safe-deposit buildings and became interested in attracting readers and having their materials easily accessible to all users. Librarians in the Middle East consequently became aware of the necessity of a standard cataloging code and modern library practices. Many attempts at standardization of cataloging methods were made, but nothing appeared in print except an article by Labib Zuwiyya entitled "Arabic Cataloging: a Criticism of the Present Rules" which discussed form of entry of Arabic personal authors (Library Resources and Technical Services, Winter 1957).

The publication of Dr. Sharify's book is the first complete work of this nature. Although it is limited to Iranian works, catalogers of Arabic material will find it most useful and informative.

The numerous problems involved in cataloging Middle Eastern material, especially in the vernacular, have been a source of many worries to libraries with such collections. As Dr. Sharify points out, because of the lack of rules for descriptive cataloging of Persian material, and a standard Persian transliteration scheme, there are in the United States many libraries whose Persian collections have not yet been cataloged at all. Now, with the growing interest in Near and Middle Eastern Studies on the part of universities and other institutions, libraries can no longer afford to ignore these collections.

Dr. Sharify's library experience and background have made him thoroughly knowledgeable of problems confronting catalogers of Persian material in the Middle East and in the Western world. In Iran, his home country, he was deputy director of the Library of the Parliament. In the United States he studied at the School of Library Service of Columbia University and received his Master of Science degree and his doctoral degree from that institution. He also worked with the Library of Congress cataloging Persian material.

The cataloger will find in Dr. Sharify's book a detailed and comprehensive tool. After discussing the existing systems of transliteration and their shortcomings, he recommends the system which he helped to develop when he was on the staff at the Library of Congress. That system—a table of transliteration with rules for application—

is set forth. He also treats such controversial problems as Iranian personal names (which part of the name should be used as the entry word?), giving in an appendix a list of aids to catalogers for the establishment of entries. The last two chapters are devoted to a discussion of the current cataloging practices of a few North American libraries—their sample cards and rules for descriptions. Catalogers will find many excellent pointers.—Flora R. Jones, United Nations Library.

Electronic Computers

Electronic Computers: Principles and Applications. By T. E. Ivall. New York: Philosophical Library, 1960. 263p. \$15.00.

In the relatively few years that electronic computers have been loosed upon the land they have had a revolutionary impact on many problems of information processing. Their impact upon libraries, which must be considered among the primary information handling agencies of the world, has been only slight, however. In a few instances this slight disturbance has been more of an unnerving for a short period of time as an occasional librarian has approached the problem of learning more about computers and how they might be applied to library operations. Most probably these librarians have been turned away because of unintelligible technical presentations, or all-too-intelligible reports of lack of economic justification for the use of computers in libraries. Most librarians, however, have probably ignored computers as library equipment.

Computers are finding some use in information systems, as is shown in the recently published National Science Foundation surveys on nonconventional technical information systems in current use. A glance at the array of imposing names of scientific and industrial firms wherein most of these nonconventional systems have been installed, and at the description of the contents of information handled by the system, has probably confirmed many librarians' beliefs that, after all, computers in information systems are limited to a few high-powered, nationally urgent, narrowly defined scientific and techni-

cal subject areas supported by vast amounts of research funds. Also, the lack of publicity for any use of electronic computers in other library operations (e.g. circulation procedures, which in computer terms can be defined as inventory control systems and hence within the province of computer capabilities) may lead one to believe that electronic computers are useful only in information storage and retrieval work.

There are probably some librarians, however, whose consciences may tweak them occasionally with the feeling that perhaps they are doing their library systems an injustice by not exploring more earnestly the field of computers and computer application to hitherto tradition-bound library operations. (These pangs of conscience usually come immediately after a patron, a professor, a college president, or a research director tosses off a casual "What you need here instead of a card catalog is a computer.") A glance at the title, the statement of potential readership (people about to become involved in some specialized aspect of computing either as users or as electronic designers), the photographs, and the largely nonmathematical approach of Ivall's book will undoubtedly catch the eyes of some of these librarians. Here, they might hope, will be a clear exposé which will allow them to understand computers and will open the door to a reasonable approach to the decisions involved in determining the applicability of electronic computers to library operations.

This is not the book for them though. First of all, Ivall assumes the reader will have a grounding in electronic or radio techniques. This will exclude most librarians. Secondly, the book is devoted largely to a presentation of why an electronic computer computes, and this is not the kind of information which the potential library user of computers needs. Ivall gets a start on some of the vital questions for librarians in his chapters on the applications of analogue and digital computers, but his accounts are descriptive and not analytical. It takes great ingenuity and considerable inference to carry over information from the descriptions in the book to the field of librarianship, and this is what many librarian readers may turn to books like this to avoid. What we still need in librarianship is a statement of the fundamental factors that go into the decision as to when and where to introduce a computer into an operation, and guidance in the reasoning about these fundamental factors in library terms.

What the book does, it does very well. Ivall has revised the first edition of the book, which was originally a group of chapters by various authors, to produce a more uniformly prepared text. He has added very important chapters on analogue computing circuits, digital computer programming, and recent technical developments. The presentation is built up piece by piece in a most logical fashion, moving from the general characteristics of electronic circuits to the specific relationship of circuits in a system which will compute, store, and actuate information read-out components. The book handles the nonelectronic parts of electronic computer systems well also. The book can be read rapidly, but must be read carefully. After all, computers are complicated mechanisms. The careful reader will find himself asking questions about various statements in the book only to find that these very questions are almost immediately answered in the next paragraph or the next chapter.

The author states that nontechnical people will probably be able to manage certain chapters, particularly those relating to the evolution and general principles of computing, the applications of analogue and digital computers, and the chapter on computers of the future. While they may be able to read the words in these chapters, many of the terms used or concepts referred to will be completely without meaning unless the reader knows and understands what has been said in the unread chapters. For example, in the discussion of the use of electronic computers in the translation of languages, Ivall states that the words to be translated would all have to be coded into the form of binary numbers and all the foreign-language words likely to be required stored in one set of addresses while their English equivalents are stored in another set of addresses. Coding into binary numbers and "addressing" words for storage in a computer are all quite well explained in other chapters of the book, but what visions will terms such as these conjur up on the minds of even the most knowledgable person who has not seen them dealt with in computer terms.

Even in the second chapter, "General

Principles of Computing," which Ivall claims in his introduction is written in such excellent expository style that it would be presumptuous to change it from the presentation of the first edition, there are some sophisticated technical elements. In one part of this chapter it is stated that an electron tube is initially biased beyond cut-off. The author also refers to the characteristic curve of a vacuum tube and the fact that the curve is curved and not straight. The style is expository, but the language is hardly intelligible to a person not familiar with the technical operations of a vacuum tube. In fact, this language will probably be quite puzzling to some readers. Seamstresses cut on the bias all the time, and of course, if a curve is a curve, it isn't straight!

The first edition of this book was very well received in Great Britain in 1956, and was reprinted in 1957. This second edition will undoubtedly be well received, at least by beginning students of electronic computer design. It is a superb first assignment for these people. Probably the most distressing factor to potential American readers will be the price of the American edition. In view of the British price for the first and second editions of \$3.50, and of the British Book Center's price for the first edition of \$4.25, the American publisher's price of the current edition of \$15 is outrageous. The book is good—but the information in it just isn't worth that much to anyone.-Russell Shank, University of California Library. Berkelev.

IMPORTANT!

FIGURE C. Quo. Nearly 10,000 useful words and expressions make this book an invaluable guide for all students of modern Chinese. 232 pps., 3" x 5½" \$2.00

THE NOH DRAMA: Ten Plays from the Japanese, selected and translated by the Special Japanese Classics Translation Committee, from the great cultural period of medieval Japan. 192 pps., 10 plates, 7½" x 10" \$4.75

F. M. Jonas. Out of print for some years, this book is again being issued for students, collectors, museums and admirers of the artistry of Netsuke. 314 pps., 6" x 8½", 55 plates \$5.00

DON JUAN OF CHINA: An Amour from the Chinese "Chin P'ing Mei," translated by SAM-UEL BUCK. A Ming Period Classic. 99 pps., 9" x 6", printed in two colors \$3.75

CHARLES E. TUTTLE COMPANY
Publishers

RUTLAND, VERMONT • TOKYO, JAPAN

OTTO HARRASSOWITZ

LIBRARY AGENCY WIESBADEN - GERMANY

Direct service on all German language books and periodicals

Orders and inquiries are invited on both new and out-of-print material

> Farmington Plan agent for West and East Germany

For economy, speed, and accuracy, you may rely upon your

German agent

OTTO HARRASSOWITZ