BOOK REVIEWS

THALLIUM-201 MYOCARDIAL IMAGING. James L. Ritchie, Glen W. Hamilton, and Frans J. Th. Wackers, eds. New York, Raven Press, 1978, 154 pp, illustrated. $14.50.

This book represents the combined efforts of several investigators who have made major contributions to our understanding and use of thallium-201 as a radiopharmaceutical for the clinical investigation of myocardial perfusion. The purpose of the book, as stated in the preface, is to "review the current state of knowledge regarding Thallium-201 as a myocardial imaging agent, to present tested and practical techniques for using the agent, and to examine in detail the relation of the Thallium-201 image to various types of heart disease." The first two goals are fulfilled well, but the third only partially.

The text begins with a concise, well-written review of myocardial imaging, followed by a discussion of the biologic properties of thallium and the equipment and techniques required to properly perform thallium images. These areas clearly demonstrate the authors' insight into the complex problems of thallium imaging. Next presented is "the anatomy of the normal myocardial image," a segment that contains excellent anatomic sections for comparison with the thallium image. With some additional labeling of the figures, this section would have been of even greater help. The chapters on abnormal image in coronary artery disease and acute infarct imaging contain information on both the power of the technique and its limitations. This volume really hits its stride, however, in the section on rest and exercise imaging in coronary artery disease, where not only the images but also several case histories are presented. Illustrations of the coronary arteriograms and the electrocardiograms, in addition to the scans, would have been beneficial to the reader for defining the relative value of the Tl-201 scan in comparison with that of the conventional procedures; however, this is a minor criticism when one considers the value of the material offered. A discussion of the assessment of graft patency, imaging in noncoronary disease, methods of production of thallium, and specialized computer acquisition analysis and display complete the book.

My only real criticism of the book is the authors' statements regarding the interpretation of thallium data from unprocessed images, since in the text many of the figures are taken from computer-generated displays. The strengths of the publication are in the visual materials, primarily in those sections authored by Dr. Wackers, and in the textual material co-authored by Drs. Ritchie and Hamilton. Overall, it is good and should be of great benefit to practitioners who are beginning to use thallium myocardial imaging.

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NORMAL RADIOLOGIC PATTERNS AND VARIANCES OF THE HUMAN SKELETON, Rudolf Birkner. Baltimore-Munich, Urban and Schwarzenberg, 1978, 564 pp, illustrated. $74.00.

As indicated by the author, this book contains material translated from *Atlas typischer Röntgenbilder von normalen Menschen* (Grashey-Birkner) for the benefit of roentgenologists, medical students, as well as radiology technicians and is a comprehensive view of the roentgenology of the skeleton.

The volume is divided into three parts. The first part is an instructive and informative review of the fundamentals of radiation physics, picture formation, and radiation protection. The second part deals with the radiographic view of the normal adult skeleton. Variants and sources of diagnostic error are presented in outline and illustrated by radiographs within each anatomic bony region. Although the illustrations are not detailed, they automatically capture the reader's attention. The third part is an excellent presentation of the pediatric skeleton and contains radiographs of each bone and joint from infancy to adolescence.

This English publication uses Parisian nomenclature (PNA) exclusively and contains 1227 illustrations, including 803 full-size radiographs. The figures are generally of superb quality and presented with appropriate discussion. This book is well written, easy to read, contains carefully selected references, and is completely indexed. It is clinically oriented throughout and is directed toward the solution of diagnostic problems, and thus is highly recommended as a quick reference source for radiologists, orthopedic surgeons, and any physicians who customarily use the radiologic study of bony structure for diagnostic work. This book would be an asset to any medical library.

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MEDICAL EXAMINATION REVIEW BOOK, VOLUME 25; Nuclear Medicine, 1,269 Multiple Choice Questions and Reference Explanatory Answers. Nathan A. Sullivan, ed. Flushing, NY, Medical Examination Publishing Co. Inc., 1977, 247 pp.

According to the preface, the purpose of this medical examination review book is "to encourage the reader to detect areas of weakness in his understanding of (nuclear medicine) so that he may return to his texts for a more comprehensive review." To facilitate the reader's review, the authors complement the answers to their review questions with selected references. The multiple choice questions are varied in format to match the various types of questions currently used by testing agencies.

The major value of this medical examination review book lies in the basic science and the clinical in vitro procedure sections. Questions related to these areas comprise 105 of the 170 pages of test material. The basic science questions and the in vitro procedure questions are quite detailed and exhaustive, some perhaps more detailed than may be necessary for most certification tests. Nevertheless, the person who systematically works his way through these review questions will receive a very comprehensive review of basic science and in vitro test methodology.

The number of questions on clinical nuclear medicine is disporportionately low, occupying only a little more than one third of the review book. However, a much more serious deficiency than the small size of the clinical section is the out-of-date nature of the material. Brain scan questions focus on Hg-203/197 Chlormerodrin and I-131 RISA; bone imaging questions address Sr-85 and Sr-87m; and fluorine-18 with only two of 42 questions on phosphate complexes. Renal questions probe the characteristics of I-131 Hippuran and Hg-197 chlormerodrin but fail to mention Tc-99m-labeled DTPA, glucoheptonate, or dimercaptosuccinate. The heart section is most dramatically out of date—none of the currently used cardiac imaging studies (perfusion scanning with thallium, infarct scanning with the bone-seeking agents, or wall-motion studies with gated imaging) are mentioned in the text. The references reflect the vintage of the questions, the bulk of them dating from before 1972, although some textbooks and reference works published as late as 1975 are listed. Less important problems with the examination review book include the