Book Reviews


Modern estimates put the prevalence of mental subnormality at 2-3% of the population. In the majority of cases the cause of the defect cannot be established, but laboratory investigations often help in arriving at a diagnosis. The authors have compiled a comprehensive survey of laboratory findings in disorders which are associated, or may sometimes be associated, with mental retardation. The book contains chapters on disorders of amino acid, lipid, and carbohydrate metabolism, followed by chapters on disorders of the endocrine glands, of connective tissue metabolism, and on chromosomal anomalies. The final section, 'Other conditions known to cause mental retardation', deals with additional genetic and environmental factors acting before or after birth, which may directly or indirectly interfere with intellectual development, such as toxic substances, infections, disturbances of mineral metabolism, haematological and immunological disorders, and abnormalities in the metabolism of the purines, pyrimidines, and vitamins. Each disease is described under the headings of clinical findings, mental state, inheritance, laboratory findings, and nature of the lesion. Morbid anatomy, neuropathology, and histopathology, which are normally considered part of clinical pathology, are largely excluded from this survey. Numerous good drawings are an attractive feature of the book. The references listed at the end of each chapter have been carefully selected and are well up to date. Unfortunately no references are given in the text. This makes it difficult to identify the reference from which the data quoted originate.

In this field it is important to distinguish between an association of a disease and mental retardation, which may be due to chance, and a causal relation. Thus, it is likely that in a disorder of such high prevalence as cystinuria the association with mental retardation is one of chance (p. 61). It appears to have been the policy of the authors to include where possible all the findings in any disease which has ever been reported as associated with mental retardation, but this approach has left little scope for a critical evaluation of the data. Also it makes for an uneven balance of the book. Disorders of immunity which 'may be associated with infections which may lead to brain damage and mental retardation' are given almost as much prominence as the chromosomal disorders. In well-documented conditions lack of space inevitably leads to oversimplification and ambiguities. For example, in the section on amaurotic family idiocy it is not always made clear whether the findings are valid for all variants or confined to Tay-Sachs's disease (p. 112). The section on the laboratory findings in Down's disease is confusing, particularly where it refers to the alleged differences between trisomy and translocation (p. 196). Some errors of fact have slipped in. In contrast to what the reader might infer, most authorities would agree that inheritance of the Duchenne form of muscular dystrophy is almost always sex-linked recessive (p. 281), oxalic acid excretion in the non-ketotic form of hyperglycaemia is normal or allegedly low (p. 69), the polyneuritis caused by thalidomide is not always reversible (p. 238), stained films of CSF unfortunately do not always reveal the infecting organism in bacterial meningitis, nor is it advisable to delay treatment until the sensitivity of the organism has been determined (p. 218), and there is no reliable evidence that penicillin G when taken by the mother causes fetal brain damage (p. 237). Nevertheless the book contains a great deal of valuable if not always reliable information, much of it not readily accessible elsewhere. It is particularly useful for rapid reference to the rarer disorders occasionally associated with mental retardation.


Many find large international congresses unbearable; they are confusing and invariably present the three most interesting papers simultaneously! However, they do gather together at one time a large collection of papers portraying activities in different countries and highlighting recent developments in the particular subject. It is useful to have all this material on record and available with little delay, and the editor is to be congratulated on achieving the formidable task of presenting 31 symposia and numerous individual papers in a volume of almost 1000 pages within 12 months of the meeting.

This is a volume for the library shelf. There is something about every aspect of mental deficiency: genetic, chromosomal, biochemical, clinical, educational, and social aspects in both the young and the old are discussed. No one topic is covered completely, so the newcomer to this field would be unwise to approach this volume as he would a textbook, but any worker interested in the views being expressed in 1967 would do well to look here.

The quality of the printing and illustrations is good. Though a heavy task for the editor, an index of the main subjects would be helpful and really should be included.