BOOK REVIEWS

Laboratory Aids in Endocrine Diagnosis. By Roberto F. Escamilla. (Pp. xii+131; 21 plates. 34s.) Oxford: Blackwell Scientific Publications. 1954.

This little book, which is almost encyclopaedic in scope, contains lists of laboratory tests applicable to the presently acknowledged endocrinopathies. Laboratory tests are given a wide application, including electrocardiograms, radiographs, the metabolic rate as well as those more strictly allied to clinical and chemical pathology. The final chapter, instead of the customary index, contains a recapitulation of the laboratory data collected under the headings of the various endocrine diseases.

Only the methods of the more complicated tests are given. These include, for example, two methods for blood glucose, vaginal smear techniques, and urine pregnancy tests. Although cancer diagnosis by vaginal smears grew out of work on endocrine studies it seems out of place in this sort of book to include a large colour plate (Fig. 11) depicting cervical cell pathology. It is interesting to find the Hogben pregnancy test relegated to the place of an "also ran," being displaced by male frog or toad tests. The chapter on testicular biopsy is well up to present-day teaching, but the few photomicrographs are technically ill chosen.

The book might be found useful for reference, but the author insists that laboratory aids do not replace an adequate clinical appraisal of a patient. Few would agree to repose confidence in one specially trained technician in interpreting results of some of the more complicated tests for clinical use.

M. HAINES.

Experimental Diabetes and its Relation to the Clinical Disease. A Symposium organized by the Council for International Organizations of Medical Sciences established under the joint auspices of U.N.E.S.C.O. and W.H.O. (Pp. ix+352. 35s.) Oxford: Blackwell Scientific Publications. 1954.

It is still a matter of some surprise to some observers that the problem of human diabetes was not more or less finally solved by the studies which began with the demonstration by v. Herring and Minkowski that pancreatectomy was followed by diabetes and which culminated in the successful isolation in 1922 of insulin by Banting and Best. Indeed, the spate of work which followed this last discovery has presented far more problems than it has solved. The role of the pituitary and adrenal hormones is no nearer being understood. Even the important discovery of the diabetogenic action of alloxan has done nothing to tell us the cause of human diabetes, which remains as elusive as it was before the first experimental pancreatectomy. The literature in this field is so vast that any account attempting to bring together within a reasonable compass our knowledge of the subject is especially welcome.

In 1952 the Council for International Organizations of Medical Sciences sponsored a symposium on experi-

mental diabetes and its relation to the clinical disease. The book *Experimental Diabetes* which records the papers presented at that symposium, together with the numerous discussions these papers provoked, provides a compendium invaluable to the biochemist, physiologist, or clinician who is concerned with diabetes. An excellent account by Best of recent work on the islets of Langerhans is followed by two papers by de Duve and by Candela on glucagon. The possible mechanism of the diabetogenic action of alloxan in the experimental animals receives particular attention, but the view that alloxan or uric acid may fulfil a physiological function in carbohydrate metabolism or be of importance in the causation of human disease is unconvincing. Two papers are concerned with the effects of adrenal steroids in carbohydrate metabolism; growth hormone and its relation to general metabolism, to diabetes, and to insulin also receive consideration. There are also contributions on the action of insulin as well as on its absorption, as well as papers discussing diabetes and heredity, diabetes and pregnancy, and the various clinical forms of the disease.

This book, which is astonishingly readable despite the large mass of factual information, is a praiseworthy attempt to bring together the views of clinicians and scientists, and may well stimulate a closer collaboration between these two groups of workers.

C. H. GRAY.

Porphyrins. Their Biological and Chemical Importance. By A. Vannotti; translated by C. Rimington. (Pp. 258; 15 plates. 50s.) London: Hilger and Watts. 1954.

Professor Vannotti's monograph "Porphyrine und Porphyrinrankheiten" was published in 1937. Its value is indicated by the fact that so eminent an authority as Professor Rimington should have felt it desirable himself to translate it and thereby make it more readily available to English-speaking readers. This is not a translation solely of the 1937 monograph, as Professor Vannotti has specially made considerable additions to cover advances since that time. The recent literature is, however, less well covered. The manuscript was finished some time ago, but publication was unfortunately delayed. The considerable recent advances in our knowledge of porphobilinogen and porphyrin biosynthesis are thus not adequately covered.

The section on the chemistry of the porphyrins is principally confined to a statement of structures. Spectroscopic characteristics are well summarized with useful plates, and this is followed by a chapter on extraction and determination. The classical methods are well reviewed, but the paper-chromatographic and electrophoretic techniques now yielding most useful results in this field receive scant mention. The occurrence of porphyrins in nature is then considered.

The greater part of the book consists of a review of porphyrin metabolism in man in normal and pathological