

## Book report

# Neurologic Complications of Critical Illness

Cherylee WJ Chang

Medical Director, Neuroscience Institute/Neurocritical Care, Director, Stroke Center, The Queen's Medical Center, and Associate Clinical Professor of Medicine and Surgery, University of Hawaii John A Burns School of Medicine, Honolulu, Hawaii

Correspondence: Cherylee W. J. Chang, [cchang@queens.org](mailto:cchang@queens.org)

Published online: 5 September 2003

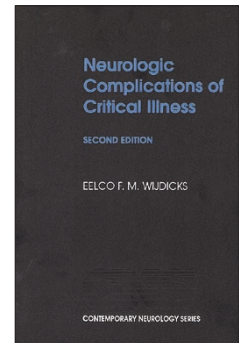
*Critical Care* 2004, **8**:67-68 (DOI 10.1186/cc2354)

This article is online at <http://ccforum.com/content/8/1/67>

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**Keywords:** complications, critical care, intensive care, neurological disorders, neurologic manifestations

Eelco FM Widjicks. *Neurologic Complications of Critical Illness*, 2nd ed. Contemporary Neurology Series. Oxford: Oxford University Press; 2002. 415pp. ISBN 0-19-514079-6



This book is appropriate for neurologists, surgeons, internists, anesthesiologists, intensivists, and nurses who manage or provide consultations for critically ill patients. It is a comprehensive and detailed reference of neurologic complications, and is helpful, well organized, and indexed. Pathophysiologic mechanisms are typeset differently throughout the text, which also makes for rapid reference.

The book is arranged in two different ways, first into chapters of neurologic symptoms such as altered mental status, seizures or weakness. Later it is organized into a list of neurologic complications found in specific disease processes (e.g. vasculitis, acid-base derangements, acute renal or hepatic failure) and complications of pregnancy and following environmental injuries and procedures (e.g. aortic or cardiac surgery or organ transplantation).

The strength of this book is its comprehensive nature and extensive referencing, which is more than one might expect from a single author. One is hard pressed to find a neurologic entity in the intensive care unit (ICU) that is not covered. Each chapter is very thorough, but one of the strongest chapters in the book is that devoted to complications following organ transplantation.

The weakness of this book is the same as that for any textbook and relates to the publishing process itself, whereby information presented in a book rapidly becomes outdated. For example, the potential of hypothermia as a neuroprotectant is alluded to, but more recent data reported in 2002 provide evidence that the use of hypothermia may improve outcomes [1,2]. In addition, not included in the book

is recent information showing that tight glucose control in the ICU decreases the incidence of critical care polyneuropathy [3]. Practical management tips could be more clearly stated. This is a pitfall in writing a text that focuses on recognition and a description of complications rather than one that also encompasses management. The weakest chapter is that devoted to multisystem trauma. For example, in patients with head injury, it cannot be overstated that hypertension and/or increasing agitation may be indicators of increasing intracranial pressure, which should be addressed before the symptoms or signs themselves are treated with antihypertensive medication or sedation. Other topics that deserve greater attention include the following: coagulopathy and disseminated intravascular coagulopathy following head trauma, and attendant risk for enlarging hemorrhage and need for surgery; differences in types of intracranial monitors and their different associated risks for hemorrhage or infection; and the pitfalls of pentobarbital infusion such as hypotension, hypothermia and ileus. It is reasonable to expect a practitioner to have a good working knowledge of this medication because it can not only increase the patient's risk for sepsis but also mimic sepsis via its effects on the heart, vessels, and hypothalamus.

The subject matter is clear from the title of the book. Its strength is its ability to serve as a reference book for any neurologic complication that may be found in an ICU. It should not be mistaken for a text that will introduce a resident or fellow to the rudiments and basics, or controversies, of neurocritical care. For those looking for the basic principles of cerebral perfusion pressure, the management of intracranial hypertension, or the diagnosis and management

of principal neurologic or neurosurgical disease processes found in a neuroscience ICU, appropriate information is presented by the same author in a different book entitled *Clinical Practice of Critical Care Neurology* [4] and its successor [5].

For those who read Dr Wijdicks' earlier book *Neurology of Critical Illness* [6] published in 1995, this second edition with its more accurate title is updated and refined. The figures and tables are illustrative and serve as superb teaching points. Overall, it is an informative and excellent supplemental text, and is worthwhile reading.

### Competing interests

None declared.

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