

BOOK REVIEW

Antarctic Resources Policy: scientific, legal and political issues edited by Francisco Orrego Vicuña. Cambridge University Press, 1983. 335 pp. £32.50.

A less likely locale for a high-powered conference than the Chilean research station Teniente Marsh on King George Island in the South Shetlands could scarcely be imagined. But the fact that it was possible to assemble there a group of senior scientists, diplomats and international lawyers, flying them in and out by jet air liner from continental South America, itself indicated that the need for such a conference on Antarctic resources policy was urgent. Antarctica is no longer a remote fastness, protected by stormy seas and barriers of ice. Perhaps it never really was. Two hundred years ago sealers were plundering the beaches of its outlying islands. The whalers arrived at the beginning of the present century and now that phase is all but past, attention has turned to an organism on a very different scale, Antarctic krill, only a hundred-millionth the size of a blue whale but in aggregate perhaps capable of sustaining an equivalent industry. Now, technology is on the verge of making the land and what lies beneath the ice accessible. Antarctica, once the domain of a small group of nations, some with largely territorial ambitions, but most with genuine scientific curiosity, is now attracting attention from a much wider field and there is little doubt that hopes of finding exploitable resources have stimulated this interest. In the special conditions of the Antarctic, with no clearly acknowledged sovereign powers, there is a pressing need to thrash out the legal and political issues that will present themselves. These issues formed the subject of the conference at Marsh, and the edited papers presented there are the contents of this volume.

The book starts with an introduction by the editor in which Francisco Orrego Vicuña draws attention to ways in which Antarctic resources policy is related not only to rational management, but also to the nature of Antarctic cooperation and its role in the international system. Failure cannot be risked in the Antarctic because the damage resulting from failure could be catastrophic. For this reason, participation in Antarctic activities has to be selective, and this justifies in his view the provisions regarding eligibility for consultative party status under the Antarctic Treaty.

The remaining 22 papers are grouped into five sections. The first deals with the state of knowledge. Sir Vivian Fuchs provides a short account. This is probably too brief to be of much interest to any but the beginner, but it usefully fills a necessary slot in the book. Living resources in the Southern Ocean and the mineral resources of the Antarctic are reviewed by George Knox and Tore Gjelsvik respectively. These are substantial factual chapters which provide a useful basis for the rest of the book. Martin Holdgate writes on environmental factors in the development of the Antarctic. This is a much more speculative contribution but nevertheless a very useful one. However, I fear the unexplained (and unreferenced) discussion of the concept of *r* & *K* strategists in an Antarctic context will be beyond many readers of the book. John Heap ably describes cooperation in the Antarctic. He reminds his audience of the often ignored fact that the Antarctic Treaty system consists only of obligations; it confers no rights and has little other than moral sanctions to enforce observance of the obligations.

The second part of the book concerns conservation of living resources. Darryl Powell provides a brief summary of the principles of the Convention for the Conservation of Antarctic Marine Living Resources, and the way in which its Commission will operate. Takeshi Nagata discusses the implementation of the Convention. This is a thoughtful paper that gets down to the basics. The discussion of

the relationship between CCAMLR and BIOMASS is especially useful. Josyane Couratier discusses the regime for the conservation of Antarctica's living resources, and Fernando Zegers the objectives and political aspects of the negotiation of the Convention.

The third part concerns mineral resources. Oscar González Ferrán introduces the subject with a chapter on geological data and a mineral regime. Egil Bergsager in a useful and informative chapter discusses options and precedents for exploration and exploitation of mineral resources. Gilbert Guillaume briefly discusses oil as a special resource. C. D. Beeby and Orrego Vicuña consider the problems of preparing and defining a minerals regime. Keith Brennan deals with criteria for access to Antarctic resources. This introduces the concept of Antarctica being part of the 'common heritage of mankind' and this is discussed in relation to the Treaty system.

Part four deals with issues involving Antarctica and the Law of the Sea. Alfred van der Essen and Orrego Vicuña discuss the application of the Law of the Sea and Exclusive Economic Zones respectively to Antarctica. Maria Teresa Infante deals with the continental shelf and its implications for a minerals regime.

The fifth part, the policy for Antarctic cooperation, starts with a consideration of Antarctica's role in international relations by Roberto Guyer. Tucker Scully looks to the future in reviewing alternatives for cooperation and institutionalization in the Antarctic. E. F. Roots provides a useful chapter on the technology of resource development in polar regions. Finally, Finn Sollie discusses jurisdictional problems in relation to Antarctic mineral resources in political perspective.

Like most multi-authored books, this is varied in the quality of its contributions. Some authors review those data presently available, some discuss new concepts. There is perhaps less overlap than might have been expected, but on the other hand one feels the need for some more coherent linking between the contributions. Nevertheless, this is a valuable collection of essays and it will be required reading for those interested in the development of the Antarctic and international conservation in general. The editor and the publishers are to be congratulated for having issued such an attractively produced book so promptly.

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