

BRITISH ANTARCTIC SURVEY

BULLETIN

No. 23
May 1970



LONDON: PUBLISHED BY THE BRITISH ANTARCTIC SURVEY
NATURAL ENVIRONMENT RESEARCH COUNCIL

PRICE 20s. 0d. NET

BRITISH ANTARCTIC SURVEY

Director

SIR VIVIAN FUCHS

Editors

DR. R. J. ADIE

MISS E. TODD

- Earth Sciences:* DR. R. J. ADIE, British Antarctic Survey, Department of Geology, University of Birmingham, Birmingham 15
- Geophysics:* MR. J. C. FARMAN, British Antarctic Survey, Department of Natural Philosophy, University of Edinburgh, Edinburgh 8
- Zoology:* DR. R. M. LAWS, British Antarctic Survey Zoology Section, Monks Wood Experimental Station, Abbots Ripton, Huntingdonshire
- Glaciology:* DR. C. W. M. SWITHINBANK, Scott Polar Research Institute, Lensfield Road, Cambridge
- Botany:* DR. S. W. GREENE, British Antarctic Survey Botany Section, Department of Botany, University of Birmingham, Birmingham 15

The authors of all signed papers are alone responsible for opinions expressed in them. Only papers concerned with the work of the Survey can be published in the *Bulletin*, but the Editors are prepared to consider publication of correspondence on papers appearing in the *Bulletin* or on related topics.

Copyright © 1970

by

British Antarctic Survey

30 Gillingham Street

LONDON, S.W.1

BRITISH ANTARCTIC SURVEY

BULLETIN

No. 23 May 1970

CONTENTS

	PAGE
Ecology of the fresh-water lakes of Signy Island, South Orkney Islands: III. Biology of the copepod <i>Pseudoboeckella silvestri</i> Daday (Calanoida, Centropagidae). R. B. HEYWOOD	1
Studies in <i>Colobanthus quitensis</i> (Kunth) Bartl. and <i>Deschampsia antarctica</i> Desv.: I. Introduction. S. W. GREENE	19
The population dynamics and energy budget of <i>Notothenia neglecta</i> Nybelin at Signy Island, South Orkney Islands. I. EVERSON	25
Quantitative study of yeasts and bacteria in a Signy Island peat. J. H. BAKER	51
Some comments on the optical system of Pinnipedia as a result of observations on the Weddell seal (<i>Leptonychotes weddelli</i>). G. WILSON	57
Studies in <i>Colobanthus quitensis</i> (Kunth) Bartl. and <i>Deschampsia antarctica</i> Desv.: II. Taxonomy, distribution and relationships. D. M. MOORE	63
Reproduction in <i>Notothenia neglecta</i> Nybelin. I. EVERSON	81
Investigations of patterned ground at Signy Island, South Orkney Islands: IV. Long-term experiments. M. J. G. CHAMBERS	93
Short notes: Chromosome numbers of <i>Acaena</i> from South Georgia. D. M. MOORE and D. W. H. WALTON; Age of a camptonite dyke from south-east Alexander Island. D. C. REX	101

LONDON: PUBLISHED BY THE BRITISH ANTARCTIC SURVEY
NATURAL ENVIRONMENT RESEARCH COUNCIL