States than would be granted to the citizens of the United States in the aliens' native lands.

In view of all of the foregoing, it is recommended that the American Pharmaceutical Association adopt the following resolutions:

*Resolved*, That the Committee on Education and Legislation is instructed to conduct a campaign having as its purpose the adoption of a uniform standard for pharmaceutic licensure throughout the United States: and that this standard shall, as a minimum, be a preliminary education equivalent to graduation from a standard high school, a pharmaceutic collegiate education of three years of eight months each, and correspondingly searching state board examinations.

*Resolved*, That the Committee on Education and Legislation of the American Pharmaceutical Association is instructed to conduct a campaign having as its end the establishment of a joint committee of the American Pharmaceutical Association and the American Medical Association, to examine applicants who desire to have the right to publish themselves and do business as certified analysts.

*Resolved*, That the Committee on Education and Legislation of the American Pharmaceutical Association is instructed to conduct a campaign having as its end the establishment of patent reciprocity between the United States and foreign countries, so that citizens of foreign countries shall be denied by the United States greater patent rights than the citizens of the United States would be granted by the respective foreign countries.

*Resolved*, That the American Pharmaceutical Association recommends to the Committee on Revision of the United States Pharmacopœia, that they shall issue a supplement to the Pharmacopœia, in which supplement there shall be set forth intelligibly the reason for each requirement of the Pharmacopœia, especially for the standards of purity and strength of the substances of the Pharmacopœia.

*Resolved*, That it is the sense of the American Pharmaceutical Association that in the traffic in drugs between the public and the retail druggists, the retail druggists are responsible to the public for the adherence of their vended Pharmacopœia and Formulary preparations to the established standards, and that the American Pharmaceutical Association recommends that pharmacists should individually or co-operatively subject all articles so vended to analytic inspection and control.

MEDICO-CHIRURGICAL COLLEGE OF PHILADELPHIA.

## THE PHARMACOPOFIA, THE PHARMACIST AND THE PHYSICIAN.

## E. GOODMAN, PH. G., M. D.

The experience of a lifetime in the field of pharmacy and medicine, convinces me that in the last decades, we have pursued a mistaken policy. The aim of pharmacists has been to haul the public in the same wagon with the physician, whereas each should have been carried in a separate vehicle.

The present relation of physicians and pharmacists is an anachronism. The inception of the Pharmacopœia was due to the needs of physicians, who at that time had little or no knowledge of chemistry, materia medica, pharmacognosy and therapeutics, but depended implicitly on the special training and learning of the pharmacists for the means of medication.

The outcome of this status was that the physicians and pharmacists got together, the physicians naming the remedies of their choice and the pharmacists elaborating ways and means to produce the most potent and palatable preparations from the crude drugs. The selected list of remedies was then assembled into a work and the sanction of the government obtained to make this work the established authority for all pharmacists, so that all the preparations in use by physicians might have an established standard of strength and quality. Therefore, the original design of the Pharmacopœia was—a *standard* for pharmacy and a *guidebook* for physicians.

This little work proved a stimulus for ambitious workers, who collected data relating to all crude drugs, compiled histories, commenced research work, established tests for identity, purity and strength, wrote up the therapeutic actions of medicines and their poisonous properties, and elaborated working formulæ for making the best and most dependable preparations.

The result was the U. S. Dispensatory, a partnership collaboration between physician and pharmacist. Wood and Bache, Stille and Maisch were the pioneers in this line of work.

But—this co-operative work gave to each the knowledge of the other and each began to use it for personal profit and usurped the prerogatives, one of the other. In time, we find the physician the principal research worker, and that a rival to the physician, sprang up in the person of the pharmaceutic manufacturer, who cut his rival, the pharmacist, out in the affections of the physician. So, in these times, it is the manufacturing chemist and pharmaceutic and biologic manufacturer, who furnishes the pharmacopœia for physicians, and not the pharmacists.

But another factor has also entered the field of therapeutics—the public. It, in turn, has absorbed the knowledge of the family physician, or been "put wise" by printed "family doctors" and the advertisements of proprietary medicine concerns. The pharmacist is therefore now compelled to take his orders from three sources, viz: the progressive physician, the conservative physician and the public and does a little on his own hook besides.

Progressive physicians are always on the lookout for something new and better and are continually changing their materia medica. They discard the older remedies and preparations for the latest. Tr. Iron, as a remedy for diphtheria, has in turn been displaced by papoid, by mercury bichloride, by Loeffler's Solution, by Tr. Iodine, and lastly by diphtheria antitoxin. Tr. Iron, as a chalybeate, has been displaced in turn, by the scale salts of iron, the peptonates and nucleates; the base, by manganese, copper and vanadium. Iron, as a haemostatic, has been displaced, in turn by calcium chloride, adrenalin hydrochloride and stypticin. Silver nitrate has been displaced by the nucleates and colloidal silver. Potassium, by sodium, strontium and oleaginous bases.

The conservative doctor is loath to let go of time tried remedies, which have stood him in good stead and still clings to his calomel, opium and bismuth, his galenicals and elixirs, his pills and powders, liniments and lotions, plasters and ointments.

The public exercises, in a ten fold greater degree, its prerogative of self-medication. It uses indiscriminately all the remedies it ever heard of, ranging from "old granny" household remedies to the latest synthetics, from homeopathics to narcotics and from patents to poisons. Antikamnia, aspirin, aloin, strychnine, belladonna pills, cascara aromatic, purgens tablets, galangal root, zedoary, catnip, ergot and hundreds of others, are ordered with a nonchalence and authority which are astounding. Now still a fourth factor has taken a hand in the vending of medicines and drugs and that is—the legislature. It orders what may and what may not be sold; by whom and to whom it may not be sold; for what purposes it may and for what purposes it may not be sold; in what strengths it may and may not be sold; how it must be labeled, how it must be registered and how it must stand the tests for purity and strength.

And the distraught druggist must stand as a buffer for all these various onslaughts. Can you blame him, then, if he demands a safeguard against each? He, no longer, must serve the old time doctor alone, but the new doctor, the insistent public and the fastidious legislature. Therefore, he desires an authoritative work, which shall include all the demands made upon him. If our government decrees to be a paternal government, it must be paternal not only to one class, but to all classes. The druggist must, therefore, have just as authoritative a formula for Godfrey's cordial, Dewee's carminative and Jackson's pectoral syrup, as for paregoric, laudanum or elixir heroin. He is just as much in need of complete information regarding galenicals, as he is of antitoxins, bacterins and vaccines.

On the other hand, physicians no longer care for pharmacopœial remedies, or the Pharmacopœia. They look to the laboratories, the manufacturers and the clinicians for their remedies. They no longer rely upon a fixed dose and certain result, but are guided by clinical and bedside experience. They have little use for the old time drug stores; they keep their armamentarium in their office or hospital; they dispense, as well as prescribe; they rely more on mechanical, hygienic and prophylactic treatment, than on medication.

Physicians and pharmacists having thus grown apart, each must look to his own wants. The pharmacist is a purveyor and must therefore be in a position to supply all his patrons; he is answerable to all classes of physicians, to the public and to the law and must therefore have the protecting influence of each—authority. Whereas the Pharmacopœia sufficed when he served only one master, now that he must serve three, nothing short of an abridged dispensatory will satisfy him.

On the other hand, the physician is the apostle of progress; he is ever striving to break away from old methods and remedies; he changes his materia medica to suit himself; he needs his own authority and the conservatives must follow in his wake, if they would maintain their professional standing and success. He wants nothing in common with the lay doctors, or quacks; he wants his own standard of quality. Therefore, a Pharmacopœia along old-time lines is no longer sufficient, for druggists and physicians no longer want to be bound to certain remedies for ten years. Practically, the result has already been accomplished and only lacks elaboration and the stamp of authority. A comprehensive formulary is a necessity and besides the formulæ, it should contain all the crude drugs in common use, with their official, botanical and common names; modes of identification, sophistications. methods of preservation and indications of deterioration. It should contain all the chemicals, oils and other preparations in common use with tests for identity, purity and strength, properties and uses. In fine, the future pharmacopœias should be abridged dispensatories, only the commercial history, botanical descriptions and therapeutic actions being eliminated.

The physicians have adopted as their standard the publications of the Council on Pharmacy and Chemistry of the A. M. A. So we find the divorce actually accomplished and only awaits the official sanction.