

*The Coastal Ecology of a Recreation Resource Area Kawakawa Bay to Miranda.* A Report prepared by Marjorie R. Bacon, M.Sc., Planning Assistant. 95 pp., illus. Auckland, January 1973: Planning Division, Auckland Regional Authority. Available from the ARA, Private Bag, Auckland, \$2.50.

This is an important document but one that may not have as wide a circulation as it deserves. It tells of the assessment that is being made of natural resources within a number of coastal areas designated as "Recreation Resource Areas" by the Auckland Regional Authority in its Regional Planning Scheme. Miss Marjorie Bacon, a zoology graduate from the University of Auckland and a former student of Professor J. E. Morton, eminent marine biologist, theologian, author of the best-seller *The New Zealand Sea Shore*, and one of the few scientists elected to local government in New Zealand, gives the results of an ecological investigation in one of these areas.

In 1971 an attempt was made "to determine the abundance and distribution of marine life and coastal birds on the Kawakawa Bay - Miranda Coast." The introduction to Miss Bacon's report, which runs to some 50 pages of text with copious graphs, figures and tables, states: "This study provides baseline information from which comparative studies may be made in the future to determine the effects of man's activities upon the coastal environment. An assessment has been made of changes which have occurred in populations of coastal animals up to the present time and an attempt has been made to determine the part played by coastal development in bringing about these changes." The report promises, in fact, rather more than it gives but this is a fault inherent in the material itself as will be understood by anyone who has been faced with trying to make a similar assessment of an environmental situation.

The report is divided into two sections — "Bird Life," pp. 7-29, and "Marine Life," pp. 30-48, with supporting appendices giving graphical and numerical distribution details for marine animals and plants with bird census data for the Firth of Thames as recorded by the "New Zealand Ornithological Society 1951-1970" in Appendix III, pp. 69-85.

Numbers, localities and movements of 30 species of coastal birds, based on data gathered by members of the OSNZ, were analyzed and discussed in terms of the effects of environmental factors, disturbance by man, and of the importance of the area as a bird habitat. From a great amount of information on birds, marshalled into appropriate figures and tables, Miss Bacon concludes that: "The protection of the Firth of Thames as a natural bird area of regional and national significance is therefore vital." Limitation of access and of expansion of residential and resort areas is proposed and the alternatives are examined. The South Auckland members of the OSNZ, led by their former RR Mr H. R. McKenzie, may take some pride that their observations over 20 years have been put to good use illustrating the role that members of the OSNZ can play as environmentalists and conservationists without collectively having to "stand and be counted" as supporters or antagonists of any particular scheme or cause.

The marine life section is, perhaps, of more interest to the specialist marine biologist and is a little disappointing in its lack of firm conclusions and recommendations. However, these may be in-

corporated into the complete study of this area already made available by the ARA. The information showing the distribution and abundance of the animals and plants does provide a firm baseline for measuring the effects of any changes in physical conditions which might occur in the future as a result of reclamation of pollution, a baseline which would, in fact, be envied by biologists faced with examining or predicting such effects in other parts of New Zealand. Let those of us who love Wellington Harbour take note!

Miss Bacon, author of this study, is unique; perhaps not in herself but rather in the position which she holds. So far as I am aware the ARA is the only local body employing biologists on its staff. I believe that the day should come, and quickly, when the biologist is regarded as a "professional" with all that the term connotes in ethics, integrity, standards of practice and behaviour, just as we have come to expect from lawyers, architects, doctors and engineers. The day must come also when the biologist is sought as a staff member of every local body or planning authority to enjoy the role of responsibility in environmental matters at present the prerogative of the engineer and the accountant.

This report from the ARA is, therefore, tremendously important, not so much in its content as for its format in that it sets a standard and a pattern for other local bodies to follow, perhaps to improve upon, and certainly to learn from.

E. W. D.



*Mauri Ora*, Vol. 1, 1973. 155 pp., illus. Christchurch: The Biological Society, University of Canterbury. Annually, \$1.50.

Outlets for publication of natural history investigations are relatively few in New Zealand. We have a choice between a small number of society journals, "Records" of the municipal museums, the DSIR journals, or the *Journal* of the Royal Society of NZ, the last three series of periodicals being regarded as the acme of scientific publishing in this country. University-based and student-sponsored periodicals, however, are now playing an important role in encouraging undergraduates to cut their teeth on the techniques of communication of the results of their researches and investigations. This is, perhaps, the most important task of the professional scientist; the clear and unequivocal paper will always be a pleasure to read and study, and the attainment of this end must be the duty of every young scientist. The university journals have much to commend them in helping such a hope to become reality. The Field Club of Auckland University has published *Tane* since 1948; Victoria University of Wellington has its *Zoology Publications*, *Tuatara*, and the student-organised *Bulletin of Natural Science*; the Otago University Students' Association produces *Science Record*; each of the journals is of a different nature and between them do a valuable service to science. Now the Biological Society at the University of Canterbury has entered the field with *Mauri Ora*, a new journal whose name "signifies the Maori concept of the soul of Nature, and pays tribute to an ancient tradition attuned to the indigenous flora and fauna of our shores, streams, and forests."