

5. Hospital Pharmacy
6. Pharmaceutical education and the Colleges of Pharmacy
7. The employees in the pharmacies
8. The relations of the pharmacists to the physicians
9. The pharmaceutical associations
10. Pharmacists in the service of their state
11. The pharmaceutical journals and newspapers
12. Pharmaceutical literature.

III. Pharmaceutical Technique: This part includes the chapters:

1. Pharmaceutical apparatus, utensils and processes
2. Weights, balances and measures.

IV. Pharmaceutical Industry and Wholesale: This part includes the chapters:

1. Pharmaceutical industry
2. Pharmaceutical wholesale.

V. Pharmacy and Civic Life: This part includes the chapters:

1. Remarkable pharmaceutical buildings, interiors, furniture and utensils
2. The pharmacist as artist and poet and as the subject of art and poetry
3. The pharmacist as a citizen.

VI. Pharmaceutical Biographies: This part includes the chapters:

1. Famous pharmaceutical practitioners
2. Pharmaceutical teachers
3. Pharmacists famous for non-pharmaceutical accomplishment.

This arrangement orders and places the whole material in such a way that nothing can be neglected. The idea and the tasks of the History of Pharmacy are now evident without further explanation. General history is to be divided in two parts: the political history and the history of culture. The characteristic of political history is the ambition of power even if the price for it is death. The characteristic of the history of culture is the development of humanity. Here life is not the price to be paid but the prize to be won. Pharmacy, standing and working in the service of life and of its protection and preservation, is doubtless an important part of the history of culture. Its idea is a cultural one and the History of Pharmacy serves the realization of this idea.

And the tasks of the History of Pharmacy are to show truthfully and clearly the development of Pharmacy throughout the ages and therewith the various ways which have been trod.

Thus it may be possible to avoid old mistakes and to find new and better ways to the invariable aim, which has to keep the pharmacists aware of the responsibility toward their predecessors and successors in order that Pharmacy may maintain the high rank which it deserves.

AMERICAN ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE.

SECTION ON MEDICAL SCIENCES (N)—SUB-SECTION ON PHARMACY.

REPORT BY ARNO VIEHOEVER, SECRETARY PRO TEM.

The Sub-Section on Pharmacy met on Monday morning, June 27th, in Ottawa, Can., with twenty-two persons from both Canada and the United States attending

the session. Mr. H. M. Corbett, chairman of the Council of the Canadian Pharmaceutical Association, served as presiding officer in place of Dr. Wortley F. Rudd of Richmond, Virginia.

The subjects discussed in the papers covered the rather wide field of vitamins, hormones, drugs and physical and bio-physical methods applied to their study. E. M. Watson and C. S. McArthur reported on the fertility of vitamin E, present in wheat-germ oil and also found in the oils of cottonseed, rice germs and apocynum seed. The rat evidently requires it for procreation. While the clinical use of wheat-germ oil is still empirical, successful results were obtained in 80% of the cases where it was used in therapy. It proved especially useful in prevention of spontaneous abortions. A. Viehoever and I. Cohen observed obvious response in the reproduction rhythm of *Daphnia magna*, leading speedily to increased or decreased number of ovaries, and even their reabsorption, according to amounts of wheat-germ oil present. *Daphnia* is a promising test animal for rapid detection and evaluation of vitamin E, and the study of tocopherols.

For the assay of pituitary extracts and their thyrotropic activity one day-old chicks were recommended by A. S. Cook and C. M. Hayes. The increased weight and histology of the glands were used as criteria of response. As factors, modifying endocrine reactions, E. L. Schwabe and F. E. Emery mentioned among others the effect of single and continuous treatments with pituitary grafts and extracts on the growth of ovaries and the estrous cycle of rats, and the estrus-like condition produced by frequent vaginal examination with cotton and its effect on theelin reactions.

Studying the excretion of sex hormones in the pregnant sow, E. Lozinski, G. W. Holden and E. N. Macallum found oestrogenic hormones in small amounts in the urine for short periods of time, with peaks at the eighth and fourteenth week. The sow thus resembles the cat and dog but differs from the cow, mare and woman. Gonadotropic hormones, found in the blood-serum of the sow during heat, disappeared with conception, while the blood-serum of mare and woman contain large amounts in early pregnancy.

A new transparent test animal, the "scaleless" telescope fish, used for the study of gall-bladder evacuants (chologogues) and other drug effects, was introduced by Arno Viehoever who described the evacuation, visible without surgery or X-ray, of the green or yellow gall-bladder upon the intravenous injection of the hormone cholecystokinin.

Studying certain cardiac toxic drugs, H. W. Youngken and R. W. Vander Wyk reported histological characteristics of the rhizomes of *Convallaria*, and the rhizomes and roots of *Apocynum cannabinum* and *Apocynum androsæmifolium*, the last characterized by the stone cells. Fluidextracts, tested by the one-hour frog method, showed different and increased potency compared with *digitalis*. Arno Viehoever and I. Cohen recorded the depressant action of *Veratrum viride* and *album* on the locomotory system of *Daphnia magna* as a basis of physiological standardization of *veratrum*. This work has been corroborated, using the albino rat and the stethographone specially developed for this purpose.

Having used ultraviolet fluorescence successfully in the identification of crude drugs and extracts, C. P. Wimmer suggested the standardization of apparatus, method of observation and color terminology, and further research in this field.

L. C. Barail recommends the use of electronosmosis to disperse medicaments and greatly enhance their penetration into living matter. The current consists of very short waves of free electrons with a negative electric charge and is best applied in electro massage in contact with tissues.

SULFANILAMIDE, AMINOPYRINE, CINCHOPHEN AND NEOCINCHOPHEN.

The Food and Drug Administration of the U. S. Department of Agriculture has recently issued notices to distributors of the drugs mentioned above, expressing the opinion that Sulfanilamide and drug preparations containing it or related compounds, Aminopyrine and drug preparations containing it, Cinchophen and Neocinchophen, and drug preparations containing them, are actionable when found in Interstate Commerce under labeling which may result in their use by the general public, under Section 502(J) of the Federal Food, Drug and Cosmetic Act, which Section became effective when the Act was approved on June 25, 1938. These notices point out the dangerous potentialities of these drugs and preparations when distributed without proper control and advice.

PROPOSED REGULATIONS FOR THE ENFORCEMENT OF THE FEDERAL FOOD, DRUG AND COSMETIC ACT.

The U. S. Department of Agriculture has announced, under date of October 15th, proposed regulations for the purpose mentioned in the above heading. These regulations are announced for the purpose of an informal public hearing to be held at 10:00 A.M., November 17, 1938, at the Department of Agriculture, Washington, D. C.

It is stated that while public hearings are not required under the Act, the Department desires to have suggestions and constructive criticisms on the proposed regulations from consumers, interested industries and others, before the regulations are finally formulated for promulgation. Those who are unable to attend the hearing are invited to send their suggestions and constructive criticism by letter not later than November 24, 1938.

A copy of the proposed regulations may be obtained from the Department of Agriculture, Washington, D. C. They cover thirty-nine mimeographed pages and deal with practically every Section of the Federal Food, Drug and Cosmetic Act. They are intended to clarify the language of the Act itself and to indicate the interpretations officially put upon the language of the Act.
