care community be aware of changes, particularly from the perspective of bench use. As we move into the 21st century, common pathogens spread and new methods and regulatory requirements potentially affect diagnostic testing. International travel and world events compel the local medical community to broaden its scope beyond its comfort zone, with regard to the broad range of parasitic organisms.

This book is successfully organized into 8 sections that present the diagnosis of pathological parasites in a context that promotes the best patient care and clinical outcome. The text has 464 pages of information, tables, charts, algorithms, and photographs that greatly expand upon the first edition. New aspects of the field have been addressed in new sections, and many figures and plates have been added. Section 1 expounds upon the philosophy and approach to diagnostic parasitology, including the implications of global warming, population movements, potential outbreak testing, the development of laboratory test menus, and risk management issues related to urgent and expedited testing (collection, processing, testing, reporting of thick and thin blood films, and the examination of cerebrospinal fluid and other specimens for free-living amoebae). Section 2 is arranged by parasite classification and corresponding body sites. Organism classification and relevant tables are very helpful in providing the user with current information about changes in nomenclature and the overall importance of the various parasite categories to human infection. Table 2.2 has the unusual title of "Cosmopolitan distribution of common parasitic infections." Section 3, "Collection options," has detailed information on stool specimen fixatives and testing options. This information applies to newer fecal immunoassays; the author suggests that clinicians should always check the literature from the relevant company for the United States Food and Drug Administration status of a new product. There is a thorough discussion on blood collection, including the pros and cons of current changes from finger stick blood to venipuncture; tables help to summarize potential problems with blood parasite morphology and lag time issues.

There are a number of algorithms in Section 4, "Specimen test options: routine diagnostic methods and body sites," and Section 5, "Specific test procedures and algorithms." These algorithms, specific sets of instructions for carrying out a diagnostic procedure, are useful. Algorithm 5.6 is titled "Ordering algorithm for laboratory examination of intestinal parasites," and it has a detailed notes section to assist readers for whom the flow chart does not provide enough detail. In Section 6, "Commonly asked questions about diagnostic parasitology," the author successfully captures questions regarding methods. For instance, there are 10 questions on the use of permanent stains, including "What recent changes have influenced the overall quality of the permanent stained smear?" Useful and up-to-date information is also included, such as where to obtain serologies for a Baylisascaris procyonis infection, found in the Helminths subcategory of questions.

Section 7, "Parasite identification," is comprehensive, and information on each organism has been formatted on facing pages for easy access and reference. Perhaps color plates could have facilitated identification of some organisms, but this would have raised the cost of the text significantly. Each of the organisms has a flow chart of its life cycle. All organisms have black-and-white plates and many have drawings, which are helpful with clinical images not commonly seen in other diagnostic texts. Section 8, "Identification aids," has numerous tables and plates, including Table 8.34 titled "Key characteristics of intestinal tract and urogenital system protozoa"; these organisms are each identified as pathogenic or nonpathogenic.

Because there have been many changes in clinical laboratories within the past few years and because these authors have both teaching and diagnostic bench experience, this text will prove valuable to the user. An analysis of trends indicates that the laboratory of the future will be both educational and consultative, especially if the services are within the microbiology area.

There are few negatives about this practical book. With changes in collection, testing, reporting, and interpretation options, this book needs to be readily available to the client base of any given laboratory, especially if test orders and results are to be used for optimal patient outcomes. Laboratories are increasingly reviewing specimen collection options, particularly with regard to their geographic area and the types of patients served. Given that parasitic infections play a pivotal role in the overall health and economy of the world, this book is an important addition to the resources available to clinicians and laboratory workers.

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## A Decade of HAART: The Development and Global Impact of Highly Active Antiretroviral Therapy

Edited by José M. Zuninga, Alan Whiteside, Amin Ghaziani, and John G. Bartlett

New York: Oxford University Press, 2008. 464 pp \$130 (hardcover).

A Decade of HAART: The Development and Global Impact of Highly Active Antiretroviral Therapy builds on a conference with a similar title that the International Association of Physicians in AIDS Care organized in 2006. The objective of the book is to "memorialize what has become one of the most dramatic successes of medical care in the past 50 years." The editors comprise a clinician, a sociologist, an economist, and a public health specialist, and the list of authors is truly impressive: 74 authors from 20 countries contributed

to the 29 chapters. The book is organized in 3 sections. The first part gives a historical overview from the discovery of human immunodeficiency virus (HIV) to recent developments in therapy for both high-income and low-income countries. The second part describes the epidemiology of HIV infection and the introduction of highly active antiretroviral therapy (HAART) in selected countries, as well as the design and findings from 8 HIV cohort studies. The third part discusses the challenges in the next decade of HAART, including the gap in HIV care and access to HAART between high-income and lowincome countries.

The foreword by Luc Montagnier and Robert Gallo is one highlight: it gives a lively and concise account from the discovery of HIV to the introduction of HAART and its failure to eradicate HIV. Montagnier and Gallo argue that the profound immunodeficiency associated with HIV infection and the incomplete immune recovery achieved by HAART explain why the virus persists. They end on an optimistic note: in future decades, additional treatments aimed at boosting the immune response might achieve longterm suppression without HAART. Despite some overlap, the first and the last sections of the book include many excellent chapters, which are well referenced. The chapter by Roger Paredes, Renslow Sherer, and Bonaventura Clotet titled "The clinical challenges of lifetime HAART" is particularly comprehensive, citing 322 references. Zuniga and Ghaziani, in their chapter on "A world ravaged by a disease without HAART," give a gripping account of the early years, the "Dark Ages" of HIV/ AIDS treatment, and the response of civil society and the health professions. In their chapter titled "Redefining HIV/AIDS care delivery in the face of human resource scarcity," Mario Roberto Dal Poz, Norbert Dreesch, and Dingie van Rensburg argue for a paradigm shift in allocating care and human resources: all other health programs will suffer if no integrated solution is found. One noteworthy omission is a chapter that addresses treatment as prevention and more generally that addresses the place of HAART and HAART programs in preventing the spread of HIV.

The middle section, which fills 20 of the 29 chapters, is the weakest part of this book. One wonders here whether less might have been more: this is a convenience sample of country profiles and descriptions of cohort studies, with little evidence of editorial and conceptual guidance. The chapters are heterogeneous in their approach, and some are fairly superficial. Some are more interesting than others; for example, the account from China provides a wealth of information on the scale-up (or lack thereof) of the National Free Antiretroviral Treatment Program. Zhang Fu-Jie, Ray Y. Chen, Selina N. Lo, and Ma Ye report that only 20% of the estimated 650,000 people with HIV living in China in 2006 had been identified, and of those identified, ~20% had started HAART. This number has now almost doubled, according to a recent journal article by some of the same authors [1]. Surprisingly, the median CD4 cell count at the start of HAART decreased from 159 cells/ $\mu$ L to 118 cells/ $\mu$ L. We observed opposite trends during scale-up of HAART in sub-Saharan Africa [2].

In summary, this book provides a fascinating and accessible account of the first decade of HAART and of 25 years of HIV infection that will be of interest to many. Much remains to be done, however, before the final account of this intriguing story can be written.

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## **New Books Received**

- Cromarte RS III, Duma RJ. High-tech terror. Springfield, IL: Charles C Thomas Publisher, 2009. 198 pp. \$49.95 (hardcover). ISBN: 978-0-398-07884-3.
- 2. Espinosa M. Epidemic invasions. Chicago: University of Chicago Press, 2009. 200 pp. \$22.50 (softcover). ISBN: 978-0-226-21812-0.
- Ghannoum MA, Perfect JR. Antifungal therapy. New York: Informa Healthcare, 2010. 470 pp. \$229.95 (hardcover). ISBN: 978-084938787-6.
- 4. Hamlin C. Cholera: the biography. New York: Oxford University Press, 2009. 344 pp. \$24.95 (hardcover). ISBN: 978-0-19-954624-4.
- Loeb M, Smaill F, Smieja M. Evidencebased infectious diseases. 2nd ed. Oxford, UK: Wiley-Blackwell, 2009. 324 pp. \$80 (softcover). ISBN: 9781 405170260
- Spellberg B. Rising plague. Amherst, NY: Prometheus Books, 2009. 264 pp. \$26 (hardcover). ISBN: 978-1-59102-750-8.
- 7. Stephenson T. Swine flu H1N1: the facts. Philadelphia: Jessica Kingsley Publishers, 2009. 160 pp. \$12.95 (softcover). ISBN: 978-1-84905-821-6.
- 8. Yoshikawa TT, Norman DC. Infectious disease in the aging: a clinical handbook. 2nd ed. New York: Humana Press, 2009. 506 pp. \$189.00 (hardcover). ISBN: 978-1-60327-533-0.