

shown on the best photographs now available. . . . Not only do the best photographs show, on the whole, more than the visual maps; they show the lunar surface with precision, both as to location and intensity and, of course, with completeness up to the resolving power attained, none of which are practicable in visual drawings. The information is increased if several photographs of the same area taken under different illuminations are combined to bring out the maximum advantage both low level detail and steep mountain slopes." Kuiper and his collaborators have achieved this purpose fully, and they deserve the gratitude of astronomers and others who are interested in the lunar surface.

The initial financial support for the project came from the National Science Foundation. Later support was provided by the Cambridge Research Directorate of the Air Force.

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Ticks. A monograph of the Ixodoidea.

Part 5. On the genera *Dermacentor*, *Anocentor*, *Cosmiomma*, *Boophilus*, and *Margaropus*. Don R. Arthur. Cambridge University Press, New York, 1960. xviii + 251 pp. Illus. \$11.50.

Acarologists will welcome the resumption, after 34 years, of this series of monographs on Ixodoidea and the announcement that the final volumes, Part 6 and Part 7 on other genera are in preparation. This pleasure, however, will be tempered by the fact that, compared to its more scholarly predecessors, this is an obviously inferior treatment, despite the very adequate descriptions and illustrations of the 35 species included. Keys for differentiation of genera—for example, *Margaropus* from *Boophilus*—and introductory reference to illustrated differences of Sections Prostriata and Metastrata in Part 2 (1911) would have been helpful. Under genus *Dermacentor* (page 6), the author's opinions are provided for neither subgeneric nor synonymic status, nor are there adequate references to type species, of *Conocentor*, *Indocentor*, *Amblyocentor*, and *Puncticentor* Schulze (pages 7, 137, 153, 172, 189), though he uses, without explanation, one in the heading *D. "(Amblyocentor) rhinocericinus* (Denny)" (page 171). Incon-

sistencies in the use of generic authorities, parentheses, references and synonymy, as well as misspellings, systematic lapses, and omissions (including no definitions of some technical terms—for example, opisthosoma, alloscutum), cannot be illustrated here, but they reduce the volume's reliability and textual value for taxonomic reference. Failure to check the original reference for dating *Boophilus* from a "nomen nudum" (the date given, 1891, was actually the year of validation) exemplifies some other noncritical entries, while some of the pertinent Russian and Japanese literature has been overlooked.

The very cursory reference to disease relationships is also disappointing. Though the book understandably features taxonomy, the inadequately documented, often incomplete reference to the medical and veterinary importance of various species belies the introductory statements about the "immense medical and economic importance" of tick species under review; even the classic work of Smith and Kilbourne on the transmission of Texas fever in cattle by *Boophilus annulatus* is omitted. Nevertheless, the monograph will be useful in bringing together scattered systematic knowledge about the five genera treated. It is to be hoped that other specialists will be consulted during the draft stage of the next two volumes; this one obviously could have benefited from such consultation.

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Nutritional Evaluation of Food Processing. Robert S. Harris and Harry von Loesecke, Eds. Wiley, New York, 1960. xviii + 612 pp. Illus. \$12.

In modern civilized societies more than 95 percent of the consumed food is processed to make it more palatable and nutritious and to keep it safe during storage, transportation, and distribution. The processing involves losses of essential nutrients which are affected by temperature, air, light, acidity, and solvents, or by a combination of these factors. This book evaluates these effects and establishes a scientific foundation for processing foods with a minimum loss of nutrients.

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New Books

Biological and Medical Sciences

Austin, C. R., Ed. *Sex Differentiation and Development*. Cambridge Univ. Press, New York, 1960. 208 pp. \$8.50. This volume, Memoir No. 7 of the Society for Endocrinology, is the proceedings of a symposium held at the Royal Society of Medicine on 10–11 April 1958.

Bargmann, W., D. Peters, and C. Wolpers, Eds. *Proceedings of the Fourth International Conference on Electron Microscopy*. vol. 2, *Biologisch-Medizinischer Teil*. Springer, Berlin, 1960. 652 pp. DM. 196.

Brady, Roscoe O., and Donald B. Tower, Eds. *The Neurochemistry of Nucleotides and Amino Acids*. Wiley, New York, 1960. 304 pp. \$10. Papers presented at a symposium that was held in 1958 to review the recent contributions in the field of nucleotide and amino acid chemistry in the light of application of these findings to the biochemical activities of the nervous system.

Brindley, G. S. *Physiology of the Retina and the Visual Pathway*. Arnold, London, 1960 (order from Williams and Wilkins, Baltimore, Md.). 309 pp. \$7.50. Brindley, lecturer in physiology in the University of Cambridge, discusses how the human visual pathway works.

Cameron, Thomas W. M. Ed. *Evolution: Its Science and Doctrine*. Univ. of Toronto Press, Toronto 5, Canada, 1960. 253 pp. \$5. Papers presented at a symposium held at the annual meeting of the Royal Society of Canada (1959) to commemorate the publication of *On the Origin of Species*.

Clark, F., and J. K. Grant, Eds. *The Biosynthesis and Secretion of Adrenocortical Steroids*. Cambridge Univ. Press, New York, 1960. 119 pp. \$5. Proceedings of the Biochemical Society Symposium No. 18, held in February 1959 and organized by J. K. Grant. The symposium was concerned with the production and secretion of steroid hormones by the adrenal cortex.

Clark, Marguerite. *Medicine Today: A Report on a Decade of Progress*. Funk and Wagnalls, New York, 1960. 360 pp. \$4.95.

Cold Spring Harbor Symposia on Quantitative Biology. vol. 24, *Genetics and Twentieth Century Darwinism*. Biological Laboratories, Cold Spring Harbor, N.Y., 1959. 336 pp. \$8.

Dawkin, M. J. R., and K. R. Rees. *A Biochemical Approach to Pathology*. Arnold, London; Williams and Wilkins, Baltimore, Md., 1959. 135 pp. \$4.50.

Elliott, Alfred M., and Charles Ray, Jr. *Biology*. Appleton-Century-Crofts, New York, 1960. 732 pp. \$8.

Gale, E. F. *Synthesis and Organisation in the Bacterial Cell*. Wiley, New York; Chapman and Hall, London, 1960. 117 pp. \$3.50. The 1959 CIBA lecture in microbial biochemistry.

Garn, Stanley, M., Ed. *Readings on Race*. Thomas, Springfield, Ill., 1960. 289 pp. \$6.75. Selected articles and papers from *American Anthropologist*, *Man*, *Human Biology*, *American Journal of Human Genetics*, and other sources, by B. Glass, C. Coon, W. Boyd, and others.