degrees.
3	Flush	All retreats (flushes) to the water.