Book reviews

NEUROLOGICAL SURGERY OF TRAUMA Office of the Surgeon General, Department of the Army. (Pp. 604; 273 figures; 37 tables. \$6.25.) Washington. 1965.

The Korean war found the United States unprepared for its early neurosurgical casualties and this remarkable volume reflects healthy self-criticism and a characteristically vigorous determination to learn thoroughly from experience, which Oscar Wilde defined better than anyone else as the name every one gives to their mistakes. Would we in Britain be any better prepared if this country were suddenly involved in serious fighting? The necessary fundamental information is available; indeed, it was recorded for future use during and at the end of World War II, and it must not be allowed to lie forgotten and to have to be wastefully rediscovered by a new surgical generation.

In his Foreword the Surgeon General suggests that the book will be of value also to the civilian medical profession; but, of course, the main theme is a far cry from head-injury work in a country where virtually no civilians carry arms. This is a book for warfare, and is presumably proving valuable in Vietnam at the moment.

It is therefore a pity that it has taken so long to appear, for it is not quite up to date; for example, the subject matter in a 1955 paper is described as 'recently reviewed'. The time lag leads inevitably to some important omissions. I should like to have seen the vexed problem of prophylactic antibiotics discussed and, from the U.S.A. particularly, to have read about something more sophisticated than the penicillin and streptomycin used in Korea, even if they may yet prove to be still the most useful drugs. In the chapters on spasticity, there is no mention of the use of phenol; in those on epilepsy, no reference to Jennett's work; and none to the anterior surgical approach in the chapter on cervical disc lesions. During World War II, some of the British neurosurgeons by whom I was trained remained unimpressed by the scrupulous attention that many American surgeons were paying to closure and grafting of torn dura mater, for there was no satisfactory evidence, nor has there been any since, that dural closure *per se* diminishes the incidence of either cerebrospinal fluid leakage or epilepsy. This controversy is acknowledged in the book, but if there is indeed no demonstrable difference in results between the two methods, there is surely a good case for the much shorter procedure (of simply excising contaminated dura) which will, during battle conditions, allow more operations in the precious time available. Similarly, the resection *en bloc* of a penetrating skull fracture is an unnecessary elaborate procedure if the dura is not to be widely exposed, excised, and repaired.

Neurosurgery can never be learned from pictures, but the 273 illustrations here are excellent: the photographs are clear and the drawings simple and instructive. The striking picture of the gloved finger feeling for the bone chip in a brain track would have horrified Dr. Cushing,

but delighted Geoffrey Jefferson. We British surgeons would probably think that the plastic surgical methods, and especially the rotation flap taught to us by Sir Harold Gillies, were more effective for closing large scalp defects than those illustrated here. Lesser criticisms may be made of the inevitable overlapping of subjects by different authors: and of a certain unevenness: for example, there is an excellent 25-page account of the rehabilitation of paraplegics, but very little about that of the brain-injured. In Figs. 193 and 194 the legends have been transposed, and the page reference at the foot of page 44, and also one of those in the index to the use of urea, are incorrect.

These criticisms are sincerely made by a devotee of simplified surgery whose own war-time experiences are recalled vividly from the experiences of a surgical neophyte, and they are offered with humility to any who may be having to do this horrid work again. Military surgeons cannot fail to be helped by this book, which is testimony chiefly to the work of Dr. Arnold M. Meirowsky, whose own modesty and readiness to acknowledge other possible techniques than his own are apparent. There are sections on military neurosurgery, craniocerebral trauma, trauma of spinal cord, spasticity from trauma, associated wounds, trauma of the intervertebral disk, and an excellent one, with clear testing charts and illustrations, on trauma of peripheral nerves. Dr. Meirowsky and his distinguished co-authors are to be congratulated, together with the U. S. Government whose subsidy must presumably be responsible for providing such a book at such a reasonable price.

JOHN POTTER

YEAR BOOK OF NEUROLOGY, PSYCHIATRY AND NEUROSURGERY Edited by Roland P. Mackay, Sam Bernard Wortis and Oscar Sugar. (Pp. 734; 87 illustrations. 83s.) Chicago: Year Book Medical Publishers. 1964-1965 series.

The ever increasing number of papers published each year makes the task of the editors of the Year Book tremendously difficult, if not impossible. Based, as the Year Book is, on summaries of articles, space does not permit more than a very limited number to be summarized which makes it hard to provide an adequate picture of progress in each field. The editors have tried to overcome this by adding references to other papers and comments in small print, but one wonders if a short review of a subject followed by summaries of the more important contributions might not be more satisfactory.

REGIONAL CEREBRAL BLOOD FLOW An International Symposium, University of Lund, March 5, 1965. Edited by David H. Ingvar and Niels A. Lassen (Pp. 197. 30.00 Danish Kroner.) Copenhagen: Munksgaard. 1965. (*Acta Neurologica Scandinavica Supplementum* 14.)

The proceedings of many symposia are increasingly prone

to appear very many months after the participants have met and are records of work which has already become known by other means. This criticism certainly cannot be levelled against this symposium on regional cerebral blood flow which has appeared with commendable swiftness and records work in progress. Inevitably this means that much is incomplete and conclusions only tentative but this is no blemish; workers in this field are enabled to know what is currently in progress and to assess the potentialities of work with radioactive inert gases and thermal probes.

The clinician will be particularly interested in the demonstration that focal cerebrovascular lesions produce a fall in total cerebral blood flow as well as a local fall at the site of the lesion, which may be demonstrable when other investigations have proved negative. They will also be interested in the demonstration that after carotid ligation in young people for aneurysm there is a marked fall in carotid blood flow even though the vascularity as demonstrated by angiography seems adequate. The operation, though life-saving, cannot be regarded as ideal.

The symposium is therefore greatly to be welcomed and will be of value to research workers and clinicians alike.

INTRACRANIAL ANEURYSMS AND SUBARACHNOID HAEMORRHAGE By W. S. Fields and A. L. Sahs. (Pp. xv + 518; illustrated.) Springfield: Charles C. Thomas. 1965.

This book contains the proceedings of the twelfth annual scientific meeting of the Houston (Texas) Neurological Society on the theme of intracranial aneurysms and subarachnoid haemorrhage. It consists of a series of individual chapters devoted to many different aspects of intracranial vascular disease. It is divided into three main segments devoted to anatomy, angiography, and treatment, the last subject forming more than half the book. This volume is really composed of the present day views of a variety of workers in each field: some chapters deal with large series of cases, others with new forms of treatment the value of which must as yet be unknown. Much more experience of such new techniques, together with a long-term follow-up, are required before a true assessment of the values can be made.

It is well produced with extremely clear print on glossy paper and many excellent illustrations.

MYELOGRAPHY By Vincenzo Valentino. (Pp. x + 273; 221 figures.) Springfield, Illinois: Charles C. Thomas. 1965.

This book seems to be designed to assist doctors undergoing a formal course of instruction in neuroradiology, for the author specifically says that he believes that to become proficient in the practice of myelography 'more than a few months' haphazard training' is essential. There will be general agreement with Dr. Valentino about this but a book designed for advanced training in any speciality must achieve a high standard of clarity and accuracy. This is not always the case here. Indeed, the text as a whole is prolix and sometimes obscure. There is a full historical survey of possible methods of myelography with gas or air, and with water-soluble and oil-

soluble media but some of the author's comments upon them read more like personal prejudice than scientific appraisal. It is often better to let the facts speak for themselves. It is also irritating to read that 'a special apparatus (for gas myelography) is in use at the Serafimerlasarettet in Stockholm' and then to find that this is left undescribed.

The references are numbered and given in full at the end of the book, and reference numbers are scattered through the text. But in addition to these references by number, authors' names (unnumbered and undated) are also freely mentioned and one can only deduce what paper is being referred to by searching for these same names in the general reference list and assuming that the two correspond. Again, although this is not a short book (263 pages) and the importance of making radiological measurements of the transverse and antero-posterior diameters of the spinal canal is referred to (as it should be), very few actual figures are given, and these are not sufficiently precise to be helpful.

Not all of the illustrations are equally convincing, but many of them are beautiful and perhaps for these the book is worth a place in a neurosurgeon's or neuro-radiologist's library. But if it is to be recommended to the trainee, it will have to be drastically re-written. The general layout and production are in accord with the high standards which one expects of the publishers.

A. N. GUTHKELCH

LECTURE NOTES ON NEUROLOGY By Ivan T. Draper. (Pp. ix + 230; 29 figures. 18s. 6d.) Oxford: Blackwell Scientific Publications. 1965.

This is a simple but well presented account of diagnosis and treatment, which will be useful to the final year medical student. There is little to criticize, but the myth of macular sparing in occipital lobe destruction appears again! The choice of books for further reading is very surprising to the reviewer.

CYBERNETICS OF THE NERVOUS SYSTEM. Progress in Brain Research Vol. 17 Edited by the late Norbert Wiener and J. P. Schädé. (Pp. 424; 143 figures. 120s.) Amsterdam, London and New York: Elsevier. 1965.

The publication in 1948 of Norbert Wiener's 'Cybernetics: or control and communication in the animal and the machine' stirred many hopes, some more rosy than considered, of a new and powerful approach to problems in psychology, neurology, and psychopathology. Certainly it stimulated an entirely fresh orientation, one armed with precise theoretical weapons, whose full effect has yet to emerge. The volume under review was intended as a *Festschrift* to Professor Wiener on his seventieth birthday. His death last year, between himself choosing the contributors and its publication, converted it into a memorial volume.

It is difficult to feel that these essays do justice to so distinguished and richly seminal a person. In some, the more mathematical, formal precision is achieved but at the expense of retreat, sometimes aided by careless interpretation of empirical literature, from the stubborn