

# Bird ringing at Gough Island, 1982-1987; with an analysis of movements of wandering albatrosses

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*Bird-ringing activities at Gough Island are summarized for the period December 1982 to October 1987. A total of 1 470 birds of seven species was ringed during the period. A total of 3 106 birds of 10 species has now been ringed at Gough Island since 1948 when ringing commenced. Only two birds have been recovered elsewhere during the review period. Wandering albatrosses breeding at Gough Island have a relatively restricted at-sea distribution.*

*Voëlberingsaktiwiteite op Gough-eiland word vir die tydperk Desember 1982 tot Oktober 1987 opgesom. 'n Totaal van 1 470 voëls van sewe spesies was gedurende dié tydperk gering. 'n Totaal van 3 106 voëls van tien spesies is tans op Gough-eiland gering sedert daar in 1948 met beringing begin is. Slegs twee voëls is gedurende die ondersoektydperk elders teruggekry. Grootmalmokke wat op Gough-eiland broei, het 'n betreklik beperkte verspreiding ter see.*

## Introduction

This report summarizes bird-ringing activities at Gough Island (40°21'S, 09°53'W), South Atlantic, between December 1982 and November 1987, supplements information for previous years (Morant 1977, Cooper 1983) and discusses the at-sea movements of albatrosses ringed at the island.

## Results

A total of 1 470 birds of seven species was ringed (Table 1). No new species were ringed during the period under review. The total number of birds ringed at Gough Island since 1948 when ringing commenced (Morant 1977, Cooper 1983) is therefore 3 106 individuals of 10 species (Table 2).

**Table 1**  
Birds ringed at Gough Island, December 1982 – October 1987

Species	Chick	Full grown	Totals
Rockhopper penguin <i>Eudyptes chrysocome</i>	0	76	76
Wandering albatross <i>Diomedea exulans</i>	475	73	548
Yellownosed albatross <i>D. chlororhynchos</i>	173	238	411
Sooty albatross <i>Phoebastria fusca</i>	13	144	157
Southern giant petrel <i>Macronectes giganteus</i>	10	4	14
Great shearwater <i>Puffinus gravis</i>	0	52	52
Subantarctic skua <i>Catharacta antarctica</i>	69	143	212
Totals	740	730	1 470

**Table 2**  
Birds ringed at Gough Island, 1948 – 1987

Species	1948-1982*	1982-1987	Totals
Rockhopper penguin <i>Eudyptes chrysocome</i>	26	76	102
Wandering albatross <i>Diomedea exulans</i>	603	548	1 151
Yellownosed albatross <i>D. chlororhynchos</i>	307	411	718
Sooty albatross <i>Phoebastria fusca</i>	56	157	213
Southern giant petrel <i>Macronectes giganteus</i>	25	14	39
Broadbilled prion <i>Pachyptila vittata</i>	1	0	1
Softplumaged petrel <i>Pterodroma mollis</i>	1	0	1
Great shearwater <i>Puffinus gravis</i>	524	52	576
Subantarctic skua <i>Catharacta antarctica</i>	91	212	303
Gough Island moorhen <i>Gallinula nesiotis</i>	2	0	2
Totals	1 636	1 470	3 106

\* Morant 1977, Cooper 1983.

Only two birds have been recaptured or recovered away from Gough Island during the review period. A wandering albatross *Diomedea exulans* (J-04072) ringed as a chick on 23 October 1984 was caught alive, entangled in a fishing line and then released unharmed, at Tripp Seamount (29°46'S, 14°7'E) on 2 January 1987, 2 472 kilometres from Gough Island (Table 3). A yellownosed albatross *D. chlororhynchos* (8-16030), ringed as a breeding adult on 26 October 1982, was recovered dead after becoming entangled in a fishing line or net on 3 October 1986 off the west coast of South Africa at 32°45'S, 16°15'E, 2 471 kilometres from Gough Island. This individual, a colour-banded member of a long-term study colony, was last recaptured alive at Gough Island in the 1985-86 breeding season. It is the first ringed yellownosed albatross to be recovered away from Gough Island (Morant 1977, Cooper 1983).

Two ringed birds (not counting one chick which died before fledging and two experimental birds which died before release), both adult yellownosed albatrosses, have been found dead on Gough Island during the review period. 8-16004 was ringed as an incubating adult on 24 October 1982 and was found dead on 13 September 1983. 8-44583 was ringed on 12 September 1983 and was found as a long-dead corpse on 23 September 1984.

**Table 3**  
**Wandering albatrosses ringed at Gough Island and recovered or recaptured at other localities, 1959 – 1987**

Ring number and age	Date ringed	Locality, date recovered or recaptured, and status	Displacement*	Source
50105, adult	22.12.55	Port Elizabeth, South Africa, c. 1.6.59, 33°58'S, 25°36'E, no details	3 199 km	Hudson (1963), Morant (1977)
J-01317, nestling	06.11.79	At sea off southwestern Cape, South Africa, 17.10.81, 34°18'S, 17°28'E, recaptured alive	2 510 km	Cooper (1983)
J-04072, nestling	23.10.84	At sea, Tripp Seamount, 2.1.87, 29°46'S, 14°17'E, recaptured alive and released	2 472 km	This paper

\* – shortest (great circle) distance between ringing and recovery points.

Yellow-nosed albatrosses, sooty albatrosses *Phoebastria fusca* and Subantarctic skuas *Catharacta antarctica* ringed at Gough Island are in the main colour-banded individuals in long-term study colonies. Therefore, many individuals of these three species have been recaptured annually at the island since 1982 when the long-term studies commenced (from 1984 for skuas). Analyses of these recaptures will be published elsewhere.

## Discussion

Wandering albatrosses at Gough Island belong to the small subspecies *D. e. dabbenena* (Clancey 1980) with an annual breeding population of at least 800 pairs (Watkins 1987). This subspecies is virtually restricted to Gough Island, there being only two to three pairs breeding on Inaccessible Island in the Tristan da Cunha group (Richardson 1984). Since the subspecies is not identifiable at sea (Harrison 1983), knowledge of its at-sea distribution must come mainly from recoveries of ringed birds. To date, only three recoveries have been made of ringed wandering albatrosses away from Gough Island (Table 3). The distribution of these three recoveries tentatively suggests that wandering albatrosses from Gough Island are restricted to the southeastern Atlantic Ocean and to the coastal waters of southern Africa at relatively high latitudes. A specimen, identified as belonging to the race *D. e. dabbenena*, was collected at sea between Cape Town and Durban, South Africa in early July 1966 (Clancey 1980), within the distribution outlined above. This restricted distribution contrasts markedly with what is known of the at-sea distribution of wandering albatrosses of the larger subspecies *D. e. exulans*, which breeds at more southerly islands. For example, birds ringed at Marion, Crozet and Kerguelen islands in the southern Indian Ocean have been recovered in Australasian waters at great-circle distances of over 8 000 km (Weimerskirch *et al.* 1985, Gartshore *et al.* 1988) and it is likely that the southern subspecies undertakes circumpolar migrations (Watson *et al.* 1971).

The single yellow-nosed albatross movement follows the pattern previously established for the distribution of the subspecies *D. c. chlororhynchos*, which is endemic to the Tristan da Cunha and Gough islands (Morant 1977, Brooke *et al.* 1980, Hagen 1982, Morant *et al.* 1983, Cooper & Fraser 1986, unpubl. data).

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