

by an eminent Spanish child neurologist who has made many original past contributions to the world literature. The tomes are attractively produced using good quality paper and are profusely illustrated with 1,235 pictures, about 30 of which are in colour. Many original line drawings clarify difficult anatomic concepts. The author's expertise and interest in radiology, he having formerly published another text on pediatric neuroradiology, are evident in the many carefully selected radiographs. Patient photographs and EEG tracings also are generally quite illustrative. My only disappointment in the illustrations is that I would have preferred to see more histopathology. The text is well written and clear.

An encyclopedic treatise on as broad a subject as pediatric neurology necessitates that some disorders be discussed only briefly in one or two paragraphs, but the author compensates in most cases with extensive and up-to-date references for further reading. These citations, together with the carefully compiled indices, make the textbook exceptionally useful as a reference source. The author's experience with dysmorphic syndromes, cerebral malformations and problems of embryologic development make these sections particularly interesting and informative. The most recent revision of the international classification of the epilepsies is used. Sections on metabolic diseases and neuromuscular disorders are clinically oriented but current and inclusive.

While comparisons with the 2-volume textbook of Swaiman and Wright are inevitable, Pascual-Castroviejo has written quite a different book. It is gratifying to see the country that provided such exceptional early pioneers as Ramón y Cajal and de Río Hortega continue to make contributions in the neurosciences. I would highly recommend this textbook to any pediatrician or neurologist who reads Spanish, and look forward to possible future translations to French and English.

*Harvey B. Sarnat  
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**BASIC MECHANISMS OF NEURONAL HYPEREXCITABILITY** (Neurology and Neurobiology, Volume 2). Edited by Herbert H. Jasper and Nico M. van Gelder. Published by Alan R. Liss, Inc., New York. 495 pages. \$120.00.

Is epilepsy a result of decreased inhibition, increased excitation or an intrinsic membrane abnormality of neurons? Do dendrites move? Is there electrical transmission between neurons in the C.N.S.? Do glia regulate neuronal function? How does North American scorpion venom work and why is this relevant to neuron activity? What produces a P.D.S. (paroxysmal depolarization shift), the neuronal hallmark of the EEG spike?

What is a neuromodulator? How do phenobarbital and phenytoin work? What is Florey's Factor I?

If any of these questions interest you, you will find the answers (or at least the authors' biases) in this volume. Based on a symposium at Université de Montréal in 1982, the book, whose multi-authored chapters range from good to excellent, examines (according to the dust jacket) how changes in neuronal excitability are of "major significance" in the epilepsies as well as in "the development of mental and motor disorders". Those interested in epilepsy will find a wealth of relevant basic scientific information. However, only occasional and indirect reference is made to how the data presented relates to psychiatric illness or motor system disease.

About equal parts of physiology and biochemistry are mixed with smaller amounts of anatomy, endocrinology and pharmacology to produce a balanced overview of neuronal hyperexcitability as seen from a basic neuroscientist's viewpoint. Control of membrane excitability is discussed with respect to four main areas: cellular microcircuitry (cell interaction), ionic mechanisms (extracellular and intracellular ion concentrations, membrane ion channels), neurotransmitters (including neuromodulators) and energy metabolism. Particularly noteworthy to anyone interested in the basic mechanisms of epilepsy and its treatment are the chapters by David Prince on ionic mechanisms in epileptogenesis and Robert Macdonald on the mechanisms of action of barbituates and hydantoins. Discussions recorded after the presentations at the Montreal meeting follow each chapter and these contain some of the most thought-provoking ideas in the book, a significant share provided by the senior editor, Dr. Jasper.

Dr. K.A.C. Elliott of Montreal, to whom this book is dedicated, was the first to determine that Florey's Factor I, an inhibitory substance in mammalian brain, was GABA.

The text is well edited with only the occasional spelling mistake, (e.g. protoxinin for picrotoxin, page 368). An annoyance is the use of two different qualities of paper throughout the volume, particularly when one considers the price.

Although there has been a proliferation of books from symposia of which several on epilepsy research have recently been or are about to be published, I would still recommend this volume to any clinical or basic neuroscientist who has an interest in epilepsy or who wishes to understand a little better how the brain works. However, unless you are independently wealthy or have a large expense account, you might want to ask your local library to purchase the book.

*Richard S. McLachlan,  
London, Ontario*

## Books Received

**ASSESSMENT OF APHASIA AND RELATED DISORDERS**, 2nd Edition. By Edith Kaplan and Harold Goodglass. Published by Lea & Febiger, Philadelphia. 102 pages. \$34.50 Cdn.

**EXPERIMENTAL AND CLINICAL INTERVENTIONS IN AGING**, 1983. Edited by Richard F. Walker and Ralph L. Cooper. Published by Marcell Dekker Inc. 448 pages. \$81.25 Cdn.

**FUNDAMENTALS OF NEUROPSYCHOPHARMACOLOGY**, 1984. By Robert S. Feldman and Linda F. Quenzer. Published by Sinauer Associates Inc., Massachusetts. 508 pages. \$43.75 Cdn.

**GLUTAMINE, GLUTAMATE AND GABA IN THE CENTRAL NERVOUS SYSTEM**, 1983, Series: Neurology and Neurobiology. Edited by Leif Hertz, Elling Kvamme, Edith

McGeer, Arne Schousboe. Published by Alan R. Liss, Inc., New York. 720 pages. \$107.50 Cdn.

**HUMAN LATERALITY**, 1983. By Michael C. Corballis. Published by Academic Press, Don Mills, Ont. 255 pages. \$39.80 Cdn.

**METHODOLOGY IN EVALUATION OF PSYCHIATRIC TREATMENT**, 1983. By Thomas Helgason. Published by Cambridge University Press, New York. 273 pages. \$43.12 Cdn.

**NEUROBIOLOGY OF MOOD DISORDERS** — Volume 1, 1984. Edited by Robert M. Post and James C. Ballenger. Published by Williams and Wilkins Company, Baltimore. 887 pages. \$180 Cdn.

**NEUROBIOLOGY OF THE HIPPOCAMPUS**, 1983. Edited by W. Siefert. Published by Academic Press, Don Mills, Ont. 632 pages. \$93.80 Cdn.

**PEDIATRIC HEAD TRAUMA**, 1983. Edited by Kenneth Shapiro, M.D. Published by Futura Publishing Company, Mount Kisco, NY. 296 pages. \$46.25 Cdn.

## Calendar of Events

**June 8-10, 1984. The United States/Canada Joint Conference on Neurologic Emergencies in Children and Adults.** Contact: Rayna Dutton, CME Coordinator, Continuing Medical Education, Childrens Hospital, 219 Bryant Street, Buffalo, New York 14222. Phone (collect) (716) 878-7630/7640.

**June 11-15, 1984. Ninth Annual Conference on the Clinical Application of Hyperbaric Oxygen** will be held at the Princess Hotel, Acapulco, Mexico. Contact: Michael A. Strauss, Chairman, Program Committee, 9th Annual Conference on the Clinical Application of Hyperbaric Oxygen, Baromedical Department, Memorial Medical Center, 2801 Atlantic Avenue, Long Beach, California 90801-1428.

**June 13-15, 1984. Third International Conference on Molecular and Cellular Mechanisms of Anaesthesia** will be held at The University of Calgary, Calgary, Alberta. Contact: 3rd International Conference on Molecular and Cellular Mechanisms of Anaesthesia, Conference Office, Education Tower 102, The University of Calgary, 2500 University Drive N.W., Calgary, Alberta T2N 1N4. Phone (403) 284-5051.

**June 18-22, 1984. Fourth Annual International Conference of CT of the Head and Spine**, La Napoule, France. Contact: Janice Ford, Department of Radiology, Hospital of the University of Pennsylvania, 3400 Spruce Street/G1 Philadelphia, PA. 19104.

**June 24-28, 1984. Third International Symposium on Infections in the Immunocompromised Host** will be held at York University, Toronto, Ont. Contact: Dr. Ron Feld, Department of Medicine, Princess Margaret Hospital, 500 Sherbourne St., Toronto, Ont. M4X 1K9.

**June 26-29, 1984. Canadian Association of EEG Technologists, Inc. 1984 Annual General Meeting and Teaching Seminar** will be held at the Chateau Lacombe, Edmonton, Alberta. Contact: Shirley Breitzkreuz, EEG Department, University of Alberta Hospitals, 8440 - 112 St., Edmonton, Alberta T6G 2B7. Phone (403) 432-6856.

**June 26-30, 1984. XIX Canadian Congress of Neurological Sciences**, Westin Hotel, Edmonton, Alberta. Contact: K.C. Petruk, Division of Neurosurgery, 11-102 Clinical Sciences Building, University of Alberta, Edmonton, Alberta T6G 2G3.

**August 20-22, 1984. VIII International Congress on Hyperbaric Medicine** will be held at the Hyatt Regency Hotel, Long Beach, California, U.S.A. Contact: The Secretariat, VIII

International Congress on Hyperbaric Medicine, c/o Baromedical Department, P.O. Box 1428, Long Beach, California 90801-1428, U.S.A.

**September 6-7, 1984. Workshop in Stroke Management.** University of Toronto. Contact: Secretary, Stroke Workshop 1984, Room E-4627, Sunnybrook Medical Centre, 2075 Bayview Avenue, Toronto, Ontario M4N 3M5. Phone (416) 480-4473.

**September 13, 14, 15, 1984. Annual Meeting of the Canadian Neuropathologists**, Ottawa General Hospital. Contact: Joseph Gilbert, Secretary-Treasurer, Canadian Association of Neuropathologists, Dept. of Pathology (neuropathology), Victoria Hospital, London, Ontario N6A 4G5.

**September 22-23, 1984. International Symposium on Somatosensory Evoked Potentials**, Kansas City, Missouri. Co-sponsored by the American Association of Electromyography and Electrodiagnosis and the American Electroencephalographic Society. \$140 U.S. for members and \$175 U.S. for non-members. Deadline is April 15, 1984 for free communications. Contact: AAEE, 732 Marquette Bank Building, Rochester, MN 55904.

**September 23-26, 1984. Synapse-50.** Montreal. Contact: Synapse-50, Montreal Neurological Institute and Hospital, 3801 University Street, Room 638, Montreal, Quebec H3A 2B4.

**October 1-7, 1984. The Study of the Nervous System Development in the Fetus and in the Newborn**, Erice (Trapani), Italy. Contact: Dr. Carlos Alvisi, Professor of Neurosurgery, University of Bologna, Via Ugo Foscolo 7 - 40123, Bologna, Italy. Phone 051/585053.

**November 4-7, 1984. First World Conference on Virus Diseases and Mental Health** will be held in Montreal and is co-sponsored by the World Health Organization and the International Comparative Virology Organization. Contact: Professor E. Kurstak, Director, ICVO/CVRG, Faculte de Medicine, Universite de Montreal, C.P. 6128, Succ. A, Montreal, Quebec H3C 3J7. Phone (514) 343-6285; Telex: 05 267389.

**June 9-11, 1985. VIII International Symposium on Parkinson's Disease** will be held in New York City. Contact: Assistant Secretary General, Kenneth J. Bergman, M.D., Department of Neurology, Mount Sinai School of Medicine of the City University of New York, New York, N.Y. 10029 U.S.A.

**August 1985. 13th International Congress of Biochemistry.** Amsterdam, The Netherlands.