

through the handling and sale of Jamaica ginger, Justice Carroll, in the Massachusetts Supreme Judicial Court, held that the offense was not the intention of the dealer, but his act and verdict of guilty was warranted by the showing that the defendant sold or kept for sale an alcoholic preparation "used so extensively for drinking as to become a beverage."

The court held further that "the fact that the preparation may be used as a medicine is no excuse for its sale if it is in reality an intoxicating beverage prohibited by law," and that "evidence tending to show that the Jamaica ginger was an intoxicating beverage, was commonly used as such, was admissible."—*Oil, Paint and Drug Reporter*.

### BOOK NOTICES AND REVIEWS.

*Chemical Reactions and their Equations.*  
By Ingo W. D. Hackh, Ph.C., A.B. P. Blakiston's Son & Co., Philadelphia, Pa., publishers. 138 pages. Price, \$1.75 net.

It is stated in the preface of this book that it was "written in order to supply students with necessary material and to expound the general principles of balancing equations" and that it should be studied, to the best advantage, in connection with some good text.

The balancing of equations is perhaps the most common difficulty encountered by students of chemistry, yet little or no effort has been made to publish a book which takes up this phase of chemistry by itself. It is obvious then that the value of a book of this type should appeal to all students of chemistry.

The book opens with a chapter on symbols and thoroughly describes their use as applied to atoms, molecules and ions. The second chapter takes up the different types of chemical formulas and, besides going into the nomenclature of the various chemical compounds, offers an extensive explanation of valence and its application and a discussion of the principles of oxidation and reduction. The next two chapters are devoted to equations, the first taking up those equations showing no change in valence and the other, those in which oxidation and reduction are involved. Both classes of equations are explained in detail and illustrated by a number of examples. The fifth chapter describes the several conditions and influences which have to do with the control of chemical reactions, grouping these agencies into three classes; namely, those under mechanical control, thermal control and electrical control. In the remaining sixth chapter more than two hundred equations, representing all types of reactions, are given. These are divided into twelve type groups, each group being explained by examples. This gives the student an unusual opportunity to study equations by association and comparison.

An excellent feature of the book is a list of questions and problems found at the close of each chapter. These offer plenty of drill upon the subject and enable one to drive home, by practical application, the important points of the preceding chapter.

The book closes with a valuable appendix composed of the following: 1. A table or key to the nomenclature of chemical compounds. 2. A list of the elements arranged according to their electro-motive force. 3. A brief discussion of the periodic system. 4. A solubility table for chemical compounds. 5. A table of type methods for the preparation of salts, and finally, a systematic index and glossary.

With all its commendable features, it is unfortunate that this book, like many other new ones, contains a considerable number of errors. While most of these are not very serious and probably would not escape detection by an experienced reader, at the same time, they are apt to lead those that are inexperienced very far astray.

The author of this book has succeeded in meeting a long needed requirement among the works on chemistry and presents his subject in an original and praiseworthy manner. It is a book which should be welcomed by all students of chemistry as an unusual aid to them in acquiring a clear understanding of what is so often a troublesome phase of the subject.

E. J. HUGHES.

*Pertinent Facts on Latin American Medical Trade* is the title of a brochure which presents some interesting and valuable data to those who desire a better acquaintance with our Latin American neighbors. The book opens with a short discussion of "The Opportunity for Trade with Latin America" with particular reference to the Latin American physician as a consumer and to the means of "selling" him. Following this are individual maps of each country and important information such as

geographical features, railroads, postoffices, money, leading cities, hospitals and dealers in drugs, instruments, apparatus, etc. A chapter on "Ways of Handling Business" is quite informative and contains paragraphs on making shipments, direct advertising, banks, help in getting dealers, etc. Another chapter is devoted to "Observations on South America" by Dr. William J. Mayo of Rochester, Minnesota, who made an extensive tour through the various countries. He tells his experiences in an interesting manner and gives concrete facts that should be of special interest to those who are looking for export business in medical and hospital lines. The booklet is issued by the American Medical Association, 535 North Dearborn Street, Chicago, and we are informed that a copy will be mailed to anyone interested.

*Some Microchemical Tests for Alkaloids.* By Charles H. Stephenson, Scientific Assistant, Bureau of Chemistry, United States Department of Agriculture. Including chemical tests of the alkaloids used, by C. E. Parker, assistant chemist U. S. Department of Agriculture, Bureau of Chemistry. 27 plates and 110 pages, 1921. J. B. Lippincott Company, Philadelphia. Price, \$4.00.

This little book is the result of work begun by the author in December, 1907, and continued during intervals until the date of publication. The author outlines briefly the character of the work on crystalline precipitates described by others and gives references to the original articles.

The scheme for the identification of alkaloids is then given which is followed by a table showing the best and second best tests for each alkaloid. Detailed descriptions of tests for each of 51 alkaloids then follow. The results of tests for the authenticity and purity of the alkaloids used in the investigation by C. E. Parker, 27 plates, each with 6 photomicrographs and a table of microchemical reactions of 51 alkaloids with 35 reagents by the author complete the work.

The size of the book gives no idea of the great amount of work involved in collecting the data found between its covers.

In the description of the tests, one is favorably impressed both with the simplicity of style and the conciseness. The photomicrographs are clear and serve as a valuable aid in explaining the crystals described.

Since the appearance of "Beiträge zur Mikrochemischen Analyse Einiger Alkaloide und

Drogen" by A. Grutterink in 1910, little has been published on the microchemical study of alkaloids and that, more or less fragmentary. This new work, involving more microchemical tests than have heretofore been published in any one volume of which the writer is aware, is, therefore, to be welcomed as a valuable handy reference.

It should prove a desirable asset in the laboratories of all drug analysts, pharmacognosists, and pharmaceutical chemists.

HEBER W. YOUNGKEN.

#### PUBLICATIONS RECEIVED.

*New and Nonofficial Remedies, 1921*, containing descriptions of the articles which stand accepted by the Council on Pharmacy and Chemistry of the American Medical Association on Jan. 1, 1921. Cloth. Price, postpaid, \$1.50. Pp. 418+XXXII. Chicago: American Medical Association, 1921.

"New and Nonofficial Remedies contains descriptions of proprietary medicines which are offered to members of the American medical profession. These descriptions are critical and trustworthy. They are based in part on investigations made by, or under the direction of, the Council on Pharmacy and Chemistry and in part on information supported by evidence submitted by the manufacturer or his agent. Statements made by those interested in the manufacture or marketing of preparations must be supported by substantiation evidence or conform to generally accepted facts before such statements are accredited in the acceptance of the article for N. N. R. "This volume contains descriptions only of those proprietary and nonofficial products which are in accord with the principles underlying the rules for the acceptance of products formulated by the Council. These principles provide that the quantitative formula of the article must be declared, the therapeutic claims made in advertising (or in marketing) the article must be true and the preparation must have, or give promise of having, therapeutic value.

"A feature of the book which is of especially practical value is the grouping of preparations in classes. Each of these is introduced by a general discussion of the group. Thus the iodine preparations, the arsenic preparations, the animal organ preparations, the biologic products, etc., each are preceded by a general, thoroughly up-to-date discussion of the particular group. These general articles com-