

■ REVIEWS OF EDUCATIONAL MATERIAL

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Journal of Neurosurgical Anesthesiology. Edited by James E. Cottrell and John Hartung. Philadelphia, Lippincott-Raven Publishers, 1997. Pages: 384 per yr. Price: Subscription rates available from publisher.

The *Journal of Neurosurgical Anesthesiology* is the official journal of the Society of Neurosurgical Anesthesia and Critical Care (and counterpart societies in Great Britain, Ireland, France, and Germany). The first volume of the Journal was published in 1989. At that time many anesthesia subspecialty journals were either new or in the developing stages. The Journal, now in its tenth year, is one of the few that have survived.

The Journal is published quarterly. The format of the Journal is typical for clinically oriented scientific journals. The contents include general articles, case reports, laboratory reports, book reviews, and correspondence. Two aspects of the Journal that I have found useful are the sections titled *Points of View* and *Journal Club*. In the *Points of View* section there usually is a pro and con discussion of current topics and controversies in neuroanesthesia. In the *Journal Club* section there are annotated reviews of articles related to neuroanesthesia, which have been published in a worldwide source of journals.

For years I have been impressed with the general quality of the articles that have appeared in the Journal. I believe that the Journal provides an important publication outlet for many talented neuroscience researchers. Whether the number of subscribers will continue to make publication of the Journal economically viable is to be seen.

Editors James E. Cottrell and John Hartung recently wrote about the impact of the Journal.¹ They point out that the Journal was accepted by *Index Medicus* after 5 years and was ranked fourth among anesthesiology journals according to the 1995 edition of *Journal of Citation Reports*. Additionally, they note, the Journal has had the honor of having the highest impact factor* among subspecialty journals in anesthesiology. From all indications, the Journal has been a success.

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Reference

1. Cottrell JE, Hartung J: Editors note: Impact, transitions and pages. *J Neurosurg Anesthesiol* 1997; 9(1):1

*Impact factors computed annually by *Science Citation Index* are the average number of times that articles published in two consecutive years are cited during the following year. For example, a 1996 Impact Factor (computed and published in 1997) of 2 indicates that articles published in a journal during 1994 and 1995 were cited in indexed journals, on average, twice during 1996.

Fatal Extraction. By Mark Carl Rom. San Francisco, Jossey-Bass Inc., 1997. Pages: 226. Price: \$23.00.

In July 1990, the Centers for Disease Control and Prevention (CDC) announced that evidence from a recent investigation was consistent with the first case of human immunodeficiency virus (HIV) transmission from a health care worker to a patient. When Kimberly Bergalis, a college student, was diagnosed as HIV-positive, repeated questioning by public health officials identified no behavioral risk factors for the infection. The review of her medical history revealed that in 1987 she had two wisdom teeth extracted by her dentist, Dr. David Acer, who had previously been diagnosed with AIDS. Subsequently epidemiologic investigation of five other HIV-positive patients indicated that they had undergone dental procedures performed by Dr. Acer. Sequencing of viral DNA from Dr. Acer's patients demonstrated that the virus infecting these patients was most likely the same as that found in a blood sample taken from Dr. Acer and was different from other strains isolated from randomly selected, HIV-infected people in the community. Therefore officials from the CDC concluded that the most likely source of Kimberly Bergalis's infection was from Dr. Acer, although the exact mechanism for the transmission was unknown. Although this was the only cluster of health care worker-to-patient transmissions of HIV in the United States, the report concerning Kimberly Bergalis and Dr. Acer immediately set off public debate on the effectiveness of existing safeguards of the public's health, whether it was appropriate for HIV-positive health care workers to practice, and the public's right to know the HIV status of their physicians. Opinion polls showed strong public sentiment toward implementation of measures believed to protect patients from HIV-positive health care workers. Congressional representatives began to get involved as their constituents demanded federal measures to ensure their safety.

Mark Carl Rom, currently assistant professor of government and public policy at Georgetown University and Robert Wood Johnson Scholar in health policy research at the University of California, Berkeley, served as the principal General Accounting Office investigator of the CDC's investigation of the HIV transmissions. In this capacity, he was charged by the US Congress to review the CDC's investigation. He therefore had access to CDC documents that chronicled the events and information substantiating the conclusion that the most likely explanation for the infections was exposure to Dr. Acer's blood at the time of the dental extractions. In *Fatal Extraction*, Mark Rom has put together a detailed analysis of the data, shows the difficulties facing CDC officials in reaching their conclusion about the source of Kimberly Bergalis's infection, and describes the complexities of formulating recommendations for preventing further health care personnel-to-patient transmissions.

Once the CDC announced that HIV had likely been transmitted from an infected health care worker to a patient, multiple public health policy issues resulted. Was there significant risk for disease transmission when patients are cared for by HIV-positive health care workers? How great was the risk, and could its magnitude be correctly assessed when there had only been one cluster of infections? If HIV-positive personnel continued to practice, should their practice be limited, and who should decide what procedures could be performed? If there are restrictions placed on HIV-infected health care

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workers, must all personnel be tested for HIV, and is it necessary for them to inform patients of their HIV status because this would jeopardize the future of their practice? Do patients known to be HIV-positive have to disclose their HIV status to their physicians? These were some of the difficult topics debated by CDC officials in trying to formulate new recommendations to prevent HIV transmission to patients. Any new practice recommendations had to protect patients from infection but also had to protect the rights of health care personnel. In July 1991, the CDC published their recommendations for preventing HIV transmission to patients.

Although there was input from expert consultants, from concerned citizens, and from organizations representing health care workers, the CDC recommendations were controversial and not readily accepted. Because the CDC was established as a federal agency for monitoring the health of the US population, it was granted no regulatory or enforcement powers, and therefore, it is only able to make recommendations, which may not be accepted by the medical community and not implemented. This was the case with the HIV recommendations because they did not completely satisfy the public or organizations representing health care workers. As a result, the issues have been taken to the legislative and judicial branches of the federal and state governments in an attempt to clarify the situation. Rom crystalizes the salient points in each side's argument and concludes his book with his personal recommendation for what should have been done to resolve the controversies.

The book clearly presents information about the Bergalis investigation as it unfolded for officials at the CDC and the difficulties that they had in dealing with the implications of this case. It is well written with extensive references to primary data sources. The book is worthwhile reading for anyone interested in the epidemiology of HIV transmission in the health care setting, the details of the CDC's role in this area of health policy, or the challenges associated with making public health decisions regarding HIV. The HIV epidemic has had a profound effect on many aspects of life in the United States and has been a stimulus for examination of public health policy. This book chronicles the debate and reminds us of the enormous challenge of protecting the health and rights of patients and health care personnel.

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Drugs in Anaesthesia and Intensive Care, Second Edition. By Martin Sasada and Susan Smith. New York, Oxford University Press, 1997. Pages: 402. Price: \$34.95

Many anesthesiologists choose to carry a small pocket manual of the drugs most often encountered in clinical practice. For these physicians looking to replace their outdated or tattered "peripheral brain," a good choice will be the new edition of *Drugs in Anaesthesia and Intensive Care*. The updated version of this manual is well designed for the clinical environment: it is softbound with a splash-resistant plastic cover and easily fits into a labcoat or scrub suit pocket. Inside, the reader will find a description of 180 drugs, listed in alphabetical order, and all tersely

summarized in a consistent format. After the generic drug name, a one- to three-page discussion highlights (1) clinical uses, (2) chemical classification, (3) commercially available preparation, (4) fundamental clinical, cellular, and molecular pharmacologic actions, (5) routes of administration and dosages, (6) pharmacodynamic effects on major organ systems, (7) toxicity and side effects, (8) pharmacokinetics, and (9) special points. This last section, *Special Points*, might better be termed *Clinical Pearls*, because it is in these closing remarks that the clinical anesthesiologist, who is largely familiar with most of these drugs, will be reminded of the key issues to guide safe practice.

Having this book in my possession for several months before the editorial office expected my review, I took the opportunity to pass the manual around to several colleagues for their input. Four staff anesthesiologists, one fellow, and one resident carried the book for 1 week while working in the intensive care unit. Although their comments confirmed several of my biases, they had a few additional insightful observations.

The two trainees found this book more helpful than the attending staff. This did not surprise me because Sasada and Smith intended this work to help the anesthesia resident (registrar) prepare for written and oral examinations. Although one would not read straight through this book as a study guide, using it regularly during a training period would likely reinforce the essentials of drug usage and inculcate "an ordered scheme for the presentation of information." The authors believe this approach to be valuable when preparing for the qualifying examinations; I would agree.

The alphabetical listing of drugs gives the book a simple and logical organization, but this approach makes it harder to search for alternative drugs within the same class or clinical application. The two indexes are not of much assistance either. The *Index of Drug Derivation* provides chemical classifications, but how often does a physician look up *aryloxypropanolamine* to find *esmolol* or *pipecoloxylidide aminoamide* to locate *ropivacaine*? The task of searching and cross-referencing thus falls to the *Index of Medical Uses*. Unfortunately this index is not nearly as complete as one might hope. For example, *inotropic support* sends the reader to dobutamine and isoprenaline (isoproterenol), but fails to cite adrenaline (epinephrine), aminophylline, dopamine, dopexamine, digoxin, enoximone, ephedrine, glucagon, metaraminol, or noradrenaline (norepinephrine)—even though all of these drugs are listed alphabetically in the manual. One final comment on drug searching needs mentioning. Although the trainee or even the practicing clinician will be served best by using generic names in all written and oral communication, the reality of clinical practice requires familiarity with trade names of pharmaceuticals. This is my opportunity to ask that the authors include these in their next edition, so that readers on both sides of the Atlantic Ocean can find what they need in this handy volume, whether they look up *Xylocaine*, *lidocaine*, or *lignocaine*. By incorporating these changes, which will facilitate the reader's search for a specific and appropriate therapeutic agent, *Drugs in Anaesthesia and Intensive Care* would be an even better choice for anesthesiologists and intensivists looking for a useful and affordable pocket manual.

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