includes a comparison of the necropsies which followed the assassination of Abraham Lincoln, John F. Kennedy, and Robert F. Kennedy, and a note on current research.

In a book of this length it is not possible to deal in depth with the many aspects of such an investigation. The most authoritative chapters are those dealing with actual wounds, and these reflect the author's great experience in this field. The difficulties which may arise during the pathological examination of wounds, and their interpretation, provide a salutary message to pathologists who believe that the patterns of firearm injury follow established rules. The weakest section is that on ballistics, most of which could be omitted as it is out of context.

This book describes unusual cases which might be of interest to the forensic pathologist but has little to offer which is not already included in standard textbooks on forensic medicine.

A. K. MANT

The Hyperlipidaemias: Clinical and Laboratory Practice. By Barry Lewis. (Pp. xii + 436; illustrated; £16.00.) Oxford: Blackwell Scientific Publications. 1976.

The hyperlipidaemias are now recognised as one of the commonest metabolic disorders affecting industrialised nations and have been a subject of special interest to Professor Lewis for the past two decades during which time he has become a recognised international authority. This book represents the distillation of his experience and satisfies a long awaited need for a comprehensive, readable, and authoritative text on this important area of medical practice. The early chapters briefly but adequately review basic lipid and lipoprotein chemistry and metabolism, and later chapters discuss physiological factors affecting plasma lipids before each of the major disorders of lipid metabolism is discussed in individual chapters relating to each disorder. The final chapters are devoted to discussion of management problems including the author's briefly stated views on the function of a lipid clinic.

The final two chapters on laboratory practice and comments on sample collection and methodology make this a valuable text for departments of clinical chemistry as well as physicians with direct responsibility for the clinical care of patients with problems of lipid metabolism. The book is well illustrated, and

one of its notable features is that each chapter can be read as an individual essay without too much cross reference to other chapters. Professor Lewis and his publishers are to be congratulated on producing a most worthwhile addition to the medical literature.

C. A. PENNOCK

Biology and Disease of the Hair. Consulting editors: Tatsuki Kohori and William Montagna. (Pp. xxxi + 667; illustrated; £45.50.) Baltimore, London, Tokyo: University Park Press. 1976.

This is a record of the proceedings of the First International Symposium on Biology and Diseases of the Hair held in Tokyo in 1975, provided we ignore the one in London in 1957 and that in Canberra in 1964. The majority of the 100 or more contributors are Japanese with a supporting number of American authorities on hair growth, melanogenesis, pilosebaceous activity, and others. There are also a small number from Poland, West Germany, and Australia. The book contains 52 chapters and has six editors.

The work deals with the physiology and pathology of hair growth, diseases of the hair and their treatment, and hair cosmetics; there are also chapters on the comparative study of hair in mammals. This is, therefore, a comprehensive work on many facets, and is covered in a matter of 667 pages. This means that many aspects are only briefly considered: more so in view of the fact that many of the pages are filled with good quality transmission and scanning electron micrographs and other photographs. Many of the chapters have less than six pages of text and some of these might be considered irrelevant as, for example, those on Immunofluorescent findings in psoriasis of the scalp, and The histological study of keratoacanthoma. Some aspects of hair pathology are, however, neglected: thus, while there is a chapter on the Ultrastructural study of alopecia areata, another on the zinc treatment of this condition which incidentally reports the findings in only two cases, and a third on treatment by occipital nerve blockage, there is no 'in depth' consideration of the possible mechanisms causing this interesting condition.

Chapters deserving special mention include those on The molecular mechanisms in hair formation, The genetic control of mammalian hair color, and The genetic disorders of hair growth; the latter

includes a number of excellent scanning electron micrographs.

In brief, the book has too little text, but some of the chapters are good even though short. The work does provide a number of interesting essays on our present knowledge of hair and its disorders and should be of value to those involved in these fields. However, the price may deter some would-be readers as the cost is £45.50, and this does not include an index!

A. JARRETT

Pathology of Tumours of the Oral Tissues. 3rd edition. By R. B. Lucas. (Pp. x + 426; illustrated; £16.50.) Edinburgh, London, and New York: Churchill Livingstone. 1976.

Since the publication of its first edition in 1964, Professor Lucas' book on *Pathology of Tumours of the Oral Tissues* has become established as a standard text, and this new (3rd) edition will doubtless be as popular as its forerunners. There are nine chapters, dealing successively with the embryology and histology of oral tissues, the taxonomy of oral tumours, tumours of dental tissues, tumours of the jaws and soft tissues, metastatic tumours, salivary gland tumours, cysts of oral tissues, and dysplastic lesions of bone. The book is profusely illustrated with a large number of excellent photomicrographs, some radiographs, and photographs of gross specimens. The text is comprehensive but eminently readable. An adequate list of references is given at the end of each chapter. This work will be of great help and interest to the practising histopathologist, whether 'general' or specialising in oral pathology. It can also be recommended as a valuable reference work for all clinicians and radiologists concerned with the diagnosis and treatment of neoplastic disease of the head and neck.

N. F. C. GOWING

International Review of Experimental Pathology. Volume 16. July, 1976. Edited by G. W. Richter and M. A. Epstein. (Pp. xiv + 345; illustrated; £21.95/\$36.00.) New York: Academic Press. 1976.

This is a further interesting and valuable addition to a respected review series in experimental pathology. Each of the present topics has important clinical

implications; they include molecular probes for human tumour viruses, aspects of the chalone concept, phagocytosis, and tumour blood vessel proliferation in addition to chapters devoted to phagocytosis and transfer amyloidosis.

Each contribution is authoritative and very detailed and will form a sound basis upon which to begin further study. The sections on chalone and vascular proliferation are especially readable and form appraisals of the current state of the art. All chapters abound with references, and it is a pity that a uniform method of their quotation in the text was not adopted. Some illustrations are not as clear or as easy to interpret as most pathologists would wish. This defect, however, may be related more to the quality of the paper and to the printing methods used rather than to the quality of the original print.

A. MUNRO NEVILLE

Clinical Enzymology 1975. Proceedings of a Symposium Organised by the Liverpool Branch of the Institute of Medical Laboratory Sciences, September 5th-7th, 1975. (Pp. 93; illustrated; £1.30 to members; £2.30 to non-members.) Institute of Medical Laboratory Sciences. 1976.

The contributors to this symposium include some of the well-known names in the field of clinical enzymology. Most of the papers and discussion deal with the problems of methodological standardisation and quality control, and of the standardisation of terminology. Some such problems are reflected in the many different names and abbreviations used by the speakers for the same enzymes. The non-expert will be confirmed in his reluctance to make further moves towards standardisation of methods (for instance, of the temperatures used) until the dust settles: inflicting the change to SI units on clinicians is one thing, but frequently altering enzyme values, which are still reported in so-called 'international' units, is quite another, especially as this does not guarantee uniformity between laboratories.

Clinical applications are dealt with only in passing, but the wind of change in clinical biochemistry is reflected in the lively discussion on the pros and cons of multichannel analysis that followed the apparently innocuous paper on radio-metric methods.

More stringent editing might have made some of the papers and discussions more readable. However, the booklet provides a good introduction to the current technical problems in clinical enzymology.

JOAN F. ZILVA

Blood and its Diseases. By I. Chanarin, Milica Brozović, Elizabeth Tidmarsh, and D. A. W. Waters. (Pp. v + 250; illustrated; £4.50.) Edinburgh, London and New York: Churchill Livingstone. 1976.

The authors set out to cover the field of haematology in some depth. Within the limits of the space available, and when complemented by a book on technique, they meet the needs of medical laboratory scientists for HNC examinations and of doctors for the primary examination of the Royal College of Pathologists.

A section on physiology is followed by a consideration of diseased states, including useful sections on the blood in systemic disease, pregnancy and infancy; on thrombosis and its management; and on transfusion problems. There is no single chapter on the effects of drugs on the blood, but adequate coverage is given within the various sections, and there is an index. A chapter on organisation and management in the haematology department is brief but contains some good advice. The price is reasonable, and the diagrams are clear. A list of recommended reference books has some surprising omissions.

J. O. P. EDGCUMBE

Notice

New IUIS/WHO International Standard for FITC labelled sheep antihuman immunoglobulin

The Standardisation Committee of the International Union of Immunological Societies (IUIS) is pleased to be able to inform workers using immunofluorescence techniques that the Director General of the World Health Organization has, on the advice of its Expert Committee on Biological Standardisation, accepted the IUIS fluorescein isothiocyanate (FITC) labelled sheep antihuman immunoglobulin for the demonstration of antibodies in human serum as a World Health Organization International Standard. The material is intended to be used for the assessment by comparative immunofluorescence assay of the potency and quality of similar national and laboratory conjugates. Ampoules of this standard are available from the Immunology Unit, World Health Organization, 1211 Geneva 27, Switzerland. The number of ampoules available to an individual laboratory must be strictly limited but the standard will be dispatched in response to a letter from the scientist describing the purpose for which it is to be used.