Like any translated text, this one offers some interesting sidelights in its notation and wording—for example, the quotation in which F. Engels refers to Mendeleyev's work as an unconscious application of Hegel's law of transformation of quantity into quality. There are also a number of capsule biographies that are interesting for the information given and for the list of individuals chosen.

The basis for evaluating a book such as this one is not clear. The volume could be of interest to many as an example of Russian texts, but none of the background information about its purpose and usage, which are needed for comparison with American texts, is supplied. Much of the material on chemical theory seems out-of-date, but this is also true for most American texts of 1956 to 1959.

An individual studying this book would, it is true, receive some sound grounding in fundamental terminology, ideas, and practice in chemistry. However, the actual printing and reproduction are poor, and the cost of the volume is high. Anyone who wants to study chemistry on his own can get better books at lower cost elsewhere.

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Peptide Synthesis

In the rapidly developing field of peptide synthesis the need for a thoroughly up-to-date reference book has been evident. Volume 1 of **The Peptides, Methods of Peptide Synthesis** (Academic Press, New York, 1965. 511 pp., $18), by Eberhard Schröder and Klaus Lübke, meets the current requirement and will be welcomed by all who are actively engaged in the synthesis of peptides. It will also be valuable for those who wish to become acquainted with the field for the first time. The authors have presented in a small space a very complete survey of the methods of peptide synthesis. The emphasis is on the practical, but virtually every known method has been dealt with to some degree. In a systematic way each of the protecting groups for the α-amino and α-carboxyl groups is described. The basic principles are discussed, and extensive references to the development and application of the procedures are given. Similarly, the methods of forming the peptide bond are discussed, and this is followed by a consideration of the specific application of methods to the individual amino acids, with special emphasis on the polyfunctional amino acids. Presentation of the general techniques of peptide synthesis precedes treatment (in the last six chapters) of several of the more specialized areas. The latter chapters include good accounts of the cyclic peptides, the depsipeptides, the plasteins, and the group of peptides known as peptoids. Solid-phase peptide synthesis is discussed in a short section. Schröder and Lübke have made an effort to evaluate and compare the many alternate procedures and combinations of procedures which are now available for almost any particular purpose, although the decision about the best approach is necessarily left to the reader. The book contains valuable sections on nomenclature and on the crucial problem of racemization, as well as several useful tables on the stability of protecting groups and the preparation of amino acid derivatives. The excellent translation into English, by Erhard Gross, deserves special mention.

The few criticisms that can be made are largely related to the obvious space limitations. Thus, the fascinating historical development of the field is not stressed and predictions about its future are left to others. Experimental data are used sparingly and detailed procedures are not given, although ample references to the original work are always made. In fact, one of the striking features of the volume is that such a large proportion (approximately 30 percent) of it is devoted to a 2700-entry bibliography and author index. This valuable monograph is certain to be found on the desk of every peptide chemist.

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Collagen Diseases

Occasionally, during the pursuit of a busy career, a man takes time to sift through and consider a segment of his experience with a view to sharing what he has learned with others who may be interested. This is what radiologist Charles M. Nice, Jr., seems to have done in **Clinical Roentgenology of Collagen Diseases** (Thomas, Springfield, Ill., 1966. 205 pp., $10.75).

As a background for the presentation and discussion of his excellent collection of radiographic films, the author provided a brief record of the basic clinical and laboratory features of the collagen diseases, including systemic lupus erythematosus, polyarteritis and Wegner's granulomatosis, systemic scleroderma, dermatomyositis, and rheumatic pneumonitis. In most instances he has also briefly discussed pathology and treatment. The author has been generous with references (283 references for 183 pages of text), and the book has some aspects of a review.

The purpose of the book, and clearly its most valuable contribution, is the presentation of the superbly reproduced radiographic films. Both common and unusual pulmonary lesions of lupus are liberally illustrated. The bowel lesions of scleroderma and dermatomyositis, as they appear to the radiologist, have been lucidly discussed and illustrated. Many photographs showing subcutaneous calcification in collagen diseases have been included.

This book is of primary value to the medical student, general physician, internist, and perhaps the radiologist. Most rheumatologists are familiar with the material presented.

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Fermi's Molecole e Cristalli

Molecules, Crystals, and Quantum Statistics (Benjamin, New York, 1966. 314 pp., $12.50), by Enrico Fermi, is a translation (with several addenda by Lloyd Motz) of Fermi's 1934 textbook *Molecole e Cristalli*. The volume was translated by M. Ferro-Luzzi and edited by Lloyd Motz.

There is considerable presumption and also danger of heresy in attempting to give anything like an objective review of any of Fermi's work. It seems to me doubtful, however, that anyone would have undertaken the translation and publication of this work if it had not borne Fermi's name. It is not that it isn't well written and lucid. Again and again one finds passages where the famous Fermi ability to say things simply and directly is very much in evidence. This is especially true in parts relating to the structure of diatomic molecules. It is rather that for the