portions of African, Asiatic, and American material in the Museum für Völkerkunde and the entire collection of the Gesellschaft für Anthropologie, Ethnologie, und Urgeschichte were confiscated. The Russians have revealed a special fondness for German medical literature and have confiscated those parts of the Deutsche Ärzte-Bücherei (at the Militärärztliche Akademie) which were not stored, as well as the remains of the library of the Berliner Medizinische Gesellschaft. Practically the entire library of the Institut für Geschichte der Medizin und der Naturwissenschaften was stored in eastern Germany and must be considered lost. Of all the great scientific special libraries in Berlin, only the collection of the Robert-Koch-Institut seems to have come through the war and postwar period unscathed.

The library of the Technische Hochschule in Aachen lost around 50,000 of its 108,000 volumes in a bunker fire. The lost books included runs of serials prior to 1935 and some 400 typewritten dissertations which had been presented at Aachen. Some parts of the building were severely damaged, but the book stacks are nearly intact.

The part of the building of the Technische Hochschule of Brunswick which was occupied by the library was destroyed. Fortunately, the books, but not the catalogues, had been evacuated. As of March 31, 1947, 5,300 volumes of the 120,000 which had been salvaged had been recatalogued.

The library rooms of the Technische Hochschule at Darmstadt were also burned out, and the library was removed to the basement. Parts of the library, including the catalogues, were evacuated, but nearly two-thirds of the holdings were destroyed. Fortunately, periodicals were saved for the most part, and losses consisted of material published prior to 1930 in the fields of architecture, structural engineering, mechanical and electrical engineering, history, geography, literature, law, economics, statistics, pedagogy, and dissertations. It will be interesting to observe whether the destruction of pre-1930 technological literature has seriously impeded library service, or whether this experience might not recommend a similar fate for related classes of material in other technological libraries.

The old building of the Dresden Technische Hochschule on the Bismarckplatz was completely destroyed in February 1945, but in the following summer the library was moved to a building immediately adjacent to the new building of the institution itself. In 1942 the library held about 111,000 volumes, some 30,000 of which (unhappily, largely the more recent material) were lost as the result of the *Reparationsentnahmeaktion* of the Red Army. The 40,000 volumes that remain consist largely of older material.

Thirty hours after the last book was evacuated from the Hannover Technische Hochschule in 1943, Allied aerial bombers found their mark, and the building was burned out. However, part of the book stacks can be restored, and the reading rooms are already in use again. Although some 35,000 of the 175,000 volumes were badly damaged by water when the Technische Hochschule burned for the first time in 1941, all but 231 were restored or replaced by 1943. As a result of the well-timed evacuation, the only losses have resulted from the unusual conditions under which circulation must be conducted at the evacuation points (Nörten-Hardenberg and Levershausen).

In 1942 the library of the Technische Hochschule in Karlsruhe had 191,000 volumes and a good building. The latter was completely destroyed, and only about 85,000 volumes remain. The most important sections of the library (mathematics, physics, chemistry, and technology) were not evacuated because of the heavy demand by patrons and, as a result, were destroyed along with the building.

The building of the Munich Technische Hochschule was also completely destroyed, but some 10,000 out of 210,000 volumes have been saved, and reference collections and catalogues are intact. The Deutsches Museum on the Museuminsel is still in a state of reconstruction and not yet open, but its library of some 270,000 volumes is intact.

On July 26, 1944, the library of the Stuttgart Technische Hochschule lost 50,000 of its 118,000 volumes. Losses included a large proportion of the technological reference works, but nearly all periodicals had been evacuated prior to the catastrophe. Of all the catalogues, only the shelf-list remained. The library is again open for circulation in the Schulhaus Tamm, recataloguing is being undertaken, and an active acquisition program is planned.

These notes taken from Dr. Leyh's survey represent by no means all the scientific and technological collections in German libraries. Most of the great state and university libraries, which were very rich, especially in the pure sciences, suffered almost in equal measure. German libraries as a whole have been the victims of a fate unparalleled in the history of science and learning.

LAWRENCE S. THOMPSON
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The second forty years. Edward J. Stieglitz. Philadelphia-New York: J. B. Lippincott, 1946. Pp. x + 317. (Illustrated.) $2.95.

Dr. Stieglitz has undertaken the difficult task of conveying to the layman a comprehensive picture of the present status of gerontology and geriatrics. In the major portion of the book, which is devoted to medical aspects of aging, the point of view of the old person is emphasized. This is done in a commendably lucid and informative style.

The early pages of the book are devoted to consideration of the biological aspects of aging. One can commiserate with Dr. Stieglitz in his real attempt to paint for the layman a coherent picture of the aging process. Modern science's deplorable lack of knowledge of this process makes this task well nigh impossible. The Foreword by A. J. Carlson must also have been designed for the layman, as judged by the following statement: "The fundamental biologic processes of growing old and the gradual impairments and infirmities which follow are as

inevitable as the wearing out of one's shoes by continued use.'' The living organism is not a shoe. It is a unique system which differs from shoes, motors, clocks, etc., in that it possesses the property of self-synthesis. The crux of the aging problem is to determine why this capacity for self-reconstitution gradually fails.

Dr. Stieglitz gathers momentum as he moves into the field of geriatrics. There is an excellent discussion of difference between biologic and chronologic time. Major emphasis is placed upon cardiovascular diseases which are of primary significance in the aging population.

Thorough discussion of nutrition and sex in later years is also included. The short, but very worth-while, chapter on cancer should give the lay reader a sound perspective of this serious problem.

A. I. LANSING

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Physiology of man in the desert. E. F. Adolph and associates. New York: Interscience, 1947. Pp. 357. $6.50.

This book is unusual in type and should prove useful, if its organization is understood. It attempts no complete assessment of literature dealing with the exposure of man to heat, but rather describes observations, in the field and in the laboratory, made by the writers and their associates. In most cases descriptions of field tests exceed those of laboratory experiments, and in consequence the bulk of the book is concerned with attempts to analyze relatively simple data. These data also are expressed in the direct terms of the original observations, so that their practical value and importance remain unmasked. Thus, the extra sweat loss occasioned by carrying a 50-pound pack is stated to amount to less than 0.5 pound/hour. Such a statement makes the economy of carrying water in the desert very obvious.

The various strains imposed by work, dehydration, and high temperature are additive, as is particularly indicated by effects on the circulation. The authors describe a rise of 10° F in air temperature as equivalent to an increased energy expenditure of 29 kg cal/square meter of body surface/hour and to a dehydration of 1.2% of the body weight.

There is a common belief that mild dehydration can be advantageous in athletic contests. Some objective evidence is presented which supports this contention, but, if any advantage is gained, it is certainly evanescent under desert conditions, as is well demonstrated by the data presented. The idea that troops can be acclimatized to go without water is shown, both in theory and in practice, to be entirely fallacious.

In the opinion of this reviewer the writers complicate their subject needlessly by accepting the term ''storage'' to describe gains or losses of body heat. They use this term, and define it, in the same way as did the Pierce School. Thus, loss of heat by the body, and gain by the environment, consists in positive storage, even though the more natural use would be to employ ''storage'' for gain of heat by the body. The tendency to confusion so engendered is so great that later in the book (p. 192) the term ''storage'' without any negative sign is used to imply a rise in body temperature. Near the end of the war, in order to avoid such misunderstandings, the American Committee on Clothing agreed with the corresponding Committee in Canada to replace the term storage with that of ''heat debt,'' since then common sense would lead to the adoption of the same sign as that in the original definition. The book might be easier for the uninitiated to follow if this amendment had been adopted, though, with the practical presentation used, difficulties arise only rarely.

H. C. BAZETT

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History of medicine: a correlative text arranged according to subjects. Cecilia C. Mettler. (Edited by Fred A. Mettler.) Philadelphia-Toronto: Blakiston, 1947. Pp. xxix + 1215. (Illustrated.) $8.50.

The current trend for a high degree of specialism in medicine is interestingly reflected in this volume, which is organized into 15 sections according to special preclinical and clinical fields: Anatomy and Physiology to the End of the Middle Ages; Anatomy in the Modern Period; Physiology in the Modern Period; Pharmacology; Pathology and Bacteriology; Physical Diagnosis; Medicine; Neurology and Psychiatry; Venereology; Dermatology; Pediatrics; Surgery; Obstetrics and Gynecology; Ophthalmology; and Otology and Rhino-Laryngology. While possessing certain advantages in unity of presentation, such an arrangement has great disadvantages in failing to clarify the general philosophical characteristics of thought in medical development for particular chronological periods.

It is unfortunate that Cecilia Mettler could not have lived to see the success of her effort. Her work is particularly useful for the names and dates of significant contributors. Frequent extracts from the original publications of the authors mentioned give some idea of their thought and style. Each section concludes with a list of selected readings.

With primary emphasis on individuals, there is unfortunate failure to analyze significant factors in the development of the special subjects. For example, no attempt is made to indicate the contributions which define the fundamental problems of pharmacology. There is little opportunity in a work of this sort to attempt to relate the developments in medicine with the general cultural conditions in which they arose. The volume thus lacks those attractive features which still make F. H. Garrison's *History of medicine* (4th ed., Philadelphia, 1929) the outstanding text in English in the field. Nevertheless, Dr. Mettler's book greatly surpasses Garrison's in the wealth of reference to individual contributors. Unfortunately, Dr. Mettler apparently did not see fit to rely very satisfactorily on the contributions of modern historians of science and medicine. The book is useful for reference purposes.

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