in the natural history of disease. Without doubt man's own evolution has been greatly affected by racial experience with plagues of various types, ranging from malaria, typhus, and smallpox, to tuberculosis and other similar diseases; great die-offs in population create conditions favorable for evolutionary change. Nearly all virulent diseases, newly introduced, have become attenuated with time by mutual adapations of host and parasites. The Australian investigators are to be congratulated on providing such a lucid and well-documented account of how such modifications can actually take place.

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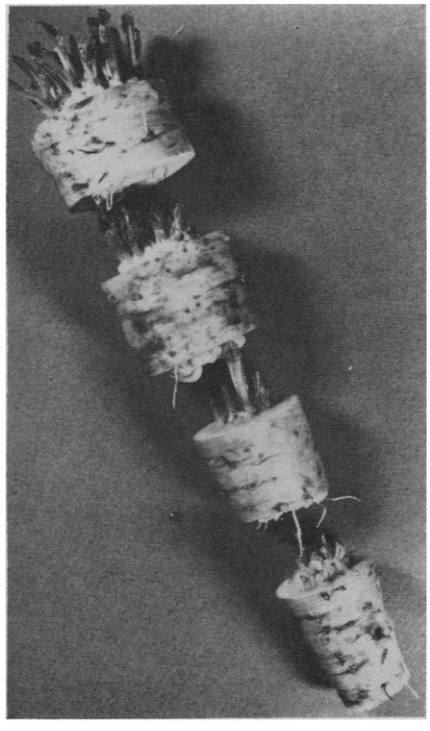
An Inside View of Our Living World

Encyclopedia of the Life Sciences. Albert Delaunay, Scientific Editor. vol. 1, *The Living Organism*; vol. 2, *The Animal World*; vol. 3, *The World of Plants*; and vol. 4, *The World of Microbes*. Translated from the French edition, 1961. Doubleday, Garden City, N.Y., 1965. 160 pp. each volume. $9.95 each volume.

In the introduction, Max Perutz states the high objectives of this series. "Each volume is written by a panel of international experts. . . . This is not an encyclopedia of Natural History. . . . It tries to convey to the reader what plants and animals are made of, and how they develop and work, rather than what they and what their different parts are called." Biology is blossoming and these books do much to convey this excitement. The numerous, large, and beautiful photographs are excellent. Many of them show close-up views of living things, both in and out of the laboratory, which will inspire even the scientist who works with the real stuff. The approach in the text is to present experimental biology, not just descriptions. Graphs and tables of data, experimental procedures, and results—all of these are presented in an artistic and meaningful format. Margins of most pages contain definitions of terms, key historical notes, small figures, and other relevant information which helps to fill in background material for the reader. Magnification of pictures or size of objects is often indicated in the figure captions, something which is desirable but not seen in most American books on biology, not even in textbooks.



Cut-up pieces of stump of chicory root form buds at the apical pole and roots at the basal pole. [Photo Lod]

The editors designed this encyclopedia for the layman, although it is admitted in the introduction that a basic knowledge of science will be an advantage for the understanding of many chapters. The editors are correct, and this is my only real criticism of the series. There is so much good material in these books, one can only wish that the writing were even simpler so that junior high school students could be challenged by the contents. But high school students who faired well in a BSCS biology course will find many familiar topics and much to interest them, and one can always settle for just looking at the illustrations. Probably any educated person can read these volumes and discover the fascinating roles that microbes play in society and experimental biology, get a feeling for the world as "seen" by plants and animals, and be given a short course in molecular biology. Five titles from the 25 chapters in *The Living Organism* will illustrate the scope: "Barriers of the living world"; "Life-giving molecules"; "The culture of isolated organs"; "The immortal cells"; and "A giant-cell—the egg: The problem of bilateral symmetry." But this encyclopedia is not the "Gee whiz!" kind of superficial survey of biology written by a nonbiologist editor; it is a serious attempt by experts to convey the excitement and fun they experience in doing biology.

These beautiful books are part of an eight-volume series. Yet to be published are four books that center attention on man—The Human Machine: *Mechanisms* (vol. 5); *Disorders* (vol. 6); *Adjustments* (vol. 7); and *Man of Tomorrow* (vol. 8). If the 640 pages published so far are matched in quality by the pages on man, this should be a remarkable series which has something for all.

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Soviet Chemists

Chemistry in the Soviet Union. John Turkevich. Van Nostrand, Princeton, N.J., 1965. x + 566 pp. $12.

This book is an extension in the area of chemistry of Turkevich's earlier book, *Soviet Men of Science* (1963), to which has been added a historical discussion of early Russian chemistry. The first part of the book, which is arranged by historical periods up to the present with discussion of the chemical programs and staff of present-day research establishments, constitutes about one-third of the book. The balance consists of two major sections devoted to various lists—one section covers Soviet chemical dissertations and provides authors, titles, and dates, arranged by broad classification (1964 to 1930). The last section, which involves about one-half of the book, is a list of the recent publications of chemists who are members of the Soviet Academy of Sciences. In most cases citations from *Chemical Abstracts* as well as the original reference are given, and in many cases the reference to available English trans-