

NOTES

SNOWY PLOVER BURIED ALIVE BY WIND-BLOWN SAND

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On 12 June 2010 Farrar and Kotaich visited a Snowy Plover (*Charadrius nivosus*) nest at the mouth of Tahkenitch Creek, Douglas County, Oregon. On their arrival at 09:52, they found a female plover with a single chick near the nest site. The uniquely color-banded male was discovered moments later when Kotaich found him on the nest, buried in sand up to his neck (Figure 1). Only his head protruded, with the bill pointing upward. He faced north in the direction of the prevailing winds, the typical incubation posture during windy periods. The weather during the previous several days had included gale-force winds (www.wunderground.com/history/airport/KOTH/2010/6/12/WeeklyHistory.html) strong enough to cause exposed nests to be buried by wind-blown sand.

Farrar and Kotaich dug out the limp, unresponsive male. His skin was cool to the touch and his legs were fully extended as if he had stood as tall as possible to keep his head above the accumulating sand. Two cold eggs, between his feet, showed no signs of imminent hatching; they were not pipped and no calls from the chicks within were



Figure 1. Buried adult male Snowy Plover, Tahkenitch Creek, Douglas Co., Oregon, 12 June 2010.

Photo by Adam A. Kotiach

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audible. Farrar warmed the male in his hands and sheltered him from the wind inside his coat. After 20 min of warming the plover began to recover. He opened his eyes and rolled over in the hand to be on his belly rather than on his back. He accepted drops of fresh water (Figure 2) by tilting his head back to ingest the droplets from the observers' hands. At 10:30, he made his first attempt to escape. We then placed him on warm sand where he began to sun himself by extending his wings (Figure 3). We gave him additional warm breaths but he soon avoided further handling. By then he was able to stand but still remained in the immediate area. At 10:45 he moved 5 m, stumbling during his first steps. After another 15 min he appeared alert and the observers left. He was alive and apparently healthy at the site on 15 June. He acted as though he might still have a brood, though we subsequently determined that no chick from his nest fledged. Eventually, he courted another female on the same territory, but no nest of this pair was found. The male survived the winter and returned in 2011.

Incidents of Snowy Plovers buried by blowing sand while incubating have not been previously described (see Page et al. 2009) and are probably rare in most of the species' breeding range. However, we found other adult Snowy Plovers buried in sand on two other occasions. On 20 June 1998, at Floras Lake, Curry County, after several days of strong northwest winds, we found a dead female buried under sand while attending her nest placed under a log. It appeared that sand accumulating around the log had collapsed on her. On 4 August 2007, at New River, Coos County, we also found a dead, buried female that had also been incubating a nest under a log. Apparently wind blew sand from under the log, causing the log to collapse on top of her.

The incident concerning the male differed from those of the females in that there were no objects near his nest on a relatively open, flat, sandy area. We are uncertain if the male permitted sand to accumulate slowly until he was buried or whether a buildup of sand suddenly engulfed him.



Figure 2. Adult male Snowy Plover accepting water from a finger, Tahkenitch Creek, Douglas Co., Oregon, 12 June 2010.

Photo by Adam A. Kotiach

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Figure 3. Adult male Snowy Plover warming itself after found buried, Tahkenitch Creek, Douglas Co., Oregon, 12 June 2010.

Photo by Adam A. Kotiach

We thank Gary W. Page and an anonymous reviewer for reading and editing this article.

LITERATURE CITED

Page, G. W., Warriner, J. S., Warriner, J. C., and Paton, P. W. 2009. Snowy Plover (*Charadrius alexandrinus*), in *The Birds of North America* (A. Poole and F. Gill, eds.), no. 154. Acad. Nat. Sci., Philadelphia.

Accepted 12 July 2012