

ANNUAL REPORT FOR THE YEAR ENDING 31 MARCH 1986.

Overview

The Council's activities during the past year have been rather dominated by discussions and submissions relating to the Government's moves to reorganise the structure of environmental administration in New Zealand. Although only a proportion of ecologists in our Society work for the Government, it is clear that this restructuring will affect the whole future of ecological work in the country. We have major concerns about the adverse effects of the Government's changing policy on both the kind and quality of ecological studies that will be done by or for the new environmental agencies. But this must not blind us to the new opportunities that ecologists will be given, at least in the long-term, to apply their outlook and skills to understanding, maintaining, and sometimes restoring much that is of the highest value in New Zealand's biological environment.

The Council's submission of 14 August 1985 to the Hon. Russell Marshall on the document "Environment 1986" was unequivocal in supporting formation of a new nature conservancy department in which "managers and advocates of the values of the natural biota are grouped more closely together". Because of the far-reaching consequences of the administrative changes Council consulted widely before preparing its submission and working parties of members at Rotorua, Wellington, Palmerston North and Christchurch provided most of the submission's content. The principal points of our submission were:

1. A Ministry for the Environment which had an environmental evaluation and planning role was supported. As well as administering the Town and Country Planning Act, it should also assume some of the planning functions of the Water and Soil Directorate.

2. Managers of and advocates for native biota conservation should all be grouped together. These parts of Lands and Survey and N.Z. Forest Service dealing with native resources should be separated from the development functions of their parent department and merged to form the nucleus of a 'nature conservancy'.

3. Any 'nature conservancy' department should have a large inhouse research capability with a mandate for both basic and applied research. The co-housing of natural resource managers and research staff is seen as

essential for wise and scientifically sound management. The research unit should contain staff from a wide range of existing research organisations so that all management functions have a research backup.

4. Natural resource conservation and development conflicts could be greatly reduced if the Government of the day committed itself to an explicit, consistent policy of protecting native biota, and then actively implemented it.

Subsequently (3 December 1985) we wrote to the State Services Commission expressing the pivotal importance of research in the Department of Conservation for both planning and the effective management of those natural resources for which the department will be responsible. Opportunities for our further input into the way ecological research is to be reorganised have not been forthcoming.

A meeting of Society members to discuss the future role of D.S.I.R. in ecological and environmental research was requested by Dr J. Troughton (see Newsletter No. 44). This highlighted the necessity for New Zealand ecologists to ask more searching questions than we have been asking about the kinds of ecological research that are most needed in New Zealand. This process is now under way. The matter must be answered independently of who does the work and where, and our Society is in a better position to address it objectively than anybody else.

Finally, I thank all Officers and Council members for a great deal of hard work during the year and wish all Society members an ecologically satisfying year for 1986/87.

Ian Atkinson
President

Membership

The Society membership at 31 March 1986 was 454. There were 18 new members (10 full, 6 student, 2 introductory), and 14 resignations during the year. There were 167 subscribers to the Journal (70 in New Zealand and 97 overseas).

Council Activity

The Council met 8 times during the year. All meetings were held in Wellington with the exception of the

AGM which was held in Palmerston North. The following appointments were made by Council: Dr Nigel Barlow, Editor; Dr Mike Rudge, representative to the Member Bodies' Committee of the Royal Society; Dr Jonet Ward, representative to the New Zealand Committee for Water Pollution Research; Mr Matt McGlone and Dr Judith Roper-Lindsay as Newsletter Compilers. Convenors of subcommittees were: AGM and Conference Organiser, Dr John Skipworth; Awards, Dr Clare Veltman; Conservation, Ms Janet Owen; Education, Mrs Pam Williams; Nuclear Issues, Dr Wren Green; Society Records, Mrs Margaret Leslie.

Editor's Report (Nigel Barlow)

Volume 8 had relatively few papers (8 out of 16 submitted), some of which were quite long, together with 3 Short Communications and a copy of the Society's report on the environmental consequences of nuclear war. There was some delay due to late receipt of papers but the lateness of the Journal's appearance was largely caused by failure of the printers' new computerised typesetting equipment.

The signs of Volume 9 (1986) are more auspicious, with 20 papers received by the beginning of May. Four were rejected but in 3 cases a Short Communication was suggested as an alternative. The rest required revision to varying extents (6 minor, 5 major, the rest still to be processed).

The main problem this year is the perennial one of late submission of papers. Inevitably this means balancing the quality of a paper (likely processing time) against date of submission; it follows that early papers have a better chance of acceptance. One wonders if the autumn flush of papers is related to calendar time or the timing of the deadline. We know an earlier deadline doesn't work but would the situation be any better if we recognised a later publication date and later deadline?

I would like to thank the sub-editors, John Gibb, Peter Johnson and Dave Towns, and the referees, for their essential contributions.

Newsletter Compilers' Report (Matt McGlone, Judith Roper-Lindsay)

There have been few changes in the Newsletter this year. Despite high hopes for a modest remodelling and extension of features offered, we have been hard-pressed even to keep the Newsletter to schedule. As in previous years, unsolicited contributions and articles covering research news have been scarce. Even in the

rather more extensively covered field of environmental matters, we have relied on mainly reprinting material directed primarily at other audiences. It is disappointing to note that the upheaval caused by the reorganisation of environmental agencies has been barely reflected in the tranquil pond of the Newsletter. If the Newsletter is to flourish, there must be a greater effort made by members to become involved in sharing information with the Society as a whole. It would be appreciated if Council members would lead the way.

On the credit side, we would like to thank our contributors - and especially Mary McEwen of BRC - for their articles. Many thanks also to the rest of the Newsletter team for their hard work in getting the Newsletter out, often at rather short notice.

Report of the Member Bodies' Committee Representative (Mike Rudge)

The Royal Society continues to be very active in support of science in New Zealand at many levels. Science Education

Concern has been expressed about science teaching in secondary schools. The Royal Society has set up a standing committee to examine the nature of science teaching and curriculum content. The number of science teachers who majored in physics, maths and chemistry is declining because work in industry is better paid and more attractive in other ways.

Royal Society Library

The library will be removed from Science House, Thorndon, and incorporated with the National Museum Library. The Royal Society will be exploring ways in which the liberated rooms can be used to help member bodies.

Prince & Princess of Wales Award

32 awards have been made in the 3 years since the scheme was inaugurated. 80% of awards have gone to people under 40 years old. This Society originally pressed for technicians to be written into the criteria, and it is therefore gratifying to note that 5 awards have gone to technicians.

Member Bodies have contributed about 10% of the funds, and the rest comes from Government and Business houses. About 1/3 of member bodies do not subscribe at all.

Young Scientists Award

This award, to help young scientists to their first overseas conference, has now been awarded 45 times. Of those, 14 (31%) have gone to females which must

be way above the proportion in the scientific workforce.

Public Affairs

During the year the Royal Society published its analysis "The Threat of Nuclear War: a N.Z. Perspective". It also endorsed the Ecological Society 1984 publication on the subject.

BioFed

The Federation of Biological Societies, under the Royal Society umbrella, has produced an analysis for NRAC of the need for basic science in New Zealand. In forthcoming BioCom newsletters, there will be a series of articles on what the Royal Society does for Member Bodies, national science, and in the international scientific community.

Education Report (Pam Williams)

The Christchurch-based subcommittee had a busy 1985 year, adding the finishing touches to four more tape-slide packages for use in Senior High School Biology Courses. These packages were: Stoats on Offshore Islands (R. Taylor); Eucalyptus Tortoise Beetle (T. Mander and J. Wightman); *Leiopelma*, a terrestrial NZ frog (A. Cree); and Rocky Shores (M. Leslie).

These are now available to schools from the Science Resource Centre in Dunedin.

Further contributors are needed; an honorarium is available and costs are covered. With the new F6 assessment underway and new Biology programmes in the pipe-line there is a need for New Zealand examples of ecological principle. Any would-be contributors can contact Pam Williams, 92 Church Street, Rangiora.

Nuclear Issues (Wren Green)

The 1985 AGM endorsed the Council's document "The Environmental Consequences to New Zealand of Nuclear Warfare in the Northern Hemisphere", which had previously been endorsed only by the Council. Copies of the second print run are still available for \$1 each (schools 50c each).

In September 1985 Wren Green represented New Zealand at the Sixth General Assembly of SCOPE in Washington DC where a 2-year international study (Environmental Consequences of Nuclear War) was released. The SCOPE study substantiated earlier studies and added the additional spectre of 1-3 billion survivors of direct nuclear effects dying of starvation if global agricultural systems collapsed.

There is a possibility that a scientific study may be undertaken which would examine the various

environmental, economic, and societal impacts of nuclear war on New Zealand. The Council supports in principle making an appropriate contribution to such a study.

Awards (Clare Veltman)

At the 1985 AGM, Mr J.L. Nicholls was elected an Honorary Life Member of the Society. A biographical sketch follows this report.

Andrew Read (Otago University) received the Student Award for his paper "Habitat Use by Yellowheads in the Hawdon River Valley, Arthur's Pass National Park", delivered to the 1985 conference in Palmerston North.

As a result of Council's nominations, Wren Green (FRI) and Helen Hughes (Commission for the Environment) were appointed and reappointed respectively to the Royal Society's National Committee for Problems of the Environment.

Conservation Report (Janet Owen)

Tahr Management Policy

Our submission, while still supporting an eradication programme for tahr, acceded that if Recreational Hunting Areas are to be established for sport hunting of tahr, then monitoring programmes for vegetation condition and links between vegetation and animal numbers are required. The proposed RHA which covers almost all of the Armoury and Arrowsmith Ecological Districts is considered unacceptably large.

The policy to exclude tahr from national parks was welcomed, but we also stated a view that Recreational Hunting Areas and other reserves are incompatible and overlaps between the two should not occur. Submissions are still being considered by the Forest Service.

Future Use of Maui Gas

A brief submission was made pointing out that insufficient detail had been provided. No consideration at all had been given to the option of leaving the gas in the ground. A summary of key issues and analysis of submissions has since been produced by the Energy Advisory Committee.

Outlying Islands

Lands and Survey released for comment the Auckland Islands Management Plan, a Rodent Contingency Plan for Campbell Island, and announced its intention to prepare a management plan for the Kermadec Islands. Submissions were made on all these issues drawing attention to specific points of

concern to the Society and information to be considered or included. Notwithstanding our criticisms it is pleasing to see management planning and policy for these special areas continuing to be developed at a steady pace.

New Zealand Committee for Water Pollution Research and Control (Jonet Ward)

There are now 23 member bodies of this Committee.

Two conferences were sponsored in 1985. The combined N.Z. Microbiological Society Conference and 17th N.Z. Biotechnology Conference was held at Massey University in May 1985. A half-day session on water and wastewater microbiology was sponsored by NZCWPRC who also provided funds to assist Dr Gillian Lewis to travel to the conference to present an interesting paper on viruses in water.

The conference of the N.Z. Water Supply and Disposal Association was held at Lincoln College in August 1985 with the theme 'Small Communities'.

Unfortunately the NZCWPRC specialised conference on Water Stabilisation Ponds had to be cancelled.

In 1986 this Committee is sponsoring a workshop on pollution caused by mining activities as part of the conference of the Australasian Institution of Mining and Metallurgy in Rotorua in August.

Comments were submitted by the Committee on the draft Water and Soil Bill in 1985. These are now incorporated into the revised draft which will be introduced to Parliament hopefully early in 1987.

Society Records (Margaret Leslie)

The Society Records are stored in the cupboards belonging to the Ecological Society located in the D.S.I.R. Ecology Division offices. They have been sorted into various categories and a card index has been established on all aspects of Society activities since its inauguration. The index is based on matters raised in Council and Annual General Meetings and is augmented by cross reference to relevant files. To date indexing is completed for all minutes to the end of 1985, and all Conservation Sub-Committee and General Correspondence Files up to 1982. Other material yet to be indexed includes Finance, collections of Newsletters, Proceedings and Journals, files of sub-committees other than Conservation; Royal Society Member Bodies material, some miscellaneous literature and papers, and any material still in private hands.

Honorary Life Membership - Mr J.L. Nicholls

Honorary life membership of New Zealand Ecological Society was conferred on Mr J.L. (John) Nicholls at the Annual General Meeting at Palmerston North in August 1985. In awarding this distinction, the Society recognised his significant contribution to New Zealand ecology after a working lifetime describing and mapping native forests and assessing their scientific values.

John Nicholls joined the Forest Service as a labourer in 1946, graduated from Canterbury University College in 1952, and after several years experience on the national forest survey was posted to Forest Research Institute, Rotorua, as a forest ecologist in 1956. Between 1960 and 1967 he led the ecological survey of North Island indigenous forests, founded by Professor P.J. McKelvey, and was responsible for their classification and mapping.

His proposals for reservation of representative areas of indigenous State forests as ecological areas have led to protection of many natural ecosystems explicitly for ecological research. Between 1965 and 1969 John produced a report series for the Department of Lands and Survey on the scientific values of scenic reserves in the North Island, using methods that were years ahead of their time. He found many vegetation types were inadequately or not at all represented in the reserve network and recommended remedial reservations.

One basis of this approach was his concept of ecological districts (Nicholls, 1979), which has been adopted as the geographical framework for the current protected natural area inventory. Ecological regions and districts may become cornerstones of ecological planning in New Zealand.

Those colleagues who have the pleasure of working near John soon appreciate that his breadth of knowledge - encompassing botany, ecology, geology and geomorphology and history - is the key to his excellent overview of forest ecology and to his utilitarian approach to ecological districts and regions. With his modest demeanour he brings to his work integrity, discipline and a gentle, wry humour which will have a lasting positive effect on ecologists who have known him.

His published work consists of 16 scientific papers, 24 vegetation maps, and numerous sundry accounts, but much more is unpublished. These unpublished works are mainly descriptions of forest types and their environments, and rationales for

reservation. They were prepared between 1969 and 1985 to service Government Departments responsible for reserves and have been widely relied upon.

Now retired, John continues to work by contract on indigenous forest ecology at Rotorua. He is still frequently consulted by colleagues who esteem his wide knowledge. Honorary Life Membership of the Society will sit well on the shoulders of a man who has done much to mould the thinking and direction of ecology in New Zealand.

References

Nicholls, J.L. 1979. The concept of ecological districts: a possible framework for a national biological inventory. *Commission for the Environment Workshop*, Wellington.

