

## Book Reviews

ALZHEIMER DISEASE. 1994. Edited by R.D. Terry, R. Katzman and K.L. Bick. Published by Raven Press. 490 pages. \$C181.00.

In the early part of the 20th century, there was intense interest in categorizing the condition of "feble-mindedness". Terms such as presenile dementia, senile dementia and dementia praecox were popular. The latter designation was coined by Emil Kraepelin for the disorder now called schizophrenia. It was Kraepelin also who in 1910, introduced the eponymic term: Alzheimer Disease.

In 1907, Alois Alzheimer provided the documentation of a 51-year-old woman with presenile dementia. He emphasized the presence of neurofibrillary tangles in the neurons of the patient's brain. In the same year, Fischer described "miliary necrosis" now termed neuritic plaques, in the brains of 12 patients with senile dementia. McMenemy stressed that Alzheimer disease should be regarded as a distinct disease – rather than a condition of premature senility of the brain. In 1966, Roth, Blessed and Tomlinson reported that intellectual deterioration correlated highly with the density of "plaques" in the brain of patients with senile dementia; indicating that senile dementia also resulted from disease of the brain and was not merely an inevitable aging process.

Ten years later, Drs. Terry and Katzman and their colleagues pointed to the havoc wrecked by dementia of Alzheimer's type among older subjects. Furthermore, they were convinced that dementia associated with neuritic plaques, neurofibrillary tangles and granulovacuolar degeneration; whether occurring in presenile or senile patients constitute the same disease entity. In the intervening years, medical opinion has supported the contention of Drs. Terry and Katzman.

These authors, together with Dr. Katherine Bick are the editors of the new volume on "Alzheimer Disease". This is a multi-authored book which examines all the major aspects of the disease. Although the focus of the text is on Alzheimer disease; two chapters in the book provide an excellent overview of the non-Alzheimer's dementia.

The first chapter provides a glimpse of the life and career of Alois Alzheimer, describing the medical climate under which the disease that bears his name was recognized and labelled as a distinct entity. Subsequent chapters discuss the clinical phenomenology, epidemiology, pathological characteristics, neuroimaging features, biochemical findings and strategies of management of Alzheimer disease. All the chapters are co-authored by renowned experts who are very active in the clinical and experimental investigations of the disease. The major advances relating to the pathogenesis and molecular genetics of the disease, including the amyloid precursor protein gene and the apolipoprotein E gene are given a systematic and up-to-date review.

This book is an important source of information for neurologists and neuroscientists who are interested in the subject of Alzheimer Disease. Even for the price of \$C181.00; busy general neurologists and other clinicians who provide medical care for the older adult patient, will find the text to be a very valuable reference. Through this book, Drs. Terry, Katzman and Bick have performed a great service to the medical community.

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THE BRAIN: A NEUROSCIENCE PRIMER. 2nd Edition. 1993. Edited by Richard F. Thompson. Published by W.H. Freeman and Company Publishers. 475 pages.

This book is an engrossing and well-thought out introduction to the basics of neuroscience. It leans heavily on neurophysiology and neuropharmacology but certainly touches on many other areas. It is much simpler and less comprehensive than say, Kandel, Schwartz and Jessell's *Principles of Neural Science* and therein lies its attractiveness to students. It is written in an exceptionally readable and straightforward style which makes it an actual pleasure to read. It has the advantage of a single-authored text in that it demonstrates a uniformity of style and cohesiveness. The names of the pioneers of neuroscience and summaries of classical experiments are cited frequently throughout the text. Often, developments are presented as an unfolding story which makes for interesting reading. Each chapter ends with a summary of the concepts treated and a list of selected readings which include a number of recent as well as classic references. The chapters are organized in a logical fashion beginning with a brief tour of the brain and neuronal histology and then proceeding to concepts of membrane potentials, synaptic transmission, chemical circuits in the brain, hypothalamus and autonomic nervous system, sensory and motor processes, development and ageing and, finally, higher brain functions. Neurological diseases and pathological states are only given passing treatment. The book is attractively produced with numerous helpful line diagrams and half-tones. Some editing errors were noted.

This is an excellent text for a premedical course in neuroscience or neuropsychology. It is in fact directed mainly toward an undergraduate college audience. It would, however, have some usefulness for neurology residents or medical students who are looking for an excellent readable overview of normal nervous system function.

*Alan Guberman  
Ottawa, Ontario*

A GUIDE TO UNDERSTANDING AND LIVING WITH EPILEPSY. 1994. Edited by Orrin Devinsky. Published by F.A. Davis Company. 347 pages. \$C21.00.

In *A Guide to Understanding and Living with Epilepsy*, Dr. Devinsky has helped us better understand epilepsy in a generally straight forward and easy to understand format. We found that with the separate chapters for different subjects, we could move to areas that were the most interesting to us. The tables of content, glossary and definitions are very helpful for quick reference.

We felt fairly well informed about epilepsy prior to reading this book, which made some chapters on the brain and the diagnosis of epilepsy a little tedious to read. However, we found it contained a broad base of useful, up-to-date and commonsense information on all aspects of epilepsy. The book does not frighten you, gets rid of many misconceptions and can be positively used for self help.

We have read other books on epilepsy but found this book covered a wide range of subject matter. Dr. Devinsky clarifies the different types of seizures, medications and their interactions with prescription drugs and each other. He also explains the way it affects a person's day-to-day living and the help that can be found through different programs and treatment centres.

There was excellent information on employment, legal and financial issues, and insurance and benefits for people with epilepsy. However, these sections would have been more beneficial to us had there also been some Canadian information.

There is also a large section dealing with epilepsy in children that should help parents let their child lead a fuller life without being overprotective.

Dr. Devinsky has given both people with epilepsy and their families an excellent guide to refer to, especially when epilepsy is first diagnosed. It also gives them abundant information to help them lead an independent and productive life.

*Greg and Karen Pollock  
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**FACTS AND RESEARCH IN GERONTOLOGY.** Volume 7. 1993. Edited by B. Vellas, J.L. Albarede and P.J. Garry. Published by Springer Publishing Company (New York). 333 pages. \$C58.00.

Unfortunately I must make a strong recommendation not to buy this book. According to the publishers, this book claims to be an authoritative, international reference volume which covers a wide variety of important topics. If this is its true purpose, I believe it fails.

A foreword is not written by the editors. As such, we can only speculate as to the proposed target audience and objectives of the book. As there are 132 listed contributors, it is clearly critical that the editors have a very clear conception of the plan for the book which would then be implemented in a vigorous manner. There is no evidence that either of these two conditions were adhered to. The production values of the book are dreadful. Some chapters which were translated are virtually uninterpretable in English. There are copious typographical errors throughout the book which detract from its readability. Even when translated chapters are readable, they clearly suffer from the lack of a careful review. For example, Dr. Schroll in his chapter titled "Geriatric Research and its Perspectives" tries to marshal support for a concept he calls "Offensive Geriatrics". Reading the chapter makes it quite clear what he is talking about but the term itself does not convey the meaning he wishes.

The book is divided into six sections. Each section has a number of chapters which are either a review, an abstract, or of original research. How authors and topics are selected is unknown. Within certain sections, a good deal of repetition exists – for example in the second section titled "Facts and Research on Cardiovascular Function in the Elderly".

Some of the chapters were, I felt, good reviews. I enjoyed the chapter titled "Functional Status Assessment of Older Persons" in particular. Notwithstanding these breaks in the sky, I found the volume confused and a severe disappointment.

*David B. Hogan  
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**BIOLOGICAL BASES OF BRAIN FUNCTION AND DISEASE.** 1993. Edited by A. Frazer, P.B. Moninoff and A. Winokur. Published by Raven Press. 479 pages. \$C51.00.

The intention of this volume is "to encourage insight into the crucial interplay between intensive laboratory investigation and the application of new discoveries to the treatment of neuropsychiatric disease". This book is edited and written mainly by psychiatrists and neuropsychopharmacologists for a psychiatrically-oriented audience. The 23 chapter titles reflect this slant with an emphasis on synaptic transmission, psychopharmacology and psychiatric disorders. There are chapters covering topics as diverse as molecular genetic techniques, neuroendocrinology, sleep and biological

rhythms, learning and memory, brain-behaviour relationships, obesity and substance abuse. The breadth of the book is quite remarkable but subjects seem to have been carefully selected and are organized into logical sections.

The book is visually appealing with a number of helpful figures and tables. Each chapter begins with a brief outline and list of key concepts. The references are not abundant but well chosen and represent an appropriate mix of current and classic titles. This book amply fulfills its purpose of offering a concise and current survey of major issues and research directions in biological psychiatry. The editors are to be commended for providing a very useful and readable text covering areas in basic neuropsychobiology which are rapidly expanding.

This book provides excellent up-to-date background reading for biological psychiatry, neuropsychiatry and to a lesser degree behavioural neurology. It will even have some appeal, especially for the excellent chapters on neurotransmitters and epilepsy, for neurologists and neurology trainees.

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**THE NEUROBEHAVIOURAL TREATMENT OF EPILEPSY.** 1993. Edited by David I. Mostofsky and Yngve Loyning. Published by Lawrence Erlbaum Associates, Inc. Publishers. 350 pages. \$C52.00.

As someone who regularly treats epilepsy, I am familiar with the behavioural, emotional and cognitive problems which often accompany seizures. Thus, I was interested in reading this multi-authored volume, the purpose of which is to "provide a state-of-the-art guide to methods and techniques used in the behavioural treatment of epilepsy, and to their basis in theory". An unusual feature of the book is to provide only the authors names and the institution where they work without reference to their discipline (neurology, physiology, psychology, nursing and epidemiology all appear to be represented) or even their title (MD, PhD, RN, etc.). Such generic authorship should serve to draw attention to what is written rather than to who is doing the writing, a laudable goal. This is particularly so in this book, wherein the 13 chapters range from the superb to the bizarre. As expected, behavioural modification, psychotherapy and biofeedback as treatments of epilepsy are addressed to varying degrees. Chapter 13 succinctly titled "Methodology" by Sechrest and Maller, is a must read for anyone engaged in clinical research. The description of the principles and problems of clinical research methodology is worth the price of the book. Dodrill and Batzel provide a reasoned assessment of psychosocial function in epilepsy as measured by the Washington Psychosocial Inventory (WPSI). A chapter on "Catamenial Epilepsy" by Schechter gives a very good review of the clinical, endocrinological and physiological aspects of this disorder, but I am not sure what it is doing in a text on the neurobehavioural treatment of epilepsy. Maybe the author was a friend of the editor. On the other end of the spectrum, there are chapters describing dietary manipulation of lipids to enhance learning, the control of seizures by "self-regulation of alveolar PCO<sub>2</sub>" and the treatment of epilepsy by exposure to magnetic fields! One tries to keep an open mind but some of these topics would at best be categorized as fringe medicine and serve only to detract from the more legitimate aspects of the volume. Because it reflects the range of activities in the field, this is an honest attempt to address an aspect of epilepsy management which has been relatively neglected by