

NOTES FOR PROTECTED SPECIES:

The Contractor shall designate a competent Observer to search/monitor work sites and the areas adjacent to the authorized work area for ESA-listed marine species.

Work shall be postponed or halted when ESA-listed marine species are within 50 yards.

1. SEABIRDS

Hawaiian seabirds may traverse the project area at night during the breeding season, which extends from March 1 through December 15.

- Fully shield all outdoor lights so the bulbs are only visible from below bulb height and only in use when necessary.
- Install automatic motion sensor switches and controls on all outdoor lights or turn off lights when human activity is not actively occurring within the lighted area.

Avoid nighttime construction during the seabirds fledging period, which extends from September 15 through December 15.

2. HAWAIIAN HOARY BAT (LASLURUS CINEREUS SEMOTUS)

Any fences that are erected as part of the project shall have barbless wire to prevent entanglements of the Hawaiian hoary bat on barbed wire. No fences in the survey area were observed with barbed wire during the survey; however, if fences are present, the top strand of barbed wire shall be removed or replaced with barbless wire.

No trees taller than 15 feet (4.6 m) shall be trimmed or removed as a result of this project between June 1 and September 15, when juvenile bats that are not yet capable of flying may be roosting in the trees.

3. NĒNĒ OR HAWAIIAN GOOSE (BRANTA SANVICENSIS)

Do not approach, feed, or disturb the Hawaiian goose.

If Hawaiian goose are loafing, foraging, or otherwise present within the project area during the breeding season, which extends from September through April, have a trained biologist survey the area near the project prior to work each day. Survey biologists should be familiar with the nesting behavior of the Hawaiian goose, nest identification, and identification of young.

If a nēnē is found in the area during ongoing activities, all activities within 100 feet (30 m) of the bird would cease, and the bird would not be approached. If a nest is discovered, USFWS would be notified. If a nest is not discovered, work may continue after the bird leaves the area of its own accord.

All regular on-site staff shall be trained to identify nēnē and shall know the appropriate steps to take if nēnē are present on-site. Training would not be necessary if a biological monitor is present for the duration of the construction.

BIOLOGICAL SURVEY

- A qualified biologist shall survey the area for nesting nēnē before construction or as soon as the area is deemed safe and accessible

(in coordination with the waterbird surveys), and after any subsequent delay in work of 3 or more days (during which birds may attempt nesting). The results of the pre-construction survey would be submitted to the USFWS.

- Surveys shall be repeated if there is a delay in work of three days or more (during which the birds may attempt to nest).
- If nests or vulnerable young are observed within 150 feet of the project work, immediately cease all work and contact the Service for further guidance.

In areas where known presence of Hawaiian goose occurs, post and implement reduced speed limits, and inform project personnel and contractors about the presence of this threatened species on-site.

3. WATERBIRDS

In areas where known presence of Hawaiian waterbirds occurs, post and implement reduced speed limits, and inform project personnel and contractors of the presence of these endangered species.

Because water resources occur in the project site, employ U.S. Fish and Wildlife Service Recommended Standard Best Management Practices when working in aquatic environments.

In areas where Hawaiian waterbirds are known to occur, survey for Hawaiian waterbirds in or near the project area prior to work using survey biologists. Survey biologists should be trained and capable of identifying adults and juveniles of each species, nesting behaviors, and nests.

- Surveys for species and nests shall be repeated when a delay of work occurs that is three days or more (during which the birds may attempt to nest).
- If a nest or active brood is found, contact the USFW Service within 24 hours for further guidance.
- Establish and maintain a 100-foot buffer around all active nests and/or broods until the chicks/ducklings have fledged. Do not conduct potentially disruptive activities or habitat alteration within this buffer.
- Have a biological monitor that is familiar with the species' biology present on the project site during all construction or earth moving activities until the chicks/ducklings fledge to ensure that Hawaiian waterbirds and nests are not adversely affected.

4. HAWAIIAN MONK SEAL (NEOMONACHUS SCHAUINSLANDI) AND SEA TURTLES

All regular on-site staff shall be trained to identify the Hawaiian monk seal and sea turtles, and trained on appropriate steps to take if these species are present on-site.

Construction activities shall not take place if a Hawaiian monk seal or sea turtle is in the construction area or within 150 feet (46 m) of the construction area. Construction can only begin after the animal voluntarily leaves the area. If a monk seal/pup pair is present, a

minimum 300-foot (91-m) buffer shall be observed. If a Hawaiian monk seal or sea turtle is noticed after work has already begun, that work may continue only if, in the best judgment of the biological monitor, that there is no way for the activity to adversely affect the animal(s).

Any construction-related debris that may pose an entanglement threat to Hawaiian monk seals and sea turtles shall be removed from the construction area at the end of each day and at the conclusion of the construction project.

Workers shall not attempt to feed, touch, ride, or otherwise intentionally interact with any listed species.

Sea turtles nesting occurs on beaches from May through September, peaking in June and July, with hatchlings emerging through November and December. Avoid nighttime work during the nesting and hatching season.

No vehicle use or modifying the beach/dune environment during the sea turtle nesting or hatching season, which extends from May through December.

Employ U.S. Fish and Wildlife Service Recommended Standard Best Management Practices when working in aquatic environments.

Remove any project-related debris, trash, and equipment from the beach or dune if not actively in use.

Do not stockpile project-related materials in the intertidal zone, reef flats, stream channels, or river channels.

Lighting: Optimal turtle nesting habitat is a dark beach, free of barriers that could restrict sea turtle movement. Lighting and human presence deters nesting turtles from approaching, laying eggs, and successfully nesting.


Shielded lighting shall be used to reduce direct and ambient light to potential nearby beach habitat. Lighting shall be directed away from the beach.

In-water work at night shall be avoided, unless emergency maintenance and repair of erosion and sediment controls are necessary to meet permit conditions.

Dredging or filling in the marine environment shall be scheduled to avoid coral spawning and recruitment periods and sea turtle nesting and hatching periods.

FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	ER-23(001)	2021	4	109

ORIGINAL PLAN	SURVEY PLOTTED BY	DATE
	DRAWN BY	
	DESIGNED BY	
	QUANTITIES BY	
NOTE BOOK		
Nº		

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