

selected multiple authors from different disciplines, many of whom are internationally respected specialists. Each chapter covers a specific infection and addresses clinical manifestations, diagnosis, pathophysiology, and treatment. The areas dealt with in the text include infections encountered in both first world and developing countries. Several chapters deal with topics not usually covered in textbooks of neurological infections including facial palsy, Guillain-Barre syndrome, the utility of specific diagnostic tools including PCR, neurological complications of chemotherapy for infections, and acute management of neurological infections.

Most of the chapters are clearly written and well referenced, providing the reader with current reviews of rapidly evolving areas. For example, the chapters on bacterial meningitis, Lyme Disease, HTLV-1, fungal infections, AIDS-related infections, and CSF shunt infections give the reader a systematic approach to each topic. Each chapter varies widely in the extent to which pathophysiology is discussed. Herein lies the major shortcoming of the text; there is tremendous variability between chapters. Several chapters are lacking in sufficient references or overlook important references; notably, the chapters on subdural emphyema, epidural abscess, and viral encephalitis are surprisingly brief. In contrast, the chapter on rabies provides a lengthy review of the subject with a exhaustive bibliography but misses some important references. Another striking gap is in the chapter on spongiform encephalopathies. Although there is some description of the colorful characters in this tempestuous field and a very clear explanation of the pathogenesis of prion protein-related disorders, the new variant of Creutzfeldt-Jakob receives scant attention. Despite the breadth and relative flux of the entire subject of CNS infections, all of the authors have attempted to critically assess the literature, pertaining to treatment.

I am pleased to recommend this book. The clinical focus of this text makes it an indepth and useful reference to neurologists, neurosurgeons, infectious disease, and intensive care specialists. Not only will the clinical descriptions be helpful to trainees but it will keep practioners abreast of the new developments in diagnostic tools and treatments of CNS infections.

*Christopher Power  
Winnipeg, Manitoba*

**PERSPECTIVES OF MOTOR BEHAVIOR AND ITS NEURAL BASIS.** 1997. Edited by M.-C. Hepp-Reymond and G. Marini. Published by Karger. 138 pages. \$C107.00

This book arose from a symposium held at the University of Fribourg in Switzerland in late 1994, in honor of Mario Wiesendanger's anticipated retirement as Chair of Physiology and Director of the Institute of Neurophysiology in Fribourg. Mario Wiesendanger made tremendous contributions to motor physiology with studies in both humans and primates; it is therefore quite fitting to have this book dedicated to him on the occasion of his retirement.

The book consists of 10 chapters from authors in Switzerland, France and Italy. The first chapter by Hepp-Reymond gives an elegant historical account of the investigations of the pyramidal tract, with emphasis on Wiesendanger's research and his views. This is followed by two chapters on grasping. Jeannerod discusses the contributions of anticipatory mechanisms and reflex adjustments to grasping in humans. The chapter by Rouiller and colleagues describes how the inactivation of the simian motor cortex by lidocaine injection affects the precision grip, while inactivation of the supplementary motor area (SMA) does not. They suggest that preci-

sion grip movements are overtrained, and suggest that the SMA may be more involved in learning or the execution of more complex movements. The chapter by Massion discusses the central mechanisms for control of balance during movement. Pedotti describes a system for analysis of movements in 3D, and Dietz discusses his work on locomotor training using a treadmill in paraplegic patients. Marini eloquently describes the physiology of normal motor phenomena of sleep, including changes in cortical excitability during NREM and REM sleep, and atonia of REM sleep. However, the section on motor disorders during sleep is disappointing, since there was little discussion on the pathophysiology of these disorders. Buser and colleagues provide interesting data on subdural recordings of slow cortical potentials preceding movements. Of particular interest is the contingent negative variation (CNV), a slow scalp negative potential occurring between a warning signal and a go signal in a reaction time paradigm, which is thought to represent motor preparation. While scalp recorded CNV show wide distribution, subdural recordings show that it arises from the contralateral primary motor cortex, contralateral premotor cortex and bilateral SMA. Hess and his co-authors give an useful account of the use of transcranial magnetic stimulation (TMS) in the study of motor system. However, in their discussion of the site of stimulation of TMS they fail to mention the work of Edgley which showed that TMS can activate corticospinal neurons directly, in addition to activating them via interneurons. They ascribe inhibition of motor response as a result of prior stimulation of the contralateral hemisphere to transcallosal inhibition without providing any evidence. I find the last chapter by Mario Wiesendanger most interesting. He discusses the evolution of motor control research from the traditions of physiology, neurology and psychology to the present day integration of three disciplines. Not only does he give an interesting historical account, he also illustrates how many of these findings are still highly relevant to motor control research today.

Overall, the book is well written and provides useful information for anyone interested in motor control. There are however a number of shortcomings. It is neither comprehensive nor authoritative. There is no central theme, but rather a collection of the topics that reflect the author's research interest. Although published in 1997, it appears that most of the chapters are written in 1994 or 1995. The high price for this small book makes it more appropriate for purchase by libraries rather than individuals. Nevertheless, it is a useful reference for neuroscientists and clinicians interested in motor control.

*Robert Chen  
Bethesda, Maryland*

**DRUG-INDUCED NEUROLOGICAL DISORDERS.** 1996. By K.K. Jain. Published by Hogrefe & Huber Publishers. 389 pages. \$C127.00

In an environment of increasing polypharmacy, drug toxicity must be considered in virtually every differential diagnosis. Physicians rapidly come to realize that the CPS (or PDR, for our US colleagues) is neither complete nor reliable, in addition to be lacking in specific references. In the CPS, peripheral neuropathy or at least "numbness" are listed under virtually every medication. Further, this is largely fossilized data reflecting clinical trial adverse drug reactions, which may not capture some rare but significant toxic disorders; these only become apparent when the medications are more widely used in the clinical setting.