problem. Among currently held hypotheses the alternatives that they were primary magmas or that they were derivatives of an alkali ultramafic parent ascending from the mantle find repeated expression in both books. The publication of the books at this time should stimulate continuing research on the challenging genetic problems these rocks present. *The Geology of Carbonatites* with its straightforward, systematic treatment of the subject will doubtless appeal more especially to the student, while *Carbonatites*, as a symposium study, is likely to find particular favor with the specialists. All students of the subject should have ready access to both volumes.

C. E. TILLEY
Department of Mineralogy and Petrology, University of Cambridge, Cambridge, England

Endocrine Tissue

The Adrenal Cortex. ALBERT B. EISENSTEIN, Ed. Little, Brown, Boston, 1967. 701 pp., illus. $22.50.

It is some time since a comprehensive examination of the status of knowledge of the adrenal cortex has been published. This new text is highly informative while, in most chapters, appropriately indicative of the large deficiencies in present knowledge. As Gregory Pincus notes in the foreword, four major fields are dealt with: (i) the nature and control of corticosteroid biogenesis and metabolism; (ii) corticosteroid secretion and transport; (iii) the biological action of the adrenocorticosteroids and synthetic analogues; and (iv) clinical investigation of adrenocortical function in health and disease. There are 26 contributors, and the level of presentation ranges from highly specialized analysis and viewpoint of interest to the physiological and biochemical investigator to practical guidelines for the clinician.

It is not quite clear how long the book was in the press but it seems to have been rather a long time. Despite undoubted efforts of the authors to be up to date at zero time, there are some topics in which the scene has already shifted significantly. As for scope, the editorial net was cast wide, but, although one does not envy the editor his problems of selection, perhaps not wide enough. There is an interesting section on electron microscopy, but, as the preface notes, there are no chapters on anatomy and histology; thus the volume might be usefully considered as a companion to *The Adrenal Cortical Hormones* (Springer-Verlag, Berlin, 1962), which has extensive coverage of histology by Deane. However, a chapter on adrenal androgens was an evident omission at this point in time. In turn this may have led to the lack of exposition of contemporary thinking and theory on steroid dynamics, particularly in relation to peripherally interconverting compounds which have their origin in the adrenal cortex. The biosynthesis of the adrenal androgens is covered, and their role in the adrenogenital syndrome is well presented. Yates's discussion of feedback in cortisol control is very interesting.

Since the stated aim was a comprehensive coverage of current knowledge on the adrenal cortex, the reader with general biological as well as clinical interests will be aware that the overall orientation is weak in comparative physiology, notwithstanding a few chapters such as the one on biosynthesis. Similarly, a section on ecology, population dynamics, and the adrenal could have highlighted endocrine interrelations, a subject of rapidly growing interest. The editor has been tolerant of the differing emphasis in the chapters, which range from historical record with scholarly review to presentation, sometimes including new data, in which the authors' own researches are pivotal. The diversity makes for stimulating reading. Overall, the editor and authors have provided a valuable integration for all with endocrinological interests.

DEREK A. DENTON
JOHN P. COGHLAN
Howard Florey Laboratories of Experimental Physiology, University of Melbourne, Parkville, Victoria, Australia

The Families of Mammals

Recent Mammals of the World. A Synopsis of Families. SYDNEY ANDERSON and J. KNOX JONES, JR., Eds. Ronald, New York, 1967. 461 pp., illus. $12.50.

Our literature is replete with checklists and general monographic works on mammals, with field guides and manuals on the species of many states, and with treatises on orders and genera of Recent and fossil forms. Still lacking has been a comprehensive survey of the intermediate taxonomic groups throughout the world. This need was recognized by graduate students in mammalogy. In 1950, a group of about 16 at the University of Michigan assembled extensive synoptic material on the families of mammals, together with distribution maps. Other groups with the same purpose, in 1953 and again in 1959, met at the University of Kansas; this book, sponsored by the American Society of Mammalogists, is an outgrowth of the materials they organized. The 18 contributors include nine of the participants in these meetings, among them the two editors who supervised the expansion and standardization of the copy and saw it through the press. Readers of Cockrum's *Introduction to Mammalogy* (also the Ronald Press, 1962) will note a similarity to this volume; the two had the same derivation, but the present work is far more complete and carefully prepared.

This book contains "a concise summary of each of the 20 orders and 122 families of living or recently extinct mammals." An introduction reviews the traits of mammals in general, comments on their distribution, and explains the organization employed in the book. The second chapter is a careful sketch of the fossil history of mammals. Thereafter, each chapter is devoted to one or more orders or parts thereof, with "information on form, function, distribution, numbers of species, and history." Written in telegraphic style, the book contains a vast amount of useful and often obscure information on structure, habits, habitat, and relationships. Listed are the subfamilies and their genera; some, of course, will quarrel over the inclusion or omission of certain ones. Considerable pains are taken (pp. 89, 102) to explain the relationships of the lipotyphlan and menotyphlan insectivores. At the other end of the scale, we read (p. 177) that "Men consider themselves important, both individually and collectively, and this has been reflected in an excessive number of names proposed for fossil hominoids, in an excessive volume of literature devoted to dubious interpretations and based on inadequate scraps of fossils or even less, and in an excess of emotional involvement in interpretations of evidence."

There are minor differences, mostly well established, from usage elsewhere —Didelphidae for Didelphiidae, Pteropodidae for Pteropidae, and Desmodontidae for Desmodidae, for example. The cetaceans are split into three orders,