



Photo: David Leonard, USFWS

Seabirds

Ka'upu or Black-footed Albatross

Phoebastria nigripes

SPECIES STATUS:

State listed as Threatened
State recognized as Indigenous
Bird of Conservation Concern at the National Level
NatureServe Heritage Rank G5 - Apparently secure
North American Waterbird Conservation Plan - High concern
IUCN Red List Ranking - Endangered
Regional Seabird Conservation Plan - USFWS 2005

SPECIES INFORMATION: The ka'upu or black-footed albatross is the smallest albatross (Family: Diomedidae) found in Hawai'i. Adult males and females are entirely black except for a narrow whitish area at the base of the bill and another under the eyes; ten percent of the individuals also have a white rump and undertail coverts. Like all albatross, ka'upu (black-footed albatross) are accomplished fliers using dynamic soaring to cover great distances. Ka'upu (black-footed albatross) feed from the surface by seizing prey while sitting on the water, and will "tip-up" very similar to ducks. Like many seabirds, uses a well-developed olfactory sense to locate food. Ka'upu (black-footed albatross) form long-term pair bonds and exhibit a high degree of nest site philopatry. Breeding occurs in large colonies and nests are placed on open, sandy beaches or dunes. Pairs engage in noisy, ritualized courtship dances. Pairs remain together until the death or disappearance of a partner, but do not breed every year. Ka'upu (black-footed albatross) nest in scooped out hollows on the upper parts of sandy beaches. In Hawai'i, eggs are laid in November and chicks fledge in June and July, and like many seabirds, only one egg is laid per year. Both male and female incubate egg, and brood and feed young. Young birds do not return to land until their third year after fledging. These birds do not breed, but dance, build nests, and prospect for mates. Age at first breeding is at least 5 years old, and the oldest-known black-footed albatross is at least 43 years old.

DISTRIBUTION: With the exception of a few breeding colonies off Japan, the breeding distribution of the black-footed albatross is restricted to the NWHI where breeding occurs on all islands. Historically, bred on Johnston, Marcus, Wake, Volcano Island, Marshall Island, and the Northern Marianas; no evidence of historically breeding on MHI. Non-breeding range is the northern Pacific Ocean.

ABUNDANCE: In Hawai'i, population estimated at approximately 55,000 breeding pairs; 95 percent of the world's population. Majority of individuals breed on Laysan (19,500 pairs) and Midway (20,400 pairs).

LOCATION AND CONDITION OF KEY HABITAT: **Terrestrial:** Ka'upu (black-footed albatross) breed on low coral and sand islands, and use open sandy beaches or dunes for nest sites, occasionally nesting occurs among vegetation. **Marine:** Pelagic.

THREATS:

- Humans. Historically, feather hunters decimated populations. Occupation of Pacific islands by military during World War II also took a heavy toll on this species. For example, during the 1950s and 1960s tens of thousands were killed at Midway to reduce collisions with aircraft.
- Fishing Industry. Longline fisheries now are responsible for the death of most ka'upu (black-footed albatross); between 1990 and 1994, it is estimated that greater than 23,000 individuals were killed on longline hooks set by the north Pacific swordfish fishery. An estimated 1,800 were killed annually between 1994 and 1998 by the Hawai'i longline fishery.
- Marine pollution. Similar to other albatross, ingestion of plastic debris and oil likely threaten ka'upu (black-footed albatross).
- Contaminants. Organochlorine levels high enough to result in eggshell thinning and embryonic defects have been detected in ka'upu (black-footed albatross).
- Global climate change. Ka'upu (black-footed albatross) nest close to the shoreline, thus sea level increases may pose a critical threat.

CONSERVATION ACTIONS: The following management goals are important to Pacific seabird conservation: maintain, protect, and enhance habitat; eradicate or control non-natives; minimize bycatch and other negative effects of fishing; improve the effectiveness of oil spill response efforts; identify contaminants and hazardous substances; and minimize the effects of powerlines, towers, wind turbines and lights (USFWS 2005). The goal of these management actions is not only to protect seabird populations and their breeding colonies, but also to re-establish former breeding colonies thereby reducing the risk of extinction. Past actions have included efforts to mitigate the impact of longline fisheries and predator control. In addition to these efforts, future management specific to Hawaiian populations of ka'upu (black-footed albatross) should include the following:

- Complete a status assessment.
- Continue protection and management of wildlife sanctuaries and refuges.

MONITORING: Continue annual censuses of breeding colonies and design and implement a population monitoring program that will allow the estimation of age-specific survival rates.

RESEARCH PRIORITIES: Most research priorities for seabirds are related to determining the most appropriate methods for achieving the above goals. Research priorities specific to the ka'upu (black-foot albatross) include the following:

- Analyze and report on demographic data based on 50 years of USFWS banding data.
- Support efforts to estimate annual mortality from U.S. and foreign fisheries and use demographic models to determine the effect of this mortality on population.
- Continue research and development of techniques and gear that will minimize mortality and continue to explore alternative to mitigate mortality (i.e., take) of ka'upu (black-foot albatross) by fishing industry. Estimate mortality from all U.S. and foreign fisheries and determine effect of this mortality to population.

References:

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