



Marine Mammal Protection Act Glossary

MMPA: Marine Mammal Protection Act

Under the Marine Mammal Protection Act (MMPA), enacted in 1972, all marine mammals are protected. The MMPA prohibits, with certain exceptions, the “take” of marine mammals in U.S. waters and by U.S. citizens on the high seas, and the importation of marine mammals and marine mammal products into the U.S. MMPA defines “Take” as “harass, hunt, capture, kill or collect, or attempt to harass, hunt, capture, kill or collect.”

PBR: Potential Biological Removal

Potential Biological Removal (PBR) is defined in the MMPA as the maximum number of animals, not including natural mortalities, that may be removed from a marine mammal stock while allowing that stock to reach or maintain its optimum sustainable population. PBR is calculated as the product of: (1) the minimum population estimate of the stock (N_{min}); (2) one-half the maximum theoretical or estimated net productivity rate of the stock at a small population size (R_{max}); and (3) a recovery factor of between 0.1 and 1.0 (Fr). In other words:

$$PBR = N_{min} * 0.5R_{max} * Fr$$

National Marine Fisheries Service (NMFS) follows established agency guidelines to determine PBR for each marine mammal stock in the Stock Assessment Reports (SARs; see below).

SI: Serious Injury

Serious injury (SI) is defined in regulations implementing the MMPA as “any injury that will likely result in mortality.” NMFS interprets this regulatory definition of serious injury as any injury that is “more likely than not” to result in mortality, or any injury that presents a greater than 50 percent chance of death to a marine mammal. The definition does not require that all such injured animals actually die, but rather requires only that the animal is more likely than not to die. NMFS uses its SI Determination Policy Directive to assign injuries as serious or non-serious. See Policy Directive “Process for Injury Determination Distinguishing Serious from Non-Serious Injury of Marine Mammals” at: <https://www.fisheries.noaa.gov/national/marine-mammal-protection/marine-mammal-protection-act-policies-guidance-and-regulations>

NSI: Non-serious Injury

Non-serious injuries are those that are not categorized as SI (see above).

M&SI: Mortality and Serious Injuries

Interactions that are confirmed as mortalities as well as those determined to be SI are counted against the PBR to evaluate a fishery’s impacts to a marine mammal stock. Marine mammal stocks are categorized as ‘strategic’ if human-caused mortalities and serious injuries (M&SI) exceeds the PBR, and NMFS is required to prepare a Take Reduction Plan (TRP; see below) for those strategic stocks.

TRT: Take Reduction Team

Take Reduction Teams (TRT) are convened to develop Take Reduction Plans (TRP; see below). Teams consist of representation from the fishing industry, fishery management councils, state and federal resource management agencies, scientific community, and conservation organizations. Once NMFS establishes a TRT, the TRT has 6 months to reach consensus on a TRP and to submit it to NMFS. If a TRT cannot reach consensus on a draft plan, TRT can document the range of possibilities considered and both majority and minority views. If a TRT does not submit a draft Plan, NMFS develops a proposed TRP and implementing

regulations. After a TRP is finalized, the TRT and NMFS meet periodically to monitor implementation of the plan. The False Killer Whale TRT was convened in January 2010 to address false killer whale interactions in the Hawaii deep-set longline fishery.

TRP: Take Reduction Plan

Take Reduction Plans (TRP) are required under the MMPA when, among other conditions, the M&SI levels of a marine mammal stock exceed the PBR level estimated in the MMPA Stock Assessment Report (SAR; see below), and the stock interacts with a fishery classified as Category I or II under the MMPA List of Fisheries (LOF; see below). At the time the False Killer Whale TRT was convened in 2010, the 5-year average M&SI of the pelagic false killer whale stock inside the EEZ around Hawaii was estimated at 7.3, exceeding the PBR of 2.5. The latest 5-year average M&SI is 9.8, below the PBR of 16.

The immediate goal of TRP is to reduce, within six months of its implementation, the incidental M&SI of marine mammals from commercial fishing to less than the PBR level. The long-term goal is to reduce, within five years of its implementation, the incidental M&SI of marine mammals from commercial fishing operations to insignificant levels, approaching a zero M&SI rate, taking into account the economics of the fishery, the availability of existing technology, and existing state or regional fishery management plans. The False Killer Whale TRP was implemented in December 2012, based on a consensus draft plan recommended by the TRT in July 2010, and includes requirements to use a weak hook (4.5mm or thinner wire diameter circle hooks) and a Southern Exclusion Zone (SEZ) closure triggered after a certain number of M&SI inside the EEZ in a calendar year (4 M&SI as of March 2022).

HICEAS: Hawaiian Islands Cetacean and Ecosystem Assessment Survey

Hawaiian Islands Cetacean and Ecosystem Assessment Survey (HICEAS) is the EEZ-wide survey around Hawaii conducted by NMFS Pacific Islands Fisheries Science Center. Three surveys have been conducted to date, in 2002, 2010, and 2017. Data from the HICEAS surveys are used to derive the abundance estimates for the pelagic stock of false killer whales.

SAR: Stock Assessment Report

NMFS prepares marine mammal stock assessment reports (SARs) as part of MMPA section 117 requirements. The reports are prepared in consultation with one or more of three regional Scientific Review Groups (SRGs) and are also available for public review and comment. Information on marine mammal stock's abundance estimates, minimum population estimate (Nmin), PBR, status of the stock, estimates of fishery interactions are published in SARs.

LOF: List of Fisheries

The List of Fisheries (LOF) classifies U.S. commercial fisheries into one of three Categories according to the level of incidental mortality or serious injury of marine mammals. LOF is a requirement under the MMPA, and is published annually by NMFS to reflect new information. The LOF only includes commercial fisheries. Each commercial fishery is classified into one of three Categories below based on the rate (in number of animals per year) of incidental mortalities and serious injuries of marine mammals due to commercial fishing operations relative to a stock's PBR level.

	Rate of interaction in plain language	Rate of interaction relative to PBR
Category I	<u>Frequent</u> incidental mortality or serious injury of marine mammals	Equal to or greater than 50% of the PBR level
Category II	<u>Occasional</u> incidental mortality or serious injury of marine mammals	Between 1% and 50% of the PBR level
Category III	<u>Remote likelihood of/no known</u> incidental mortality or serious injury of marine mammals	Equal to or less than 1% of the PBR level