

# THE DEPARTMENT OF THE AMERICAN CONFERENCE OF PHARMACEUTICAL FACULTIES

[**EDITOR'S NOTE.**—Last year there was published in the Conference Section a number of articles by prominent educators which had to do with the equipment and use of a Pharmacy Library. One article was by Dr. H. V. Arny and was descriptive of the Library of the College of Pharmacy of the City of New York. In the present number of the *JOURNAL* the same author tells in a scholarly way the actual working of that library. If the same effort should be made in every institution teaching pharmacy, it would mean a new era for cultural and scientific pharmacy. The paper is very timely, following that of Doctor Kremers in last month's issue.

Since the World War, no one problem has aroused greater widespread interest in educational circles than the various mental tests which have been devised to test the intelligence of an individual. The practical value of such tests has been an object of study in the College of Pharmacy of the University of Michigan, where these tests have been used for a number of years. The Editor requested Professor W. J. McGill of the Michigan faculty to briefly describe the results obtained at that institution. They are presented herewith.

R. A. LYMAN, *Chairman and Conference Editor.*]

## THE SERVICE FEATURES OF A COLLEGE OF PHARMACY LIBRARY.

BY H. V. ARNY.

During the past year, Chairman Lyman and Editor Eberle published in the *A. Ph. A. Journal* a paper written in 1914 about the library of the College of Pharmacy of which I have the honor of being librarian.

It is, therefore, unnecessary at this time to discuss the make-up of a good college of pharmacy library since that was the subject of the paper just mentioned. At this time I deem it a privilege to outline how a dead collection of books may become a living factor in the life not only of the college of pharmacy but also of all of those in the community who are interested in pharmaceutical subjects.

Those of us who have passed the half-century mark will recall some of the libraries of our boyhood when the books were apparently bought to be catalogued rather than to be used. I remember a certain library in a southern city where a chum and myself met our tutor for our German lesson, since it was such a quiet unfrequented place. We three sat at a table in one corner of the room and on the other side of the room at her desk sat the librarian, the relict of a much-beloved clergyman, chatting with some old friend as they did the "fancy work" in vogue in those days.

What a difference between this scene and the busy library of to-day with its corps of helpers more desirous of serving visitors than is the best salesman in a popular store.

In the same way, the college of pharmacy library of to-day should be a place where books are used rather than stored and with this thought in mind the following service features have been developed during the past decade.

### INFORMATION BUREAU.

All of us pharmacy teachers have had the opportunity of helping our friends in the drug business by giving information on out-of-the-way subjects relating to pharmacy. This idea we have capitalized into a definite bureau which can best be outlined by the following clipping taken from our college announcement.

The information bureau conducted by the library staff is designed to furnish pharmacists with data required in emergencies and not available in the library of

the average drug store. During the past years of operation the Bureau has met with gratifying success, and is steadily growing in popularity.

The following paragraphs explain the methods employed in conducting the service:

1. Telephone inquiries will be answered cheerfully without charge. Residents of greater New York or vicinity wishing to inquire about some pharmaceutical problem will ring up the Information Bureau, Columbus 0117, and will obtain information immediately, if same is accessible.

2. Non-residents will have their problems answered by mail if they enclose a self-addressed stamped envelope.

3. Problems requiring extended research will be handled for a fee as moderate as consistent with high-grade service.

4. Translations of articles from foreign languages, either in full or in abstract, as well as transcripts of papers appearing in English or American pharmaceutical, chemical or botanical periodicals will be prepared for those desiring to pay for such service.

5. As in the past, all visitors to the library, desiring to do their own research work, will be given courteous attention.

This proposition was a success from the start and scarcely a day passes without queries. Most of these can be easily answered but there is a small percentage that remain unsolved. An amazing variety of queries come in. Most of them relate to recipes for foreign preparations, a large number concern new remedies, an almost equal number concern botanicals and some inquire as to technical recipes. In the latter case, we have to use some *finesse* in differentiating between the honest querist whom we can serve without much cost to ourselves and those who wish to get information worth hundreds of dollars for the price of a postage stamp. Legal queries are frequent but since our library is primarily scientific such queries are usually referred to other sources. Of great interest is it to note the source of the queries in so large a city as New York. During the war, members of foreign war missions used to consult us, as well as the medical branches of our government. Of course, the retail druggists constitute the major part of the querists, but "our friends down town," the wholesalers, brokers and manufacturers, find our service of much value.

#### SUBJECT INDEX FILE.

Shortly after the information bureau was organized it became apparent that the technically trained man was not always at hand to answer queries and that it was highly advisable to arrange matters so that in emergencies, the assistant librarian trained in library practice but not in pharmacal sciences, could answer many routine questions. With this in view there was started in 1916 a subject index on pharmacy. We purchased an 8-drawer vertical unit cabinet (L. B. 8010) and had the folders numbered 1 to 1000. Then instead of starting a card index we took the index of my book on pharmacy (which comprises about 1000 pages) and pasted it in a loose-leafed index book a column on each page. (The book was shown when the paper was read—EDITOR.) In this way we had a ready-made index of fairly comprehensive scope with an abundance of space in which new annotations could be made in the proper alphabetical order. From the time the plan was started clippings, bibliographical references and other data have been filed in the appropriate folio; until now a rather respectable subject index has been established and to this the assistant librarian first turns when queries come in. Eventually, if the work is systematically continued the subject index file will be of the utmost value. This simple plan of filing has proved so useful and practical

that I feel that the idea should be passed along. Were I starting anew the only changes I would make would be to purchase originally a filing cabinet of 2000 folios and to use as its index, the index of one of the dispensaries as more comprehensive than my book. Of course in using this file, the page number in the index becomes the number of the folder in which the data concerning the subject are filed.

#### INDEX OF NEW REMEDIES.

New remedies with coined names are so numerous that these have to be treated as a separate subject. There are at present two comprehensive lists of new remedies in English that are published annually, the list which has been a feature of the Proceedings of the New York State Pharmaceutical Association for over 20 years and the list in the A. PH. A. YEAR BOOK, both of which have been prepared during the past five years by the same person. Either of these lists is cut into individual slips and each slip describing one coined name preparation, is pasted upon an ordinary index card and filed. In this way in our library card index of new remedies we now have several thousand descriptive cards and the list is growing at the rate of 500 to 600 a year. Whenever the query comes concerning a coined name preparation we first turn to our card index. Of course it would be a neater job to have our information typed upon the cards instead of carried on a pasted slip, but having no typist at the disposal of our library we find that we can keep our index up to date by the simple expedient of having one of our assistants spend a day or so each year pasting upon the index cards the slips cut from each annual list of new remedies.

#### COMMERCIAL BIBLIOGRAPHICAL WORK.

In the announcement of our library service given above it is to be noticed that we are prepared to do extended bibliographical work for an appropriate fee, this type of work being done with a rare degree of skill by our assistant librarian. This work, however, is rarely profitable as the rates charged by other bibliographical agencies are not in our opinion commensurate with the services that should be rendered. However, quite a number of interesting bibliographies have emanated from our library since this branch of service has been inaugurated. This suggests the possibility of coöperative work by colleges of pharmacy along these lines. Such bibliographical work is rarely confidential; if it must be confidential a quadruple fee should be charged. Since it is not confidential the same set should be available to future clients for the proper fee at the simple expense of a second typing. It might be well for the several libraries of the Conference to keep a list of available bibliographies on technical subjects and when requests come in to refer the prospective client to the person who has already prepared such a bibliography.

#### FACULTIES FOR PRIVATE BIBLIOGRAPHICAL WORK.

It is obvious that our library is available to all desiring to do bibliographical research on their own account and we have many persons using our library besides the members of our faculty. While we have no hard and fast rule on the subject we discourage the borrowing of books and journals, except by members of the faculty. This we do primarily because it has so frequently happened in the past that the very journal desired by a visitor would be the one that we had loaned out.

#### CULTURAL FEATURES.

There are so many phases of this topic that a complete paper could be written concerning the cultural possibilities of a college or pharmacy library. Foremost is the historic side consisting (a) of the collection of rare books on pharmacy, (b) of

the study of historic pharmacy. As to the first every college of pharmacy should secure all of the bibliographical treasures of pharmacy that it is possible to get. In our own library largely due to the efforts of Dr. Charles Rice when he was our librarian, we have a beautiful collection of medical and pharmaceutical works of the early days of printing. Some of these choice volumes are always on exhibit in a handsome show case in the library and others are preserved under lock and key. As to historical research, our assistant librarian, an accomplished classical scholar, has published a number of historical papers. But of course when we discuss this topic we intuitively think of the work of Dr. Kremers and his pupils as the best illustrations of the possibilities of historic pharmacy.

Then there is that interesting topic, "The Pharmacist in Literature," and our assistant librarian with the generous coöperation of one of our trustees is collecting for our shelves, those books in which the pharmacist is among the *dramatis personae*.

Then there are possibilities of pharmaceutical collections and exhibits. Some few years since, we had a very comprehensive exhibition of mortars arranged by our former treasurer, Dr. Horatio N. Fraser, an exhibition that was not only an artistic success but one that gave a dozen of the mortars exhibited a permanent home in our library. An exhibit of drug jars has been talked of but as such exhibitions mean much work and responsibility and as our modest library staff has its hands quite full already, the project has not been called into being.

Then there are possibilities as to collection of pharmaceutical tokens and medals, a fascinating subject upon which we have merely scratched; again by reason of lack of help. And after all, when a library goes very far into such lines it becomes a museum rather than a library.

#### INSTRUCTION IN PHARMACEUTICAL BIBLIOGRAPHY.

It is known to all of us who have gone through the experience that there is a vast difference between having a library to use and knowing how to use it. With the idea of training our students how to use our library in 1913 I began a simple course of this character by utilizing some 5 or 6 hours from a lecture course in showing our advanced students what our library held and how to use the material at hand. This course has developed from this simple beginning into a 32-hour course (one hour a week) in bibliographical practice. This is a regular course in our third-year syllabus and may be roughly divided into the following outline.

- (a) Five hours of lectures on our library, its source books, its journals and its year books and encyclopedias and how to use these.
- (b) Some five hours of practice in abstracting from known sources. That is, the student is given a blank sheet of paper bearing at the top the author, subject and page reference and is told to read the article and prepare an abstract.
- (c) Some five hours are given to more intricate bibliographical work. That is, the student is told that a certain article by Blank was published in a certain journal between, let us say, 1880 and 1890. With this cue the student is to hunt up the article and prepare the abstract.
- (d) Some ten hours are then given to real bibliographical research. Each student is requested to suggest a topic in which he or she is especially interested and is then started on the proper source books or general indices in search of papers bearing on the subject. To those who do not have a subject to suggest some special topic is assigned.
- (e) The remainder of the 32 hours are employed as opportune hours scattered through the year for conferences when the progress of the work done up to that time is outlined to the entire class.

The response to this course on the part of the students has been extremely gratifying. In the first years there were some who thought the course was an opportunity for slacking; but a resolution of the faculty that the bibliography course was to be considered in the same light as a laboratory course brought a stop to such notions. In fact, now, most of those taking the course, of their own volition, devote quite a number of spare hours outside of the official library periods in their bibliographical work. Incidentally while rigid quotas are out of the question in a subject like bibliographical work, there is set each year a minimum of abstracts that must be handed in. Some of the work done has been of excellent character, as attested to by specimen abstracts submitted herewith. Particularly noteworthy have been some of the bibliographies prepared on special topics of the students' own choosing. During the past year, for example, one student studied the bibliography of casein plastics; another the production of citric acid from sugar by use of proper cryptogams; while another prepared an excellent summary of attempts to synthesize sucrose.

#### CONCLUSION.

The foregoing indicates that our library is a very busy place and that it yields our college ample dividends in the form of service rendered.

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## THE APPLICATION OF INTELLIGENCE TESTS IN THE COLLEGE OF PHARMACY, UNIVERSITY OF MICHIGAN.

BY WILLIAM JAMES MCGILL.

The use of methods designed to determine the intelligence of an individual by a few short and simple tests has recently been the subject of much discussion. Such methods, variously termed mental tests, psychological tests, or intelligence tests, are now commonly employed in educational and industrial organizations for classifying the individual and determining, in the case of the educational institution, whether or not the student is able to take advantage of the opportunities offered him, and, in the case of the industry, what niche the worker is particularly fitted to occupy.

The indiscriminate and unintelligent application of such tests has been attacked in numerous magazine articles, one in particular having recently appeared in the *Century*. They have also been criticized by many psychologists, who decry the too enthusiastic claims of "intelligence" test advocates, some of whom seem to believe that it is quite possible to determine the resourcefulness and the general reaction of an individual to his surroundings or his opportunities by such methods. But it cannot be denied that these tests do give a certain amount of information, valuable chiefly as a confirmation of more direct observations upon the subject of the test.

All of us interested in teaching have been confronted at one time or another by the necessity, out of fairness to the individual himself, of determining whether a certain student is delinquent in his work because he is lazy, or because his living conditions or other outside influences make it impossible for him to study properly, or whether he is mentally incapable of doing the work required of him. One may be quite sure in which one of these three classes the delinquent student belongs, and yet would welcome additional evidence to support or contradict this opinion.