field naturalist may be surprised to find the author stressing the apparently obvious connection between behaviour and ecology, until further reading makes it clear just how much of behavioural research is divorced from the realities of natural environment. Dr Ewer draws her examples from all groups of mammals, and is at pains to emphasise the existence, and indeed the necessity, of an extensive and complex basis of innate behaviour patterns as a prerequisite for the learning ability that so characterises the mammals.

GORDON B. CORBET

The Changing Flora and Fauna of Britain, edited by D. L. Hawksworth. Academic Press for the Systematics Association, £9.20

The last two decades have probably witnessed the most intensive period of activity in the study of the taxonomy and distribution of our flora and fauna since the closing years of the last century. The origins of this resurgence of interest in the more 'traditional' areas of field ecology can be attributed on one hand to concern over the impacts of a rapidly changing countryside and new forms of pollution, and on the other to the impetus of the introduction by the Biological Records Centre at Monk's Wood of mechanical data storage and retrieval techniques. Nine of the contributors to the present Symposium illustrated distributions by means of the BRC's standard 10 km \times 10 km dot maps.

Twenty taxonomic groups are reviewed from micro-fungi to arthropod parasites of man. Some of the material, for example on vertebrates will already be familiar, but much of the information on other groups has never before been collated. *Oryx* readers will especially welcome the chapters on freshwater fish by Wheeler and amphibians and reptiles by Prestt, Cooke and Corbett. The symposium lends support to the generally accepted view that many species of a broad range of taxonomic groups have suffered serious declines in the last 50 years while some are known to have become extinct. However, the story is not all gloom and additions to the fauna seem to be more than making up for the losses. 'More species (birds) are now breeding regularly in Britain and Ireland than at any time since ornithological recording began'.

Perhaps the book's most valuable feature is the analysis of the reasons for recent changes in status. The problems of sorting out effects due to natural causes, such as climatic changes, and those caused more directly by our own activities, for example damage to habitat and pollution, are not always easy. However, it is accepted that many taxonomic groups are sensitive indicators of environmental change and indeed this fact now provides one of the most potent arguments supporting the case for wildlife conservation.

The organisers hoped that the symposium would increase the awareness of specialist taxonomists to changes in groups of organisms other than their own and the causes for these. This has certainly been achieved and more. Conservationists and all concerned with the management of our countryside now have a uniquely valuable account of the present status of the British flora and fauna.

D. T. STREETER

Freshwater Life, by John Clegg. Warne, £6.00

The appearance of the fourth edition of this book first published 25 years ago underlines its success. The author has taken the opportunity to extend and revise the text to include recent advances in freshwater biology and to accommodate changes in the approach to the study of the subject. The book continues to give a comprehensive description of the biology of the major plant and animal groups and of selected species. It also includes chapters on freshwater ecology, the biological aspects of

Book Reviews

water supply, sewage disposal and pollution, methods of collecting and examining specimens, and a long book list for further reading. Throughout the author emphasises conservation aspects. Although this is not an identification manual, the abundance of good plates and line drawings – 16 colour plates, 46 half-tone plates and 88 text figures – will help readers to get to know the names of freshwater organisms.

An excellent introduction to freshwater biology for teachers and students in schools and colleges, the clarity of the text also makes this a very attractive book for the amateur naturalist, conservationist and angler. Its publication coincides with the Save The Village Pond Campaign for which it provides helpful background information on pond ecology. An excellent book with a wide appeal.

URSULA BOWEN

Conservation in the Soviet Union, by Philip R. Pryde. Cambridge University Press, £5.00

The author, who is Associate Professor of Geography at California State University at San Diego, and specially concerned with environmental problems in the Soviet Union, has compiled a detailed, balanced and lucid account of the policy and practice of conservation and its success and failure in the largest country on earth. The first survey in English – and admirably comprehensive – it embraces, for instance, history, legislation, administration, the extraction and conservation of timber and mineral resources, and environmental pollution. The 27 appendices include a list of endangered mammals and of proposed natural parks, texts of Soviet conservation laws and a table of the composition of Soviet forests. There is a laudably accurate index and a 31-page bibliography.

The author analyses the major problems – for example, enforcing the conservation legislation, stopping the widespread poaching and the bad water pollution – and praises both the conservation education and the work of the *zapovedniki*, the nature reserves, numbering 68 in 1966 and covering some 106 million acres. Specified by law as being 'for scientific research and cultural-educational purposes', almost all *zapovedniki* have their own research laboratories, scientific staff and museums. Many were created primarily to preserve some unique or threatened species of plant or animal life such as the fur seal and spotted deer.

No major species has apparently become extinct on Soviet territory since the tarpan was exterminated a century ago. And the species greatly depleted earlier this century (e.g. beaver, sable, saiga) have been helped to a strong recovery. One great success story, which the Russians share with the Poles, is that of the European bison, or wisent: only 48 existed in the world in 1927, but by 1965 a breeding programme in the USSR had achieved 231 full-blooded wisents and the number is now probably doubling every five years.

JOHN MASSEY STEWART

Wildlife Conservation, by H. J. Frith. Angus & Robertson, £8.00

Conservation is planned management of a natural resource and the need for careful but flexible, informed management is a recurrent theme of this timely book. Harry Frith, Chief of the CSIRO Division of Wildlife Research, has done his country a service in presenting this well-documented account with its emphasis on the importance of conserving habitats along with animals.

A concise description of Australia's vertebrate fauna is followed by one of the vegetation, the preferences of various animals for different habitats, the effects of land use and the alteration of habitats by grazing, clearing, mining, burning, water conservation and pollution. The size of Australia and the concentration of human population in a few places fosters what Frith's predecessor, the late Francis