These results, although consistent, are based on only four experiments at one locality and during a single month. However, hares seemed definitely to be preferred of the three foods offered. Rabbit was preferred to opossum. Whether this preference is based on meat quality or ease of skin penetration is not known, but Robertson *(idem)* noted that skinned rabbits were preferred to unskinned ones. Skin toughness may be a factor determining the choice of hare or rabbit in preference to the tougher-skinned opossum, but this needs verification.

I should like to acknowledge the help given by Colin McRae of the Plains Destruction Board in providing freshly killed animals for these tests.

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## THE EFFECTS OF WEATHER ON A CASPIAN TERN COLONY

From 1975 to 1979, I have made 11 visits to the colony of Caspian Terns *(Hydroprogne caspia)* in Whangapoua Harbour on the east coast of the Coromandel Peninsula. The harbour, which covers about 1500 ha and is separated from the sea by the Omaro Spit, 4.5 km long and 800 m wide, has one narrow entrance. The terns breed on what is locally called Shell Island, which is about 800 m inside the harbour entrance and so is exposed to the full force of north-easterly gales. The nesting area occupies about 400 $m^2$ of the island on a ridge of white sand, on one side of which the nests are within 3 metres of the water at normal high tides.

At the colony, I counted at most 100 adults in 1975 and 140 in 1977. In those years, strong winds combined with high tides to wash eggs and chicks from the nests, but without unduly damaging the sand ridge itself. Each time the birds would relay, and so the 1975-77 period presumably shows the usual pattern of the terns' breeding, the colony apparently raising about 30 young in 1975/76 and 60 in 1977/78.

However, in July 1978 occurred the worst storm for many years, and on 28 November 1978 I found that the nesting ridge had gone, leaving only a flat area of sand well below the level of the former ridge and apparently swept by normal high tides when backed by wind. There were some 140 scrapes and nests but only 28 adults, and the 22 eggs remaining were broken. The following year, on 18 October, the sand ridge had partly built up again and there were 80 adults, 41 nests and 47 eggs. However, on 19 November, the birds had shifted their nesting area slightly and there were 124 scrapes and nests, and 30 eggs. By early December, the tide had washed them all away,

and on 18 December 1979, although 9 scrapes and a nest and egg were found spread well apart on the island, no birds were present and laying had been abandoned.

In spite of at least three attempts, therefore, no chicks were reared at the colony after the July 1978 storm, and the situation will probably not improve until the nesting ridge builds up again to the 1977 level.

I do not know when this colony site was first occupied, but it was certainly in use by 1956. The tidal waves that followed the 1960 Chilean earthquake created chaos in Whitianga Harbour further south with tides reaching a peak at least 2 metres above normal high-tide level. If the tern colony managed to recover from that event, it certainly should from the present lesser damage.

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## GIANT PETREL RECORDS FROM FIJI

Since 1965 there have been four reports of the occurrence of giant petrels *Macronectes* sp. in Fiji. Morgan & Morgan (1965: 158) reported seeing an exhausted giant petrel wearing an Australian band near Suva, Viti Levu, on 22 August 1961. This bird had been banded (band number 130-25137) by the Australian National Antarctic Research Expeditions as a nestling on Macquarie Island on 8 January 1961. King (1967: 104) listed two records of giant petrels from Fiji. One was the banded giant petrel reported by the Morgans, but no information was provided about the other. Clunie (1980: 95) reported the occurrence of another two giant petrels in Fiji: one of these was found at Natadola Reef on the south-west coast of Viti Levu during the first week of July 1979; and the other was captured by villagers of Namara on Waya Sewa Island, north-west of Viti Levu on 11 August 1979. Jenkins (1980: 95) reported the sighting of a fifth giant petrel on 6 August 1976 at sea 40 km from the south-west corner of Viti Levu.

In addition to these reports of five giant petrels on or near Fiji, the recoveries of two other banded giant petrels on Fiji were reported by Hitchcock & Carrick (1960: 71, 72), but this report has not been referred to in papers published since 1965. Both had been banded as nestlings on Macquarie Island on 24 February 1959 by the Australian National Antarctic Research Expeditions. One (band number 130-15158) was found dead at the mouth of the Sigatoka River, Viti Levu, on 11 June 1959 and the other (band number 130-15212) was found dead near Bua, Vanua Levu, on 26 June 1959.

It is not possible, from the banding records, to identify to species level the three giant petrels that were banded on Macquarie Island and recovered on Fiji. They were banded on Macquarie Island as *M. giganteus* before the recognition by Bourne & Warham (1966) of