

BOOK REVIEWS

SADTLER STANDARD SPECTRA; FATS, WAXES AND DERIVATIVES, Vols. I and II. Sadtler Research Laboratories, Philadelphia 2, Pa. 650 Spectra. 1962. Price \$325.

These two volumes have been completely updated to include the many new materials developed in the last ten years. Each infrared spectrogram includes the chemical or trade name, source, scanning from 2.0 to 15 microns, type of cell or special method used, index number and often the instrument used in obtaining the results.

The materials tested are divided into 16 groups, such as fatty acids, animal fats, soaps, fatty amides, and others along with seven groupings of waxes. One finds such natural materials as lanolin, beeswax, candelilla and carnauba wax; also included are derivatives like Cobee edible coconut oil, Viscolan, Hartolan, Wecoline 1245, Arlachel 165, Myverol monoglycerides, Tegin, the Armeens, the Adols, Eutanol G, Acetulan, wool alcohols, Warco waxes, Hoechst waxes, Centrol lecithins, squalene and the many others.

This reference library is a great help to infrared technicians in making available the transmission spectra of a wide variety of materials encountered in cosmetic practice without the manual effort in doing the work. At a cost of about 50 cents per spectrogram, you cannot do it for yourself so inexpensively.

The spectrograms are printed on one side of a sheet 8½ by 11 inches in size, with three-hole perforations.

The sets are sold in three ring binders for easy use and storage.

This reviewer has found the material of infinite practical value, as you will if you do infrared analysis.

Other related spectra are available. New material is constantly being added. Special material is available by arrangement.—M. G. DENAVARRE, Beauty Counselors, Inc.

AUTOXIDATION AND ANTIOXIDANTS, Vol. I, by W. O. Lundberg. Interscience Publishers, Div. John Wiley & Sons, New York 1, N. Y. 1961. 450 pages, indexed and illustrated. Price \$15.50.

This volume consists of ten chapters contributed by a group of 12 authors, each a specialist in a specific field of autoxidation and anti-oxidation chemistry.

Volume I is strictly a theoretical treatise with a thorough analysis of various reactions involved and is illustrated with numerous tables, formulas and graphs.

The subjects discussed include:

The general mechanism of autoxidation

Primary products of olefinic autoxidation

Autoxidation of hydrocarbons accelerated by metals and light

Autoxidation of organic substances and classified into such groups as ethers, amines, aldehydes, ketones, etc.

Autoxidation of cholesterol

Photochemical autoxidation

Autoxidation of irradiated substances

Biocatalysts inducing autoxidation

Chemical analysis of autoxidation mixtures

The analytical chapter includes both discussions and analytical procedures for the determination of peroxides, oxirane compounds hydroxyl, carbonyl and ether radicals, unsaturation, and the use of spectrophotometry in this field.

The discussion covering antioxidants should be helpful in the choice

of an antioxidant for a specific problem, although the practical aspects and application of such compounds will be given in Volume II.

The information compiled in this volume provides a unified source of reference for those engaged in research connected with autoxidation and antioxidation.

This book is well written, arranged and indexed.—JAMES H. BAKER, Gar-Baker Laboratories, Inc.