

during the night. This probable night roosting is not new to me. On at least five occasions between 1987 and 1992, after spending all day in the field on the Avon-Heathcote Estuary and seeing no skuas during the day, I have seen one or two appear just on dusk. On 16 November 1989, I saw one light-morph bird harassing Red-billed Gulls over the oxidation ponds during the afternoon and later found it sleeping among roosting Southern Black-backed Gulls (*Larus dominicanus*) on the embankment between ponds 3 and 5. This bird flew off when disturbed, but remained nearby at least until nightfall. It seems Arctic Skuas come to land more often than is generally thought, and night roosting may be a regular aspect of their behaviour. If birds arrive to roost at sunset and depart just before sunrise, as it appears they do, it is not surprising that night roosting has escaped detection by ornithologists for so long; rarely is somebody in the right place at the right time to observe it.

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Live Adélie Penguins in Antarctic Dry Valleys

In January 1987, at a field camp in Antarctica in the Upper Garwood Valley (78°S, 163°E), 600 metres a.s.l. and 12 km from the coast, I observed two Adélie Penguins. They passed by and continued in a generally westerly direction following the Garwood River, which was flowing, to the upper reaches of the valley. The two birds passed through camp two hours apart and so were travelling separately. I estimate that the birds were 50 km from the nearest open water in McMurdo Sound and a further 120 km from Cape Royds, the nearest penguin colony.

Both birds were thin and emaciated and moved slowly with frequent pauses to look around. The second bird moved about 1.5 km in seven hours, and then became immobile. After a further eight hours I found it to be dead, but it had not frozen, probably because the weather had been good (soil surface temperature declined from +18 °C to +1 °C) over this time and the black back of the bird was exposed to the sun. Using a thermos flask filled with sand as a counterweight I estimated that the dead bird weighed no more than 2 kg, which is much less than the 2.8 kg for fasting, incubating birds recorded by Ainley *et al.* (1983). The stomach of this bird was found to be empty.



FIGURE 1 — Adélie Penguin adjacent to Garwood River in Garwood Valley, January 1987

I am not aware of records of live Adélie Penguins so far inland in the Dry Valleys of Antarctica, although there are reports of live penguins many kilometres inland on ice shelves or snow fields (Perkins 1945, Taylor 1962). The occurrence of mummified penguins and seals in the Dry Valleys is well known (Péwé *et al.* 1959, Dort 1981, Laws 1984); starvation is the likely cause of death for the seals (Laws 1984).

It seems that, after travelling long distances over inhospitable (to a penguin) gravel and sandy soils in the Dry Valleys, Adélie Penguins die from starvation. Free water was readily available, and so dehydration is an unlikely explanation.

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