Later the author deals with the well-known theories of orthogonal and unitary similarity, but in the latter he studies only Hermitian matrices rather than normal matrices in general. Characteristic vectors are, of necessity, implicit in these discussions but are not treated explicitly. A long chapter is devoted to infinite series and functions of matrices, providing the only recent systematic account of this topic. The book closes with a brief treatment of matrix equations and a few miscellany.

SAM PERLIS
Department of Mathematics, Purdue University

Reviewed in Brief

Modern Magnetism. 3rd ed. L. F. Bates. New York: Cambridge Univ. Press, 1951. 506 pp. $5.50.

This third edition of the well-known book by Bates has not only been brought up to date and considerably enlarged, but the material has been rearranged in order to treat a number of new subjects not previously treated, and at the same time follow a more logical sequence. The material is now subdivided into 12 chapters. Chapter 10, the investigation of lattice and spin interaction, and Chapter 12, the domain concepts and the hysteresis cycle, contain an especially large amount of new material. With the great interest in recent years in the field of magnetochemistry, the book will be valuable to teachers and students, not only in physics but also in chemistry.

The Measurement of Radio Isotopes. Denis Taylor. New York: Wiley; London: Methuen, 1951. 118 pp. $1.50.

This is another in the series of useful Methuen monographs on various topics in the physical sciences. It is a review, directed toward the nonspecialist, of techniques used in the measurement of radioactive materials. Within the scope of a hundred-odd pages the author covers in a relatively thorough manner such topics as the radioactive decay laws; various types of measuring instruments and counting systems; statistics, geometry, and correction factors in measurements; health physics; and, very briefly, some of the more recently developed detection techniques.

It is perhaps regrettable that the author chose to enlarge upon the construction details of G-M counting systems and to make only brief mention of scintillation and proportional counters. As is implied in the preface, however, the G-M counter is still the most useful instrument for the individual toward whom the book is directed.

Nuclear physicists may take issue with the lack of rigor in various phases of the discussion, and American readers in general may find some difficulty with the British technical jargon. Nevertheless, the book will prove a useful reference for anyone dealing with radioactivity, as well as a concise handbook for technicians in this work.

Scientific Book Register

The Terpenes: The Sesquiterpenes, Diterpenes and their Derivatives, Vol. III. 2nd ed. Sir John Simonsen and D. H. R. Barton. New York: Cambridge Univ. Press, 1952. 579 pp. $10.00.

The Astronomical Universe: An Introductory Text in College Astronomy. Wasley S. Krogdahl. New York: Macmillan, 1952. 599 pp.; 6 sky maps. $6.25.

The Mitotic Cycle: The Cytoplasm and Nucleus During Interphase and Mitosis. Arthur Hughes. New York: Academic Press; London: Butterworths, 1952. 232 pp. $6.00.

Conformal Mapping. Zeev Nehari. New York–London: McGraw-Hill, 1952. 396 pp. $7.50.

Botany. Carl L. Wilson; illus. by Hannah T. Croasdale. New York: Dryden Press, 1952. 483 pp. $6.10.

An Introduction to Acarology. Edward W. Baker and G. W. Wharton. New York: Macmillan, 1952. 465 pp. $10.00.

Proceedings of the London Conference on Optical Instruments 1950. New York: Wiley, 1952. 264 pp. $7.00.

Texas Range Grasses. Benjamin Carroll Tharp; illus. by Clare Y. Whaley. Austin: Univ. Texas Press, 1952. 125 pp. $4.00.

A Check List of the Genera & Species of Mallophaga. G. H. E. Hopkins and Theresa Clay. London: British Museum (Natural History), 1952. 362 pp. £2.

Bone Tumors. Louis Lichtenstein. St. Louis: Mosby, 1952. 315 pp. $10.50.

Dana's Manual of Mineralogy. 16th ed. Rev. by Cornelius S. Hurlbut, Jr. New York: Wiley; London: Chapman & Hall, 1952. 530 pp. $6.00.

Intermediate College Mechanics: A Vectorial Treatment. Dan Edwin Christie. New York–London: McGraw-Hill, 1952. 454 pp. $7.00.

Reports on Progress in Physics, Vol. XV. A. C. Stickland, Ed. London: Physical Society, 1952. 338 pp. incl. cumulative index. £2 10s.

Navaho Veterans: A Study of Changing Values. Peabody Museum Papers, Vol. XLI, No. 1. Evon Z. Vogt. Cambridge, Mass.: Harvard Univ., 1951. 223 pp. $3.00.

Three Navaho Households: A Comparative Study in Small Group Culture. Peabody Museum Papers, Vol. XL, No. 3. John M. Roberts. Cambridge, Mass.: Harvard Univ., 1951. 87 pp.; 14 plates. $3.00.

Econometrics. Gerhard Tintner. New York: Wiley; London: Chapman & Hall, 1952. 370 pp. $5.75.

Méthodes et Réactions de l'Analyse Organique: Déterminations Générales et Recherches Fonctionnelles. Vol. I: ***Méthodes de l' Analyse Générale.*** M. Pesez and P. Poirier; Léon Velluz, Ed. Paris: Masson, 1952. 276 pp. 1800 fr.

A Textbook of Evolution. Edward O. Dodson. Philadelphia–London: Saunders, 1952. 419 pp. $5.00.

Secret Cities of Old South America: Atlantis Unveiled. Harold T. Wilkins. New York: Library Pub., 1952. 468 pp. $6.00.

Radio Antenna Engineering. Edmund A. Laport. New York–London: McGraw-Hill, 1952. 563 pp. $9.00.

The Chemistry of Organic Compounds: A Year's Course in Organic Chemistry. 4th ed. James Bryant Conant and Albert Harold Blatt. New York: Macmillan, 1952. 655 pp. $5.90.

Introduction to Geology (Branson and Tarr). 3rd ed. Rev. by Carl C. Branson and W. D. Keller. New York–London: McGraw-Hill, 1952. 492 pp. $5.50.