

INCIDENTAL HARASSMENT AUTHORIZATION

The Port of Alaska (POA) and its designees are hereby authorized under section 101(a)(5)(D) of the Marine Mammal Protection Act (MMPA; 16 U.S.C. 1371(a)(5)(D)) to incidentally harass marine mammals, under the following conditions:

1. This incidental harassment authorization (IHA) is valid for one year from the date of issuance.
2. This IHA authorizes take incidental to construction activities, as specified in the POA's IHA application, associated with the North Extension Stabilization (NES) Step 1 (NES1) project at the existing port facility in Anchorage, Alaska. Hereafter (unless otherwise specified) the term "pile driving" is used to refer to both pile installation and pile removal.
3. General Conditions
 - (a) A copy of this IHA must be in the possession of the Holder of the Authorization (Holder), supervisory construction personnel, lead protected species observers (PSOs), and any other relevant designees of the Holder operating under the authority of this IHA at all times that activities subject to this IHA are being conducted.
 - (b) The species and/or stocks authorized for taking are listed in Table 1. Authorized take, by Level A and Level B harassment only, is limited to the species and numbers listed in Table 1.
 - (c) The taking by serious injury or death of any of the species listed in Table 1 or any taking of any other species of marine mammal is prohibited and may result in the modification, suspension, or revocation of this IHA. Any taking exceeding the authorized amounts listed in Table 1 is prohibited and may result in the modification, suspension, or revocation of this IHA.
 - (d) The Holder must ensure that construction supervisors, crews, contractors, other personnel operating at the site, the monitoring team, and relevant POA staff are

trained on all mitigation, monitoring, and reporting requirements, and all implementing protocols or procedures, as relevant to their respective role or position, prior to the start of activities subject to this IHA, so that responsibilities, communication procedures, monitoring protocols, and operational procedures are clearly understood. New personnel joining during the project must be trained prior to commencing work.

- (e) The Holder also must abide by the reasonable and prudent measures and terms and conditions of the [DATE] Biological Opinion and Incidental Take Statement (attached) issued by NMFS pursuant to section 7 of the Endangered Species Act.

4. Mitigation Requirements

- (a) The Holder must employ PSOs and establish monitoring locations as described in section 5 of this IHA and the Marine Mammal Monitoring Plan (see Appendix B in the POA's application)). The Holder must monitor the project area to the maximum extent possible based on the required number of PSOs, required monitoring locations, and environmental conditions.
- (b) Monitoring must take place from 30 minutes prior to initiation of pile driving activity (i.e., pre-start clearance monitoring) through 30 minutes post-completion of pile driving activity.
- (c) Pre-start clearance monitoring must be conducted during periods of visibility sufficient for the lead PSO to determine that the shutdown zones indicated in Table 2 are clear of marine mammals. Pile driving may commence following 30 minutes of observation when the determination is made that the shutdown zones are clear of marine mammals or when mitigation measures required specifically for beluga whales (condition 4(i) of this IHA) are satisfied.
- (d) If a marine mammal is observed entering or within the shutdown zones indicated in Table 2, pile driving activity must be delayed or halted. Pile driving must be commenced or resumed as described in condition 4(e) of this IHA.
- (e) If pile driving is delayed or halted due to the presence of a marine mammal, the activity may not commence or resume until either the animal has voluntarily exited and been visually confirmed beyond the shutdown zone indicated in Table 2 or 15 minutes (non-beluga species) or 30 minutes (beluga whales) have passed without re-detection of the animal.

- (f) The Holder must use soft start techniques when impact pile driving. Soft start requires contractors to provide an initial set of three strikes at reduced energy, followed by a 30-second waiting period, then two subsequent reduced-energy strike sets. A soft start must be implemented at the start of each day's impact pile driving and at any time following cessation of impact pile driving for a period of 30 minutes or longer.
- (g) Pile driving activity must be halted (as described in condition 4(d) of this IHA) upon observation of either a species for which incidental take is not authorized or a species for which incidental take has been authorized but the authorized number of takes has been met, entering or within the harassment zone (as shown in Table 2).
- (h) The Holder, construction supervisors and crews, PSOs, and relevant POA staff must avoid direct physical interaction with marine mammals during construction activity. If a marine mammal comes within 10 meters of such activity, operations must cease and vessels must reduce speed to the minimum level required to maintain steerage and safe working conditions, as necessary to avoid direct physical interaction.
- (i) POA must implement the following measures for Cook Inlet beluga whales:
 - (i) The POA must make all practicable efforts to complete construction activities between April and July.
 - (ii) Prior to the onset of pile driving or removal, should a beluga whale(s) be observed within the Level B harassment zone (Table 2), pile driving or removal must be delayed. Pile driving may not commence until the animal has voluntarily traveled at least 100 m beyond the Level B harassment zone (Table 2) and is on a path away from such zone, or the whale has not been re-sighted within 30 minutes.
 - (iii) If pile installation or removal has commenced, and a beluga whale(s) is observed within or likely to enter the Level B harassment zone, pile installation or removal must be delayed. Pile driving may not commence until the animal has voluntarily traveled at least 100 m beyond the Level B harassment zone (Table 2) and is on a path away from such zone, or the whale has not been re-sighted within 30 minutes.
 - (iv) If during pile driving, PSOs can no longer effectively monitor the entirety of the Cook Inlet beluga whale shutdown zone (Table 2) due to environmental conditions (e.g., fog, rain, wind), pile driving may continue

only until the current segment of pile is driven; no additional sections of pile or additional piles may be driven until conditions improve such that the monitoring zone can be effectively monitored. If the shutdown zone cannot be monitored for more than 15 minutes, the entire Level B harassment zone must be cleared again for 30 minutes prior to pile driving.

5. Monitoring Requirements

- (a) Marine mammal monitoring must be conducted in accordance with the conditions in this section and the POA's Marine Mammal Monitoring and Mitigation Plan (see Appendix B of the POA's IHA application) and this IHA.
- (b) Monitoring must be conducted by qualified, NMFS-approved PSOs, in accordance with the following conditions:
 - (i) PSOs must be independent of the activity contractor (for example, employed by a subcontractor) and have no other assigned tasks during monitoring periods.
 - (ii) A designated lead PSO must always be on site. This PSO must have prior experience performing the duties of a PSO during construction activity pursuant to a NMFS-issued incidental take authorization or Letter of Concurrence.
 - (iii) Other PSOs may substitute other relevant experience, education (degree in biological science or related field), or training for prior experience performing the duties of a PSO during construction activity pursuant to a NMFS-issued incidental take authorization.
 - (iv) The Holder must employ PSO stations at a minimum of two locations and ensure that the PSOs can effectively monitor the shutdown zones.
 - (v) Each PSO station must have a designated lead PSO specific to that station and shift. These lead PSOs must have prior experience working as a PSO during in-water construction activities.
 - (vi) PSOs stations must be elevated platforms constructed on top of shipping containers or a similar base that is at least 8' 6" high (i.e., the standard height of a shipping container) that can support up to three PSOs and their equipment. The platforms must be stable enough to support use of a

theodolite and must be located to optimize the PSO's ability to observe marine mammals and the harassment zones

- (vii) Each PSO station must have at least two PSOs on watch at any given time.
- (viii) If the Holder is conducting non-NES1-related in-water work that includes PSOs, the NES1 PSOs must be in real-time contact with those PSOs, and both sets of PSOs must share all information regarding marine mammal sightings with each other.
- (ix) PSOs must be approved by NMFS prior to beginning any activity subject to this IHA.
- (c) PSOs must record all observations of marine mammals, regardless of distance from the pile being driven, as well as the additional data indicated in section 6 of this IHA.

6. Reporting

- (a) The Holder must submit weekly and monthly monitoring reports (that include raw electronic data sheets) within 7 days after the conclusion of each calendar week, and 14 days after the conclusion of each calendar month, during the NES1 construction season. These reports must include a summary of marine mammal species and behavioral observations, construction shutdowns or delays, and construction work completed, during the reporting period. The weekly and monthly reports also must include an assessment of the amount of construction remaining to be completed (i.e., the number of estimated hours of work remaining), in addition to the number of beluga whales observed within estimated harassment zones to date.
- (b) The Holder must submit a draft summary monitoring report on all monitoring conducted under this IHA within 90 calendar days after the completion of monitoring or 60 calendar days prior to the requested issuance of any subsequent IHA for construction activity at the same location, whichever comes first. A final report must be prepared and submitted within 30 calendar days following receipt of any NMFS comments on the draft report. If no comments are received from NMFS within 30 calendar days of receipt of the draft report, the summary monitoring report shall be considered final.

- (c) All weekly, monthly, and draft and final summary monitoring reports must be submitted to *PR.ITP.MonitoringReports@noaa.gov* and *itp.tyson.moore@noaa.gov*.
- (d) The summary monitoring report must contain the informational elements described in the Monitoring Plan and, at minimum, must include:
 - (i) Dates and times (begin and end) of all marine mammal monitoring;
 - (ii) Construction activities occurring during each daily observation period, including:
 - A. The number and type of piles that were installed, removed, or cut and the method (e.g., impact, vibratory, hydraulic shearing, ultrathermic cutting); and
 - B. Total duration of time each method was used for each pile (vibratory driving, hydraulic shearing, ultrathermic cutting) and number of strikes for each pile (impact driving).
 - (iii) PSO locations during marine mammal monitoring;
 - (iv) Environmental conditions during monitoring periods (at beginning and end of PSO shift and whenever conditions change significantly), including Beaufort sea state and any other relevant weather conditions including cloud cover, fog, sun glare, and overall visibility to the horizon, and estimated observable distance;
 - (v) Upon observation of a marine mammal, the following information:
 - A. Name of PSO who sighted the animal(s) and PSO location and activity at time of sighting;
 - B. Time of sighting;
 - C. Identification of the animal(s) (e.g., genus/species, lowest possible taxonomic level, or unidentified), PSO confidence in identification, and the composition of the group if there is a mix of species;

- D. Distance and location of each observed marine mammal relative to the pile being installed, cut or removed for each sighting;
 - E. Estimated number of animals (min/max/best estimate);
 - F. Estimated number of animals by cohort (adults, juveniles, neonates, group composition, etc.);
 - G. Animal's closest point of approach and estimated time spent within the harassment zone;
 - H. Group spread and formation (for beluga whales only)
 - I. Description of any marine mammal behavioral observations (e.g., observed behaviors such as feeding or traveling), including an assessment of behavioral responses thought to have resulted from the activity (e.g., no response or changes in behavioral state such as ceasing feeding, changing direction, flushing, or breaching);
- (vi) Number of marine mammals detected within the harassment zones, by species; and
 - (vii) Detailed information about implementation of any mitigation (e.g., shutdowns and delays), a description of specific actions that ensued, and resulting changes in behavior of the animal(s), if any.
- (e) The Holder must submit all PSO data electronically in a format that can be queried such as a spreadsheet or database (*i.e.*, digital images of data sheets are not sufficient).
 - (f) Reporting injured or dead marine mammals:

In the event that personnel involved in the construction activities discover an injured or dead marine mammal, the Holder must report the incident to the Office of Protected Resources (OPR), NMFS (*PR.ITP.MonitoringReports@noaa.gov* and *itp.tyson.moore@noaa.gov*) and to the Alaska regional stranding network (1-877-925-7773) as soon as feasible. If the death or injury was clearly caused by the specified activity, the Holder must immediately cease the activities until NMFS OPR is able to review the circumstances of the incident and determine what, if any, additional measures are appropriate to ensure compliance with the terms of this IHA. The Holder must not resume their activities until notified by NMFS.

The report must include the following information:

- (i) Time, date, and location (latitude/longitude) of the first discovery (and updated location information if known and applicable);
- (ii) Species identification (if known) or description of the animal(s) involved;
- (iii) Condition of the animal(s) (including carcass condition if the animal is dead);
- (iv) Observed behaviors of the animal(s), if alive;
- (v) If available, photographs or video footage of the animal(s); and
- (vi) General circumstances under which the animal was discovered.

7. This Authorization may be modified, suspended or revoked by NMFS if the Holder fails to abide by the conditions prescribed herein (including, but not limited to, failure to comply with monitoring or reporting requirements), or if NMFS determines: (1) the authorized taking is likely to have or is having more than a negligible impact on the species or stocks of affected marine mammals, (2) the authorized taking is likely to have or is having an unmitigable adverse impact on the availability of the affected species or stocks for subsistence uses, or (3) the prescribed measures are likely not or are not effecting the least practicable adverse impact on the affected species or stocks and their habitat.

8. Renewals

On a case-by-case basis, NMFS may issue a one-time, one-year Renewal IHA following notice to the public providing an additional 15 days for public comments when (1) up to another year of identical, or nearly identical, activities (or a subset of those activities) are planned or (2) the specified activities will not be completed by the time the IHA expires and a Renewal would allow for completion of the activities, provided all of the following conditions are met:

- (a) A request for renewal is received no later than 60 days prior to the needed Renewal IHA effective date (note a Renewal IHA expiration date cannot extend beyond one year from expiration of this IHA).
- (b) The request for renewal must include the following:

- (i) An explanation that the activities to be conducted under the requested Renewal IHA are identical to the activities analyzed for this IHA, are a subset of the activities, or include changes so minor (e.g., reduction in pile size) that the changes do not affect the previous analyses, mitigation and monitoring requirements, or take estimates (with the exception of reducing the type or amount of take).
- (ii) A preliminary summary monitoring report showing the results of the required monitoring to date and an explanation showing that the monitoring results do not indicate impacts of a scale or nature not previously analyzed or authorized.
- (c) Upon review of the request for Renewal, the status of the affected species or stocks, and any other pertinent information, NMFS determines that there are no more than minor changes in the activities, the mitigation and monitoring measures will remain the same and appropriate, and the findings made in support of this IHA remain valid.

Kimberly Damon-Randall,
Director, Office of Protected Resources
National Marine Fisheries Service

Table 1. Authorized Incidental Take.

Common name	Scientific name	Stock	Level A harassment	Level B harassment
Gray whale	<i>Eschrichtius robustus</i>	Eastern North Pacific	0	6
Humpback whale	<i>Megaptera novaeangliae</i>	Hawai'i	0	4
		Mexico-North Pacific		
Beluga whale	<i>Delphinapterus leucas</i>	Cook Inlet	0	72
Killer whale	<i>Orcinus orca</i>	Eastern North Pacific Alaska Resident	0	6
		Eastern North Pacific Gulf of Alaska, Aleutian Islands and Bering Sea Transient		
Harbor porpoise	<i>Phocoena phocoena</i>	Gulf of Alaska	1	17
Steller sea lion	<i>Eumetopias jubatus</i>	Western	0	9
Harbor seals	<i>Phoca vitulina</i>	Cook Inlet/ Shelikof Strait	13	234

Table 2. Shutdown and Harassment Zones.

Activity	Pile type / size	Minimum shutdown zone (m)						Harassment zone (m)
		Low-frequency cetaceans	Non-beluga mid-frequency cetaceans	Beluga whales	High-frequency cetaceans	Phocids	Otariids	
Impact Removal	Sheet pile	160	10	900	190	90	10	858
Vibratory Installation	24-inch (61-cm)	20	10	2,300	20	10	10	2,247
	36-inch (91-cm)	30	10	4,600	40	20	10	4,514
Vibratory Removal	Sheet pile	10	10	2,000	20	10	10	1,954
	24-inch (61-cm)	40	10	6,000	60	30	10	5,968
	36-inch (91-cm)	20	10	1,700	20	10	10	1,700