

Expensive containers are not essential, neatness and cleanliness and carefulness are far more important. An expensive prescription-bottle "Adorned" with an illegible handwritten label, made still more illegible by smeary blotting and thrown into as many folds as the modern full-dress shirt, by careless pasting is certainly not a thing of joy to behold.

Lastly—do not delay delivery. It is true the medicine may not have to be taken until bedtime, and here it is only 6 p. m., nevertheless, the patient or those caring for him or her are anxiously waiting for it. It is their anchor of hope, why keep them in suspense?

Summarizing: I might say that in advertising a prescription-department, follow the rules of all good advertising. "Have something worth while to talk about and then talk about it in a manner that is worth while."

DISCUSSION.

MR. JACKMAN:—"In my opinion the most effectual way is to call upon the physicians and exploit the preparations of your own manufacture. Show them your own preparations of Milk of Magnesia, Elixir of Lactated Pepsin and other preparations in which you take pride. Such detail-work pays better than any other form of advertising."

PROF. RAUBENHEIMER:—"Many methods have been suggested for advertising the prescription-department and much money can be spent foolishly without obtaining results. After all is said, it is the physician who will recommend your pharmacy or not for the preparation of his prescriptions. It is therefore necessary to convince them of the reliability, in fact of the superiority of your prescription-department. Advertise or preach to them your pure drugs and chemicals, your reliable preparations, your facilities and ability for manufacturing, your carefulness, conscientiousness and accuracy in the compounding of prescriptions, with no substitution. Have scrupulous cleanliness not only in your prescription-department but in your entire store. Above all do not advertise your prescription-department as being 'cheap.' Cheapness and good medicine are certainly incompatible. I take especial pride in having the reputation of being 'rather expensive on medicines.'"

MR. SCHULZE:—"I think one should modestly call the attention of the public to this department in your various advertisements. In the sale even of stamps we use an envelope about three inches long and one and three-quarters wide, upon which is printed an advertisement of our prescription-department. These are much appreciated when the stamps are not to be used immediately. We, also make window-displays of sick-room requisites among which we intersperse signs calling attention to this particular department."

MR. FERTÉ:—"We advertise mainly to the physicians, sending them circular letters made to appear personal. If this does not appeal to you, write to each of them a personal letter. Your advertising should be high-class, and odd printed matter. Conventional methods do not pay."

PROF. LASCOFF:—"To advertise my prescription-department, I employ the local paper, the church-bulletins, send out circulars and have window-displays, keeping always before the mind of the public that their prescriptions will be accurately dispensed and properly checked."

MR. GRAY:—"Advertise your prescription-department only to physicians. Call their attention to the quality of the drugs you use. Good prescription service is summed up in the following specifications:—A complete outfit of all necessary utensils for dispensing; a system calculated to prevent error; a knowledge of possible deteriorations of stock so as not to dispense any article of lessened or of no value and to be as expeditious as possible consistent with safety, for no one likes to wait long for anything, particularly for medicine."

Question 6:—What constitutes good prescription service?

WHAT CONSTITUTES GOOD PRESCRIPTION-SERVICE?

FRANKLIN M. APPLE, PHAR. D.

According to the definition, given by Webster, of the word service, it means "the performance of labor for the benefit of another, or at another's command;" also "duty performed in, or appropriate to, any office or charge."

With this definition of the word service accepted as correct, we will proceed to ascertain whom we serve when occupying the position of prescriptionists.

It will be admitted, universally, that we serve our patrons, for whose support we make earnest entreaties, so as to receive as a minimum reward for our services to them, an income sufficient to meet our daily wants.

Prescriptionists also occupy the *role* of servants or assistants to the medical practitioners, who write prescriptions for their patients' welfare; and it must not be overlooked that our services are rendered, automatically, to ourselves and those dependent upon us, in accordance with the character of the labors we perform.

The question is one not only concerning service, or prescription-service, but involves the quality of the service rendered, as note the language of the query: "What constitutes *good* prescription-service?"

To render good prescription-service it has been proven by the experiences of our forefathers, that the qualifications required in the ordinary walks of life to insure success as a result from satisfactory services rendered to society, are not sufficient to qualify one to properly fill the role of prescriptionist.

The education that the average merchant needs, must be re-inforced by education along special lines, coupled with a practical knowledge of the medicinal agents one is expected to handle, acquired by close contact with the same, thereby qualifying one to judge of their purity and quality.

A course of study in a first-class school of pharmacy is an absolutely essential qualification to render good prescription-service in these days of enlightenment and progression, and those days of study must be but the beginning of a life-long term of study and research in order to keep apace with the rapid progress that is being made in medication in various forms; and also to avoid being made the victim of any unscrupulous dealer, who would send out goods of inferior quality, depending upon an ingeniously worded label to release himself from liability of prosecution.

Watch very carefully the labels affixed to goods received, is a wise plan to follow, especially in regard to such goods as are not labeled as U. S. P. or N. F. standard.

The source of supply of one's goods should be most carefully decided upon, in defense of all of the parties one serves, as *quality* should be the most important consideration in assembling one's stock of drugs and all other materials in his establishment.

Having satisfied yourself of the quality of the goods received, it is essential to protect and preserve the same in accordance with the latest knowledge upon the subject, by providing therefor suitable containers and conditions of temperature and moisture that will prevent their deterioration.

One of the most vital factors in rendering good prescription-service to the public and to medical men, is the character of the clerks employed by you.

It is an absolute impossibility for a pharmacist to render a personal service at all times and at all hours to all his patrons, unless he has a very small business and makes a slave of himself, thereby jeopardizing his health and robbing his family and himself of all social life; hence, the human factor must be taken into consideration in the management of our prescription-department and the selection of an assistant is a most important duty to perform.

To have a well-qualified proprietor associate with himself a questionably-qualified clerk is a very unwise act, and I might even say, in some cases, a gross deception, which ultimately will be detected and bring its own reward.

One of the weakest spots in our pharmacy laws is that of the rights that are vested in the semi-prepared clerks, who are granted the privileges of a Q. A., when it is coupled with the broad interpretation of these rights that prevails in some states.

The rights and privileges granted to them in this state is a shame and a disgrace to a professional calling; and you cannot find their counterpart in any other professional walk of life. The rights and privileges they enjoy are the result of bowing down to the demands of commercial considerations at the expense of professional ones.

The candidates examined in this state are now given a more severe test than was the custom some years ago; but a clearer definition of their rights, and greater limitation of the same is essential to an improved prescription-service.

These are the days when the sign "Safety-First" is met with upon all sides, and it is one of the very important reminders that prescriptionists should keep constantly before themselves and their employees, so that when one might relax his vigilance and become somewhat unmindful of his responsibilities, he will have a never failing, untiring sentinel to remind him of his obligations.

The question of safety-first involves every move made in handling the prescription from the time of its receipt until its delivery to the home or the hands of the customer.

Ofttimes the safety-first principle can be attached to the container of the compounded prescription by affixing thereto appropriate labels or stickers; also by using appropriate, distinctive containers.

By the proper use of stickers one can notify the patient what precautions are necessary to properly preserve the medicine, thereby demonstrating one's knowledge of the properties of the same, which leads to a greater degree of confidence in one's ability as a compounder of drugs and prescriptions, with its beneficial results, financially.

In the selection of containers for the results of one's prescription compounding, evidences of care and thought upon this subject can be demonstrated practically, to the decided advantage of his customers. A second-class container for a first-class product is very poor business policy.

The evidences shown in the pharmacist's prescription-department of his knowledge concerning hygiene and bacteriology, will most assuredly leave a lasting impression upon those who have access thereto; and, if one demonstrates, by the location of his prescription-department, that it is an important part of his establishment, greater respect will be shown for it by the public, which includes the medical practitioners.

What may appear to some as a minor, unimportant point, in the conduct of their prescription-departments, is the question of observing the injunctions placed upon the prescription by the creator thereof—the physician.

I have gained and held the support of several medical practitioners, by always placing the copy of the prescription upon the label when so directed. The physicians argued that, if a druggist would leave off of the label the copy, he would

be quite likely to leave out of the prescription an ingredient that he might not have convenient or not in stock.

When serving the medical men as their agents or compounders we must not forget that they are the creators of the prescription, around which they have a perfect right to throw restrictions or safeguards, in their interest, or the interest of their patients. Our commercial interests are the last ones that can receive consideration, and, automatically, oftentimes are best served by respecting fully the instructions appearing upon the prescription.

If the medical adviser wishes to control his patient or observe the results of his prescribing, that is his privilege and, at times, his duty.

Prompt attention should be given to all work and it should not be delayed one minute by anything except by a most urgent call for an emergency necessity of more vital importance than the work in hand. No customer will object to such an act if the proper explanatory remarks are offered if they are needed.

We have now reached the point where, to my mind, the professional phase of prescription-service ends, and where the commercial side of the question presents itself.

The commercial side of this question cannot be divorced from the professional side, except where no charges are made for services and materials and where no expense of delivery are to be taken into consideration; but as we are not engaged in such charity work, from force of necessity we must take into consideration the Biblical statement—"the laborer is worthy of his hire,"—and collect from those whom we serve a recompense for materials supplied and services rendered.

When adjusting the same in an equitable manner the price should consist of the total, resulting from charges for services, plus that for materials supplied. This plan is not followed by some, apparently, judging from a controversy I had recently with a customer, who asserted that she was accustomed to having a prescription, calling for five ingredients, compounded for 50 cents, and one-half of the same for 25 cents. Needless to say, we did not fill one-half the quantity for her at her price, for reasons which we fully explained to her. Such compounders show an absolute lack of ability to intelligently price prescriptions and such action also raises in my mind a question as to the ability of the proprietor to properly compound it.

The delivery of compounded prescriptions by proper help, is of more import than is usually believed by proprietors, and it receives in many cases little thought.

The way to demonstrate claims for first-class goods, a first-class store, and first-class service, is to employ first-class employees from the porter to the prescription clerk, as that these will beget confidence for the unseen services rendered to society.

Where side lines are handled in a drug-store it is policy to have the quality of the same and the services rendered at these departments of such a standard that they will not indirectly injure the reputation of the prescription-department; and it is suicidal to neglect one's prescription work to give attention to side lines.

A library of reference books, volumes of the leading drug journals, which assuredly includes the Journal of the American Pharmaceutical Association, and

an assortment of price lists should be found in every first-class pharmacy—and their pages should show the earmarks of frequent usage.

Needless to say an assortment of proper apparatus should be in stock to carry out the processes that one will be called upon to oversee, for it is surprising how easily some processes can be carried out with the proper apparatus that are difficult to complete without them.

To summarize the whole question I will state that Quality, Safety-First, Equipment and Mentality are the prime essentials in giving good prescription-service.

DISCUSSION.

PROF. RAUBENHEIMER:—"Prescriptions should be compounded carefully and conscientiously and its ingredients, as well as the doses, should be properly checked. There is one item which is too frequently sadly neglected, and that is the prompt delivery of medicines. It should be borne in mind that the patient usually waits as long as he possibly can before he consults a physician and that consequently he is in need of the medicine almost immediately. I always insist upon the prompt delivery of all medicines."

MR. SCHULZE:—"I believe good prescription service consists in being properly equipped to fill prescriptions,—first, by having the proper materials, second, by having proper apparatus, third, by having properly-qualified men and fourth by dispensing prescriptions in as neat and attractive a manner as is possible."

MR. FERTÉ:—"Good prescription service consists in dispensing the prescription correctly and knowing your profession sufficiently to know that your work is right. Use the highest class of goods and dispensing conveniences, and have neatness in your work. Lastly use speed in the preparation of medicines required."

PROF. LASCOFF:—"To have good prescription service, the following rules should be observed:—

1. Sanitation. This means absolute cleanliness in all departments of the store.
2. Close attention and personal supervision by the proprietor.
3. Buying only drugs and chemicals of the best quality.
4. Courtesy and amiability to all patrons.
5. Avoidance of the 'Just as Good' habit and misrepresentation.
6. The proper standardization of drugs, chemicals and preparations therefrom.
7. Keeping the prescription department entirely separate from the store.
8. Last, and most important—A proper checking system in not alone the prescription, but all departments. In prescription work, a double system of checking is employed. Not only when the ingredients are measured or weighed, but on returning the bottles to the shelves, it is obligatory to check them once more."

Question 7:—What utensils and apparatus do you consider necessary for the prescription-department of the average pharmacy? What further equipment would be desirable?

DISCUSSION.

MR. FERTÉ:—"A druggist should have in his prescription-department, a complete assortment of metric and ordinary graduates, (not combinations), mortars of glass, wedgewood and porcelain; a scale sensitive to half a milligramme, one to weigh from one gramme to one hundred grammes; a tablet-machine, a suppository machine, (not one of the cheap cast-iron kind); spatulas of all kinds, steel, rubber and horn; an assortment of sieves, a pill-machine complete and glass slabs for ointments."

MR. SCHULZE:—"The essentials for the prescription-department are,—Three pair of scales for weighing the following maximum quantities, five grains, twenty grains and two ounces. Larger quantities to be weighed on the general dispensing scales. A full set of graduates including those of the metric system; complete sets of apothecaries and metric weights; mortars ranging from two ounces to one gallon in capacity; spatulas ranging from three to six inches and one or two putty knives; a pill-tiler, roller and paddle for rolling pills; an ointment-tiler; a tablet machine; an infusion-mug; a small glass stove or electric infusion-cup; a small microscope; glass stirring-rods, a suppository-mould; casserole or other dish for melting cocoa butter for suppositories, set of small evaporating dishes, small funnels for filtration; blue and red litmus paper and a Florentine flask."

MR. GRAY:—"I consider these things essential in a prescription-department:—One half-dozen mortars, a complete equipment of graduates, from sixty minims to thirty-two fluid ounces, apothecary's measure and from 5 c. c. to one litre in the metric system, an absolutely

dependable prescription scale with weights from one-half grain to two drachms and from five cg. to five grammes; a half-dozen glass funnels, graded sizes; three percolators of varying sizes; two burettes, a half-dozen Florence or Erlenmeyer flasks; a volumetric flask; two evaporating dishes; one casserole; a Bunsen-burner; three glass stirring rods; two beakers; two pipettes, twenty-five and fifty c. c.; a retort-stand; nest of test-tubes; a small file, a pill-tile, a half-dozen spatulas and a suppository-machine unless the pharmacist makes these by hand."

PROF. LASCOFF:—"As I stated in an address before this section previously, a pharmacist should be in the possession of the following apparatus:—Six mortars and pestles, (porcelain); two glass mortars with pestles, three porcelain evaporating dishes; six spatulas of different sizes, of metal and two horn or bone spatulas; half a dozen glass rods; one infusion-mug; one dozen graduates from one drachm to a quart; one dozen graduates from fifty cm. to one thousand cm.; one accurate base-scale, capable of weighing one grain or less; troy and metric weights from one grain to twelve ounces and from ten milligrams to one thousand grams; two separate poison-closets; two tablet-moulds, triturate and hypodermic; two Florentine flasks, two sieves, one copper water-bath, two percolators, funnels of differing sizes, supports, etc.; a microscope if possible, a sterilizer, a centrifuge if possible; a dozen test-tubes and a burette, and two hydrometers. He should have also a special closet holding the most important U. S. P. reagents, an outfit for urinalysis and the Pharmacopœia, National Formulary and other reference books."

Question 8:—How far may a druggist go in marketing his own preparations, without usurping the rights of physicians or becoming unethical? Would there be any difference, ethically, in marketing preparations made by the druggist or those made by some coöperative organization to which he belongs? Would there be any difference from the same standpoint between preparations of such a coöperative organization and any regular patent-medicine manufacturer?

DISCUSSION.

PROF. RAUBENHEIMER:—"I could never understand why objection should be made to a pharmacist manufacturing and marketing his own preparations, especially the simple household remedies. There is a constant demand for these by the American public and the pharmacist who does not cater to that demand loses prestige and revenue. Why should these simple household remedies that are daily called for interfere with the practice of the physician? Of course it is understood that such remedies should be entirely free from habit-forming or narcotic drugs. Above all it is the pharmacist's duty and his birthright to manufacture these medicines himself, and he should boldly state that fact of his making them upon the label. The pharmacist who himself makes these preparations will undoubtedly gain a reputation, not only in his own locality but also farther away from home."

MR. SCHULZE:—"There is no difference in selling preparations, the formula of which is known to the manufacturer only. But there is a difference in marketing the official preparations put up in acceptable packages to meet the demand for household preparations. This is a demand which will continue as long as mankind suffers from coughs, colds, constipation, indigestion, etc., and believe that they are competent to treat themselves. If the pharmacist is wise he will try to induce such people to interview a physician, especially if they return for the preparation of a prescription. It is not always possible to get them to go to a physician, but if it is known that you are giving that advice, physicians will be better satisfied."

MR. GRAY:—"I think a pharmacist may properly recommend his own preparations in all cases where the customer specifies the purpose for which he wants a remedy. As long as he does not diagnose the case he is on the right side. In cases of a specific nature, he should certainly advise the patient to call upon a physician. So far as to marketing coöperative preparations, I would say that, in my opinion, there would be no difference, ethically, in marketing his own preparations or those of a coöperative company provided that one knows the materials of which they are composed."

PROF. LASCOFF:—"It is positively essential for a pharmacist to put up his own preparations, and, in order to be strictly ethical, these should be some of the official preparations, such as Syrup Hypophosphites Co., Beef, Iron and Wine, a good laxative syrup and tablets, cough syrups without opiates, etc., etc. I do not believe that any physician would object to this. One of the great advantages of this practice is that your name is on the preparations and the profit is much greater."

MR. APPLE:—"In the sale of such preparations over the counter it would be inadvisable to use the official titles on the labels, otherwise the people would soon be informed as to their designations and perhaps purchase on their own initiative."

Question 9:—What do you think of tinctures made by diluting fluid extracts?

Should formulas for making tinctures in this way be given on fluid extract bottles?

DISCUSSION.

MR. OSSEWARD:—"I think we should be honest and if we use preparations made from fluid extracts we should call them diluted fluid extracts."

DR. SAYRE:—"We find among the samples collected in Kansas, that preparations made from fluid extracts do not attain the standard required."

MR. NITARDY:—"To my mind, tinctures should not be prepared from fluid extracts, but they should be always made according to the U. S. P. or N. F. The last percolate should always be tested for alkaloidal reaction after the proper amount of the menstruum is used."

PROF. LASCOFF:—"I am absolutely opposed to making tinctures by the dilution of fluid extracts. We should follow the official methods in every way. And as that manner of making tinctures is not official, no formulae should be printed on the labels of fluid extracts for the manufacture of tinctures in this way for such a practice tends to lead the profession away from the true standards and methods."

MR. GRAY:—"I think it perfectly proper to make tinctures from fluid extracts or from powdered extracts that are standardized. There is the saving in freight and in containers and it gives the pharmacist a little part in the work when he cannot afford to assay his own tinctures. It is a matter of indifference as to official tinctures whether the formula is printed on the label or not, but it might be well to print such formulas on non-official fluid extracts."

MR. SCHULZE:—"Tinctures made from fluid extracts do not have the appearance of official tinctures and their physiological effect is often different. I think, therefore, that no formulas of such character should be placed on fluid extracts. The practice of making tinctures from concentrates only proceeds from and assist to increase the laziness of pharmacists and their assistants."

MR. FERTÉ:—"If the tincture and the fluid extract are made with the same menstruum,—ginger for example,—and the fluid extract is not saturated or super-saturated with extractive matter it is proper to use the fluid extract to make a tincture; not otherwise. Couch Grass is another example. Fluid Extract of Couch Grass is simply an infusion preserved, and it is proper to make a diluted infusion from the concentrate. But this is not the case with Digitalis."

PROF. RAUBENHEIMER:—"The practice of printing formulas for making tinctures from fluid extracts should be condemned for the making of such tinctures is bad pharmacy. Fluid extracts are very frequently made by using an entirely different menstruum from that employed in making the tinctures of the same drug."

Question 10:—What are the essential qualities of a good cold cream? Of a good hand lotion? Can you offer a formula embodying these qualities?

DISCUSSION.

MR. GRAY:—"The essentials of a formula for cold cream depend upon whether you desire it to be absorbent or non-absorbent. If you desire it to be absorbed you must use a vegetable oil. But if not use mineral oil. In all cases the ingredients must be thoroughly incorporated. I present two formulas which I think will be found to produce superior products.

Absorbent Cream.

Oil of peach-kernels	8 ounces
White wax.....	1 ounce
Spermaceti	1 ounce
Water	2 2/3 ounces
Borax	5 grains
Oil of Rose.....	25 minims
Oil of Patchouli	1 minim
Mix sec. art.	

Dissolve the wax in the oil, use gentle heat or preferably a water-bath. When the wax is dissolved, add the water, previously heated, and in which the borax has been dissolved, slowly, constantly stirring with an egg-beater. When cold, add the perfume oils.

"Non-absorbent, but nicer in appearance, is the product produced by using the following formula:—

Theatrical Cream.

White Russian Paraffin Oil.....	8 ounces
Ceresin and White Wax of each.....	2 ounces
Water	3 and one-fourth ounces
Borax	5 grains
Oil of Rose.....	25 minims
Oil of Patchouli	1 minim

Proceed as in the former formula.

Any cheaper odor may be used, such as Almond, Orange Flower or Synthetic Rose.

Hand lotions should have emollient properties, be thick yet easily absorbed or dried on the hands, with a pleasing odor and appearance. Here is a formula which I have found to give great satisfaction:

Powdered Tragacanth	1½ ounces
Alcohol	16 ounces
Glycerine	8 ounces
Benzaldehyde60 minims
Oil of Lavender flowers	20 minims

Mix thoroughly, and add quickly water enough to make one gallon."

PROF. LASCOFF:—"The essential qualities of a good cold cream are to use pure ingredients, which have a pleasant odor and are bland. The following formula was given to me about fifteen years ago and I have been very successful in its use, receiving quite a demand for the product.

Cold Cream.

White Wax	12 and a half ounces
Paraffin Oil48 ounces
Distilled Water	24 ounces
Borax	6 drachms
Oil of Rose	q. s.

"For dispensing purposes however the formula of the Pharmacopœia should be used and nothing else. For a good hand-lotion, Glycerine and Rose Water, with Tincture of Benzoin is the best. A good formula was suggested by Dr. Apple, of Philadelphia, printed in the Proceedings of the A. Ph. A."

PROF. RAUBENHEIMER:—"The official formula for Ointment of Rose Water can be modified into a Theatrical Cold Cream by using Paraffin Oil in place of the oil of almonds. The cold cream produced by use of this process has the great advantage of keeping perfectly without change. There is consequently a large demand for such a preparation."

MR. FERTÉ:—"I would ask another question in reply to this query,—Is any Cold Cream particularly good? The one that sells is good. There are so many 'good' formulas available that I think it not necessary to discuss them. 'A good all-around hand and face lotion is thin quince mucilage with a small amount of glycerin, alcohol, benzoin, menthol and some antiseptic and perfume.'"

MR. NITARDY:—"The whole secret of the keeping quality of cold cream is in the proper balance of the ingredients of which it is prepared. A small amount of stearin is of advantage I have found."

MR. OSSEWARD:—"The jars in which the cold cream is placed should be warmed before they are filled, to about the same temperature as the cream, to prevent its contraction from the sides of the receptacle. If this is done this trouble will be avoided."

PROF. RAUBENHEIMER:—"It is also absolutely necessary that the oil and the water should be of like temperature before they are incorporated."

Question 11:—What argument have you in favor of the retail druggist making his own tinctures, syrups, elixirs and other simple pharmaceuticals? Have you any arguments against this practice?

SHOULD THE RETAIL DRUGGIST MAKE HIS OWN PREPARATIONS?

HOMER C. WASHBURN, PH. C.

To what extent the retail druggist should engage in the manufacture of his own preparations, such as tinctures, syrups, elixirs and other simple pharmaceuticals, is a question that has been much discussed, *pro* and *con*, but which, I believe, is still a live and debatable one.

In considering a subject of this kind, it may be well to note the changes in economic and sociological conditions, which must be held responsible, to a large extent, for much of the business and commercial "status quo" of the present time.

Going back in the history of pharmacy, we find that the druggist, or apothecary, originally made all the preparations and medicines he supplied for the cure or