

Our Bookshelf.

Thyroxine. By Dr. Edward C. Kendall. (American Chemical Society Monograph Series, No. 47.) Pp. 265. (New York: The Chemical Catalog Co., Inc., 1929.) 5.50 dollars.

THE researches of Prof. Kendall into the chemistry of the active principle of the thyroid gland are well known: this monograph, however, is much more than an account of his own work, since the study of thyroxine implies the study of the physiology of the thyroid gland. The viewpoint is that of the chemist who is concerned with the relationship of thyroxine to the processes of oxidation in the animal body.

Although Kendall isolated the active principle in crystalline form in 1914, it was not until 1926 that Harington and Barger proved its constitution by synthesis. As a result of his original analyses, Kendall had found that thyroxine contained three atoms of iodine, whereas actually four atoms are present: the explanation of the discrepancy appears to be that volatilisation of traces of organically bound iodine occurred during the alkaline fusion of thyroxine, so that the molecular weight assigned was too low.

Thyroxine is not the only iodine compound present in the thyroid gland: Harington (*Biochem. J.*, vol. 23, p. 373; 1929) has recently isolated diiodo-tyrosine and considers that only these two are present; Kendall, however, inclines to the view that thyroxine may exist in the gland in an 'active' form, since dried thyroid may have quantitatively somewhat greater activity than thyroxine, and also that other compounds are present. He describes also the activities of the various substances which have been isolated from the gland and reviews the evidence on its physiological function: in this connexion he refers to the clinical disorders of this functioning, in so far as they throw light on the influence of the active principle upon the chemical activities of the body. This book should be in the hands of all biochemists, physiologists, and pharmacologists: it will be invaluable as a work of reference, since more than five hundred papers are reviewed in the text.

(1) *Youth: the Psychology of Adolescence and its Bearing on the Reorganisation of Adolescent Education.* By Prof. Olive A. Wheeler. Pp. xv + 202. (London: University of London Press, Ltd., 1929.) 5s. net.

(2) *The Child from Five to Ten: Interests and Problems of Early Childhood.* By Evelyn and Miriam Kenrick. Pp. vii + 299. (London: Kegan Paul and Co., Ltd., 1929.) 7s. 6d. net.

WE place these two books in juxtaposition because together they constitute a sign of the times. In certain respects they differ markedly. Dr. Olive Wheeler's treatment of her theme is emphatically scientific, whilst the Misses Kenrick are strong in human sympathy and in practical insight. This is by no means to say, however, that Dr. Wheeler is not human, or that the Misses Kenrick are not scientific. Each writer gives of her best, and her best is very good.

(1) Dr. Wheeler has chosen the more familiar ground, for the psychology of adolescence has a considerable literature of its own. But besides giving us a more manageable book than Stanley Hall's, and a more adequate one than Dr. Slaughter's, she has brought her account abreast of recent inquiry, including work of her own, and has thought out her subject in connexion with the questions of educational reorganisation that confront England at the present time. "Youth" is both an able and a timely book.

(2) In a sense the Misses Kenrick break new ground, for the period between infancy and adolescence has not received so much attention from psychologists as these two periods, the one so full of charm, and the other so full of peril. But the child from five to ten, or at any rate from seven to eleven, is destined to become a definite educational problem by himself; so we welcome this book. The writers owe nothing to the method of the questionnaire, or to any studies on the extensive scale. But their keen insight, their experience as teachers, and their adequate psychological equipment, have enabled them to give us valuable intensive studies of individual children.

An Historical Catalogue of Surrey Maps. By Henry A. Sharp. Pp. 56. (Croydon: The Central Library, 1929.) 3s. 6d. net.

THIS is a handy catalogue of those maps of Surrey which find a place in the Croydon Public Libraries. The list is arranged in chronological order, and the first entry of an original map is Peter Keer's map of Surrey of 1599, published by Speed. We then find entries of maps by Norden; Speed (engraved by Jodocus Hondius), in many forms; Blaeu (1648); Jansson; Blome (engraved by Hollar); Morden (1695); Seller, "Surrey: actually survey'd and delineated" (1733); Rocque, on the large scale of 2 inches to the mile (1762); until we come to John Cary (1754-1835), and the beginning of the more modern type of map. There are altogether 176 different maps or editions tabulated and described, and the work has evidently been a labour of love for the author.

There is an excellent introduction in which the reader will find a great deal of information about the maps of Surrey, and some other matters, such as the story of Mr. Smyth and his Dog. A useful addition in any future issue would be some information as to the amount and value of the original field work which forms the basis of the maps; some account, for example, of Saxton's actual surveys. Saxton was born about 1542, and he has been called the first English cartographer. Keer reduced his maps from Saxton, but it was Saxton who did the field work. Some description of Cary's actual surveys would be of value, and generally, it would be of interest to discriminate between those cartographers who used new material, and those who merely made a re-hash of previously existing maps.

It might be as well, in future editions of this catalogue, to rearrange the entries relating to the Ordnance Survey 1-inch maps. The present arrangement is not perfectly systematic.