EDITORIAL NOTES

TECHNICAL TABLETS.

BY WILBUR L. SCOVILLE.

During the war the Germans are said to have used a paste made from kaolin and mucilage of Irish moss as a base for suppositories.

Litmus paper is most sensitive when made from weak litmus or azolitmin solutions—0.1 percent of azolitmin being the best strength. Congo paper should be made from a 1 percent solution, also phenophthalein paper. For the detection of free acid an iodide-iodate paper is most sensitive and reliable, free iodine being liberated if acid is present.

A new radio-active substance, *protactinium*, has been discovered, which has great emissive power and is the parent substance of actinium. It promises to add materially to the luminous-dial industry.

Quinine is found in the urine six days after its administration, but it is all eliminated from the bowels within six hours. A French chemist, Robin, thinks that cancer is caused by an enzyme which hydrolyzes the protein of the tissues and this hydrolyzed portion then stimulates the surrounding cells to an "anarchistic growth."

The sting of bees is a proteid compound, and not an acid, as has been supposed. The compound is allied to scorpion venom.

Italy has been long afflicted with a weed called asphodel and known as the "plague of the Mediterranean," and which is now being developed as a source of alcohol. An acre of the weed will yield 107 gallons of alcohol, and the residue can be used for cattle food or the manufacture of paper.

ALCOHOL AS A MOTIVE POWER.

In London alcohol mixed with benzol is now used in the combustion engines for driving motor cars. New fuel must be provided and alcohol may solve the problem; its sources are inexhaustible, for it will be available as long as there is vegetation, and things now going to rot may be utilized in its manufacture. This proclaims the importance of chemists to the world, in traffic as well as commerce.

GENERAL PRINCIPLES TO BE FOLLOWED IN REVISING THE PHARMACOPOEIA.

1. OBJECT AND SCOPE OF THE PHARMACOPOEIA.

The object of the Pharmacopoeia is to provide standards for the drugs and medicines of therapeutic usefulness or pharmaceutic necessity sufficiently used in medical practice throughout the United States and its possessions; to lay down tests for the identity, quality and purity of these; to insure, so far as possible, uniformity in physical properties and active constituents.

It is recommended that the Committee of Revision be authorized to admit into the Pharmacopoeia a carefully selected list of medicinal substances of known origin, but no substances or combination of substances shall be introduced if the composition or mode of manufacture thereof be kept secret. A statement shall be placed in the preface to the effect that standards for purity and strength, described in the text of the Pharmacopoeia, are intended solely to apply to substances which are used for medicinal purposes or determining the identity and purity of the same.

2. DOSES.

It is recommended that after each Pharmacopoeial article (drug chemical or preparation) which is used, or likely to be used internally or hypodermically, the Committee of Revision be instructed to state the average approximate (but neither a minimum nor a maximum) dose for adults, and, where deemed advisable, also for children. The metric

system to be used, and the approximate equivalent in apothecary weights or measures inserted in parenthesis. It is to be distinctly understood that neither this Convention nor the Committee of Revision created by it intends to have these doses regarded as obligatory on the physician or as forbidding him to exceed the doses given, whenever in his judgment this may seem advisable; the Committee of Revision shall make a distinct declaration to this effect in some prominent place in the new Pharmacopoeia.

3. NOMENCLATURE.

It is recommended that changes in the titles of articles at present official be made only for the purpose of insuring greater accuracy, brevity, or safety in dispensing, and to eliminate therapeutically suggestive titles. That changes in botanical names be made only for well defined reasons, and such changes shall conform to the rules of the International Botanic Congresses.

In the case of newly admitted articles, it is recommended that such titles be chosen as are in harmony with general usage and convenient for prescribing; for synthetic chemicals, with lengthy or unwieldy names, the Committee of Revision shall be empowered to coin short euphonious titles, contracted, if possible, from the true chemical names, but in the case of chemicals of a definite composition the scientific name shall be given, at least as a synonym.

There shall also be inserted, after each article used by physicians in prescriptions, an abbreviated name, which may be known as an official abbreviation, in order that uniformity may be established throughout the country, with the object of preventing mistakes in reading and compounding prescriptions, and further, to serve as authorized abbreviations in labeling the store furniture of the pharmacist.

4. SYNONYMS.

It is recommended that the use of synonyms should be extended in the next revision, and the synonyms printed in the text of the Pharmacopoeia, immediately after the official English name of the substance. When an article is known in commerce under more than one commonly used English name, such vernacular titles may be given as synonyms. A statement shall be made in the Preface of the Pharmacopoeia that substances labeled with an official synonym must comply with the same standards, tests and requirements as are demanded for the article under the official title.

5. PURITY AND STRENGTH OF PHARMACOPOEIAL ARTICLES.

It is recommended that the Committee of Revision be instructed to carefully revise the limits of purity and strength of the Pharmacopoeial chemicals and preparations, for which limiting tests are or may be given. While no concession should be made towards diminution of medicinal value, an allowance should be made for unavoidable, innocuous impurities or variations due to the particular source or mode of preparation, or to the keeping qualities of the several articles.

The "Purity Rubric," which limits the percentage of innocuous impurities, as introduced in the previous revision, should be continued, and tests and requirements should be appended to each article for which a "Purity Rubric" is given.

6. INTERNATIONAL STANDARDS.

The International Conference for the Unification of Formulas for Potent Remedies performed a signal service for all countries by recommending the various pharmacopoeias of the world to adopt certain standards for potent medicines. It is recommended that the Committee of Revision retain or adopt these standards wherever practicable, but it is believed that it would be unwise to require the acceptance of the details of pharmaceutical or other processes recommended by the International Conference.

If the finished product conforms to the International standards, we believe that each country should be left free to adopt such detail and manipulation as may seem to it best. Nothing should prevent, however, the adoption of the recommendations of the Conference, as to details, if in the opinion of the Committee of Revision the Pharmacopoeia can be improved by so doing.

The advances in science since the International Conference of Brussels in 1902 would indicate that International standards then adopted are not such as would be approved at this time as being in conformity with our present knowledge and ideals. It is recommended that, as soon as conditions will warrant, the Pharmacopoeial Convention take the initiative of calling another International Conference for the unification of standards and formulas for potent remedies.

7. GENERAL FORMULAS.

In view of the success attending the adoption of General Formulas in the U. S. P. IX for fluidextracts and tinctures, it is recommended that this principle be extended to the other official classes of preparations wherever practicable, and where preparations can be made by identical processes, that the General Formulas to be followed in each case shall be indicated in the text by reference.

8. APPENDING A LIST OF PREPARATIONS IN WHICH AN OFFICIAL ARTICLE IS USED.

It is recommended that, especially for the convenience of practicing physicians, there shall be appended after each article in the text a list of the official preparations in which it is an active essential ingredient.

9. ALCOHOLIC PERCENTAGE IN OFFICIAL PREPARATIONS.

It is recommended that a range of the content of absolute alcohol, by volume, be stated in the Pharmacopoeia, accompanying the text, for each preparation containing alcohol.

10. ASSAY PROCESSES.

It is recommended that the Committee of Revision be instructed to introduce Assay Processes for as many of the potent drugs and preparations made therefrom as may be found practicable and which lead to fairly uniform results when applied by different analysts; wherever feasible, tests of identity and purity are to be given for the products of such assays.

Where reliable methods of chemical assay are not possible, and concordant and dependable methods of pharmacodynamic testing are available, then the latter methods of standardization be adopted.

11. SERUMS AND OTHER BIOLOGIC PRODUCTS.

It is recommended that serums and other biologic products, of approved usefulness, if standardized by a department of the Federal Government, be admitted to the Pharmacopoeia.

12. WEIGHTS AND MEASURES.

It is recommended that the Committee of Revision be instructed to retain the metric system of weights and measures.

13. ATOMIC WEIGHTS.

It is recommended that the Atomic Weights adopted in the revision shall be based upon oxygen taken at 16 (o = 16), and in accordance with the latest available report of the International Committee on Atomic Weights.

14. PHYSICAL CONSTANTS.

It is recommended that official methods for taking physical constants shall be stated in the Pharmacopoeia, and these shall apply to all articles in which physical constants are officially used, unless otherwise specifically excepted.

15. STANDARD TEMPERATURE.

It is recommended that the standard temperature of 25° C. (77° F.) be retained in the revision (except for alcohol or in other special cases), and that an alcoholometric table be inserted in Part II, giving the percentage of alcohol at different temperatures.

16. COMPOUND PREPARATIONS.

It is recommended that the introduction of compound preparations be discouraged as far as possible.

17. PHARMACOGNOSTICAL DESCRIPTIONS.

It is recommended that with the description of a crude drug there be included brief, pharmacognostical descriptions, both macroscopic and microscopic where practicable, and, as a means of detecting adulteration, there shall be added a statement of the appearance of the distinctive structural elements in the powder, when examined microscopically.

18. POWDERED DRUGS.

It is recommended that powdered drugs be required to represent the entire drug unless specifically stated otherwise. Where the drug can be powdered without residue this should be required; in other cases the amount of allowable tailings, gruffs or residue should be determined and inserted in the text.

19. SOLUBILITIES.

It is recommended that the degree of solubility of official substances in various solvents be given as completely as practicable.

20. STERILIZATION.

It is recommended that there be included in the Pharmacopoeia a chapter on Sterilization.

21. COMMITTEE ON DRUG MARKETS.

It is recommended that the Committee of Revision be empowered to appoint a Special Committee to make an investigation of the quality of crude drugs in commerce, and that this Committee be especially instructed to endeavor to determine the proper limits of

variability, due to soil and climatic conditions, or collection, or handling, and to suggest such improvements as can be introduced in the collecting, marketing and preservation of crude drugs.

22. PUBLICITY.

It is recommended that the Committee of Revision make public for comment and criticism, an abstract of new descriptions and standards, and all important changes in preparations and standards proposed, before final adoption.

23. FORMULATION OF RULES.

In all matters not especially provided for by the "General Principles" adopted by the Convention, the Committee of Revision is empowered to formulate rules as it considers necessary.

24. DATE WHEN THE NEXT PHARMACOPOEIA BECOMES OFFICIAL.

It is recommended that the Committee of Revision print upon the title page of the next Pharmacopoeia a definite date, reasonably distant from the actual date of publication, announcing when the new Pharmacopoeia is intended to go into effect and supersede the preceding one.

25. SPANISH EDITION.

It is recommended that the Tenth Revision of the United States Pharmacopoeia be translated into the Spanish language and published.

26. SUPPLEMENT.

It is recommended that the Committee of Revision be authorized to prepare supplements to the Pharmacopoeia, or lists of admission or changes at any time they may deem such action desirable.

PERSONAL AND NEWS ITEMS.

Announcement has been made of the marriage, June 28, of **William Baker Day**, General Secretary of the American Pharmaceutical Association and Miss Marietta Lucile Carothers, daughter of Mr. and Mrs. J. H. Carothers, of Chicago.

The marriage of Miss Frances Dohme, daughter of **Ex-President A. R. L. Dohme**, A. Ph. A., to Edmund Wade Fairchilds, June 30, has been announced. Miss Adelyn Dohme, another daughter of Dr. Dohme, was recently married to Elias Breeskin.

The birthday of **Wilhelm Bodemann**, Recording Secretary of the C. V. D. A., was celebrated June 3, at the regular mid-week meeting of this organization, and that of another veteran member of our Association, **John Blocki**, on June 17.

The members of the Philadelphia Branch of the American Pharmaceutical Association and friends of Prof. **E. Fullerton Cook** tendered him a testimonial dinner at the City Club of Philadelphia on Friday evening, May 28, in honor of his being elected chairman of the U. S. P. Committee of Revision. The presence of Mrs. Cook and likewise the Rev. Cook and Mrs. Cook, father and mother of the guest of honor, added greatly to the sentiment and enjoyability of the occasion. Dr. Harvey W. Wiley, of Washington, D. C., and Dr. H. V. Arny, of New York City, were present.

The *Baltimore Sun* of June 13 has an interesting account of the activities of **Sergeant-Major H. W. Riess** of the Hospital Service, who retires to accept a position with the Public Health Service. In point of service he is the oldest non-commissioned officer, having 32 years to his credit.

Dr. Jacob Diner, recently Chairman of the Scientific Section, A. Ph. A., left June 20 for a four months' stay in the Philippines. While there he will undertake Governmental work in the study of preventive tropical medicine.

Dr. Edgar Fahs Smith has retired as provost of the University of Pennsylvania and will devote his time to chemical research.

The silver anniversary, as registrar of the Brooklyn College of Pharmacy, of **William L. Harloe**, was celebrated by a testimonial dinner at the Ormonde, in Brooklyn. Members of the faculty and friends attended, and a presentation of a gold watch was made to the guest of honor.

J. K. Lilly, president of Eli Lilly & Co., Indianapolis, Ind., has been elected chairman of the board of trustees of the Indianapolis Foundation, to succeed the late Charles Warren Fairbanks, former Vice-President of the United States. The Indianapolis Foundation is a community trust fund formed of the gifts and bequests of citizens of Indianapolis given for the betterment of the city and its people. It is a permanent organization.

Theodore Campbell, pharmacist, of Philadelphia, was renominated for election to the Pennsylvania Legislature; he has been representative for ten years.

Dr. Taylor Bogart, prominent in the affairs of the American Chemical Society, has been appointed member of the U. S. Tariff Commission, by President Wilson.

James W. Morrisson, head of the Fuller-Morrisson Co., wholesale druggists, has been elected president of the newly formed Chicago Drug and Chemical Association.

James S. Robinson, pharmacist of Memphis, Tenn., has been a member of the American Pharmaceutical Association for fifty-one years. The record of his prescription department shows that more than 1,500,000 prescriptions have been dispensed.

OBITUARY.

EDWIN McCURDY BORING.

Edwin M. Boring, who died at his home in Philadelphia June 22, 1920, was the son of John Dobbins Boring and Catherine McCurdy Boring, and was born at Lancaster, Penna., October 24, 1839. His boyhood days were spent in his home town, where he attended

EDWIN McCURDY BORING.

High School. Thereafter, about 1857, he worked for a time in Welchen's Drug Store in Lancaster, and for a few months in Philadelphia, after which he returned to Lancaster.

He responded to Lincoln's call for 75,000 volunteers, and entered the three months' service with the Lancaster Fencibles April 18, 1861. At the expiration of the three months he re-enlisted in Company E, 79th Pennsylvania Volunteers, first as private, and was commissioned First-Lieutenant June 19, 1864. He took part in a number of the great battles of the war, at Murfreesboro, Chickamauga, etc. He was mustered out July, 1865. As a member of the Executive Committee of the State of Pennsylvania Chickamauga-Chattanooga Battlefields Commission he assisted in the erection of the monument at Chickamauga Park to the 79th Pennsylvania Volunteers.

After the war, September 4, 1865, he came to Philadelphia, and entered the employ of Edward B. Garrigues, at 10th and Fairmount Ave. During the same year he matriculated at the Philadelphia College of Pharmacy and graduated in the class of 1867. During the summer of 1866 he studied botany under Dr. Horatio C. Wood, of the University of Pennsylvania, then located at 9th and Chestnut Sts. He was elected to the Board of Trustees of his Alma Mater in 1868, and continued a member until the time of his death. In 1868 he formed a partnership with Mr. Garrigues, which continued until the time of the latter's retirement in 1887, when Mr. Boring became the sole proprietor. He continued this business until last year, when he disposed of it to his successor.

The deceased became a member of the American Pharmaceutical Association in 1867, and attended many of the annual conventions, especially those of earlier years. He was one of the organizers of the Philadelphia Wholesale Drug Company, a member of the Pennsylvania State Pharmaceutical Association and the Philadelphia Association of Retail Druggists.

October 8, 1873, Mr. Boring married Elizabeth Garrigues Truman, who died February 18, 1907. They had four children, all of whom survive the deceased. They are Edwin Garrigues Boring, Professor of Experimental Psychology in Clark University, Worcester, Mass.; Alice Middleton Boring, for the past two years Assistant Professor of Biology at the Union Medical College, Peking, China, and now appointed Assistant Professor of Zoology at Wellesley College, Wellesley, Mass.; Katharine Boring Rondthaler, wife of Dr. Howard Rondthaler, President of Salem College, Winston-Salem, N. C.; and Lydia Truman Boring, Assistant in the Psychiatric