effective organization of bibliographical operations and the more adequate indexing and abstracting of scientific and technical literature. His central library would coordinate the acquisition program of the system, function as a clearing house for all phases of interlibrary cooperation and promote centralized cataloging and indexing. This appeal for the expansion of traditional library functions and the greater concern on the part of librarians with the bibliographic organization of their resources may well be considered with profit by American librarians, who have all too long been indifferent to an area in which they should be assuming the initiative.

Confronted by this chaotic state of British documentation, and urging a coordinated system of special libraries in science and technology, Mr. Bradford reaches the climax of his argument in his proposals for a plan for complete scientific documentation throughout the scholarly world. This program urges the development of an international network of existing agencies concerned with indexing and abstracting of scientific literature, each agency operating in its own clearly defined area and transferring to the others all materials relevant to their particular fields. Though it would rely solely upon voluntary cooperation for the control of its constituent parts, the failure of any one of which might seriously endanger the success of the whole, the author believes that the results of such effort would bring to the bibliographic organization of scientific literature a thoroughness of coverage and a directed effort that are now conspicuously lacking. The objective is certainly meritorious, but voluntary cooperation on an international level is at best an uncertain foundation stone upon which to rest so important an undertaking. One can hope that Mr. Bradford is right, but past experience and present realities engender skepticism.

Perhaps enough has been said to indicate that the constructive proposals of this book are less successful than the picture it presents of the present state of documentation and its criticisms of the existing situation. The chaos of documentation, especially in the field of the social sciences, in this country is even greater than that found by Mr. Bradford in his native England. If the book will serve no other purpose, at least it should focus the attention of American librarians upon the importance of the problems which it raises, the need for much greater attention to the promotion of more adequate bibliographical controls, and the desirability of effective exploration and original investigation in the field. It is to be hoped that the newly revived American Documentation Institute may eventually achieve at least some of Mr. Bradford's desired goals. Already there is considerable evidence that workers in medicine, pure science, and technology are growing increasingly concerned over the inadequacy of their bibliographical services and classification systems, and even the social scientists are beginning to think seriously about an effective abstracting medium to fill the need left by the demise of Social Science Abstracts. To such activity librarians can ill afford to be indifferent, and if Mr. Bradford's book should arouse some stirring in the library world, its results may well be the author's best memorial.-Jesse H. Shera, Graduate Library School, University of Chicago.

Literature of Mathematics and Physics

Guide to the Literature of Mathematics and Physics, Including Related Works in Engineering Science. By Nathan Grier Parke, III. New York, McGraw-Hill, 1947, 205p. \$5.00.

Here is a welcome companion piece to those subject guides which already exist in chemistry and engineering. As the first of its kind in this specific field, this book is "intended to be of most help to those who do not necessarily have a detailed knowledge of

JULY, 1949, PART I

mathematics and physics." It provides the reader—be he scientist, student or librarian —with a general orientation in the literature available and indicates landmark books as well as further sources of information.

The author has divided his presentation into two parts of somewhat varying quality. The first part is concerned chiefly with general information on methods of study and reading, the use of the library and the technique of the literature search. One cannot help but feel that such information could probably have been very well omitted, due to its availability elsewhere. Interwoven throughout this discussion, however, are references to certain basic tools and publications of particular relevance to the area of mathematics and physics. It is precisely this portion of the presentation which, though probably adequate, could have been profitably expanded in view of the previously uncharted nature of the field. The section on periodicals is notably anl lamentably brief.

The second and more valuable part of this guide consists of a bibliography of more than 2000 titles, including books and some periodical articles. The latter consist mainly of references to Reviews of Modern Physics, of which the first 17 articles are said to be indexed here. The content of the bibliography falls predominantly within the area indicated by the title of the volume, with emphasis on basic and fundamental-though by no means elementary-publications, which can serve as starting points for further reading. Related engineering and general scientific literature is well represented, though with an occasional unevenness and incompleteness due probably to limitations of space and time. The material is arranged under 150 carefully chosen and specific subject headings, most of which are described or defined briefly with an occasional indication of the kind of literature available in the specific area. Unfortunately there are only a few brief annotations of individual titles and even these are sometimes as short as three or four words. The annotations given are suprisingly helpful and meaningful despite their brevity. The usefulness of the bibliography is increased by the inclusion of a good author index, but is decreased by the lack of a sufficiently detailed index.

Reference librarians will find the bibliography of particular value as it affords a more direct and convenient approach to some of the material than does the library catalog. Some use could also be made of this volume in the building up of a basic collection in the areas covered, though prices are not given and many of the books listed are not readily available. It should always be remembered that the value of a subject guide is limited somewhat due to the rapidly changing nature of the field, and hence continuous supplementary use must be made of current periodical literature. As a guide to important material which exists today, this is a valuable and helpful work.-Robert E. Maizell, New York Public Library.

Engineering Information

Sources of Engineering Information. By Blanche H. Dalton. Berkeley and Los Angeles, University of California Press, 1948, 109p. \$4.00.

This is an excellent beginning for a muchneeded work in engineering and technology. It is a manual on the reference sources of the field; a field whose wealth of material bewilders even the experienced. It is also a pioneer work in that it is virtually the first of its kind to cover technology and engineering from the American point of view. It leaves much to be desired, but the author is to be congratulated on her enterprise and courage in undertaking this formidable project.

In the preface, the author refers briefly to two works: A. D. Robert's *Guide to Techni*cal Literature (1939) and Dr. J. Edwin Holmstrom's *Records and Research in En*- gineering and Industrial Science (1940).¹ Neither of these is competitive. The former is better organized and written but emphasizes European material. The latter is a work of description and constructive discussion written by a scientist and engineer in his own right. In content and literary merit, it will delight and fascinate both the practical technologist and engineer as well as the most erudite scholar. It is not, however, a reference manual in the sense that Mrs. Dalton's book is.

Sources of Engineering Information is a classified guide to titles accompanied usually by a one-line annotation. Unquestionably the best section in the entire work is number II on "Abstracts,"² p. 4-15. To begin with

¹ The second edition, revised and enlarged, came out in 1947. ² For a fine survey and review on this subject, see

COLLEGE AND RESEARCH LIBRARIES