

Pharmacist



Acquiring a pharmacy background and learning laboratory techniques at the same time, Sandra DeLashaw seals a capillary tube of oil of orange.

ADDITIONAL requirements and courses and time to professional schooling is becoming the accepted trend in nearly every field—more training for a more complex world. Pharmacy is one of the last of the health professions—medicine, nursing, dentistry and related areas—to strengthen its educational program by increasing study time to include both a more general education and an opportunity for specialization.

The University of Oklahoma College of Pharmacy is falling into step with the times this spring by discarding its four-year study program in favor of a more realistic five-year curriculum.

Pharmacy's dean, Dr. Ralph W. Clark, has been preparing for the additional year since 1954. "Advancement of knowledge through longer general and scientific education has been accepted nationally in other health fields," he explained. "It has been responsible for unbelievable discoveries including new drugs and better training of people to fulfill their mission in a community.

"Pharmaceutical education is no exception. It, too, must be improved, which means a more comprehensive, more com-

plete course and one additional year in which to implement it."

For the last 20 years, the basic pharmacy training has been three years. It will probably remain so. The additional two years is aimed at rounding out the education, both in the fields which aid the pharmacist to be a responsible individual in his community and in a thorough grounding of the basic sciences.

What has changed in pharmaceutical education is the emphasis—from the preparation of medications toward pharmacology (the action of drugs of living tissues).

The self-educated man in pharmacy, as in many other professions, has faded from the picture. A larger number of pre-packaged medicines has removed the "manual" aspect from pharmacy. The modern pharmacist does not work so much with his hands as with his head.

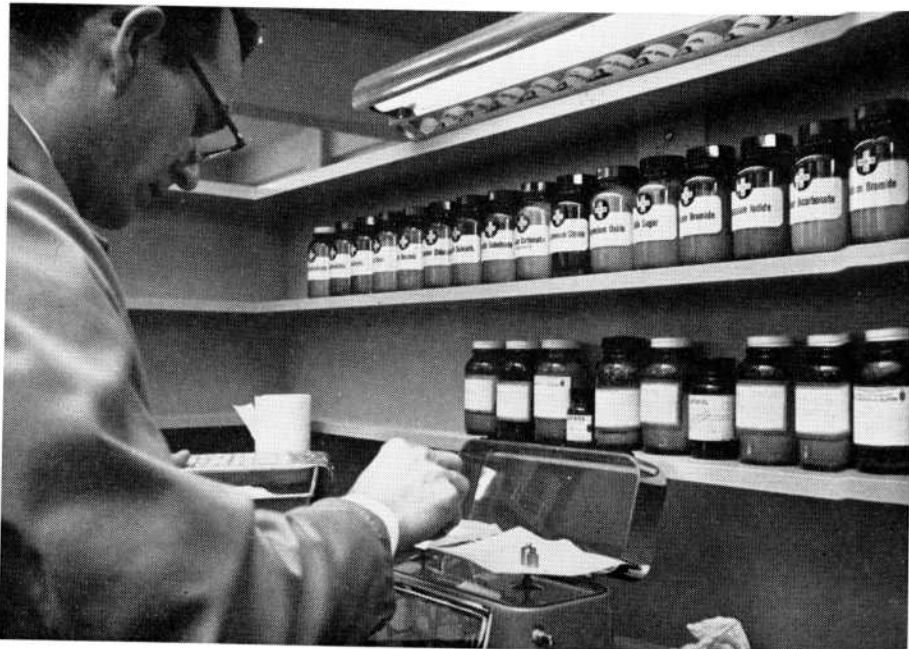
The increased length of the pharmacy curriculum is designed to help the pharmacist make adjustments and solve problems in science, public health, public relations and business. Through new courses, such as emergency pharmacy, which is an addition to the O.U. curriculum, the pharmacist learns skills, such as first aid, which makes him indispensable in time of disaster.

The modern pharmacist fills a dual role in society—as a consultant to doctor and to patient.

To the doctor, he is an expert on drugs. Almost 400 new drugs appear on the market each year. The medical man has difficulty in keeping up with them in addition to all the new developments in his own specialty.

But to the pharmacist, the primary concern lies with keeping up with new drug developments. He must be prepared with the latest information on drugs and their uses. He must be a medicinal depot for the doctor. He must stock the correct drugs under the proper conditions.

"Purchasing, stocking and dispensing the right number of the new, potent medicines, in the right condition, to the right patient, in the right form, in the right dose, and at the right time calls for more and more knowledge of the product—if phar-



Filling prescriptions is a delicate art, Miller Maddox discovers. In a model drug store setup in the College of Pharmacy he is weighing out drugs for a customer's order on a torsion balance.

Take Five

'60

macists are to continue to be doctors' consultants and to gain more favor with the public," Dean Clark contends.

As a service to the public, the pharmacist can give valuable warnings about keeping medicine away from children, about disposing of expired drugs, about taking only the correct dosage.

The pharmacist is not qualified to diagnose and dispense. The only medical advice he should offer is a visit to the doctor. Prescribing over the counter has never been within his authority.

A basic responsibility of pharmacy colleges is to develop within its graduates the professional ethics which put integrity as an expert on drugs ahead of profit. The responsibility of the pharmacist lies in protecting the patient and instructing him in the use of medicines.

Dean Clark feels that the biggest problem of professional pharmacy is in keeping up with what's new in the field. To meet this challenge, O.U. College of Pharmacy is attempting to instill a desire in the pharmacy graduate for continuing professional growth. "Continuing education is another professional responsibility," Dean Clark emphasized.

The retail pharmacist is faced with a new drug a day. Pressed by business and commercial problems, evaluation of each drug may be difficult. The large number of distributors of mass-sale drugs has reversed the style of the drugstore—back to the prescription shops, where the pharmacist sells only drugs and medications, rather than attempting to operate a neighborhood department store.

Colleges of pharmacy are trying to draw their graduates back to the classrooms with special seminars and field lectures as refresher courses. The pharmaceutical industry sends out vast amounts of educational literature (usually written by doctors and approved by the food and drug administration) to inform the pharmacist of new developments.

As for any radical changes in O.U.'s program under the extended curriculum, Dean Clark envisions none. "Going from the four to the five-year curriculum may not

cause nearly so much change in the use of the student's time as may have been anticipated," he said.

"We are arriving at a more realistic credit load per semester so that students may expect to earn their degrees in five years."

Dean Clark points out that not one of the 34 graduates of 1959 had completed the present curriculum in the prescribed eight semesters.

The five-year program at O.U. is part of a nation-wide move to five-year pharmaceutical education. All 75 colleges of pharmacy, as accredited by the American Council on Pharmaceutical Education, will switch to the five-year program by this year. However, the change will be gradual, affecting only the freshman class of 1960. The last group of four-year pharmacists will be graduated in 1963.

The new program has also been approved by the American Pharmaceutical Association and the National Association of Boards of Pharmacy. State boards of pharmacy, the licensing agencies, have also begun to require a minimum five-year college edu-

Continued on Page 24



Studying the origins of natural drugs, Milton Moudy and Joe Sylvester make a pectin powder from citrus peels in pharmacognosy laboratory.



In pharmacology lab Ildiko Karikas works with live subjects testing the effects of drugs on tissues. Here, after administering a local anesthetic, she examines a rabbit checking for a cornea reflex.

COED COUNSELORS

Continued from Page 8

percentage of their time is absorbed by discipline.

As they see it, their major job is to win the confidence of their girls and help them make the transition from high school to college.

The real icebreaker comes within the first two weeks after a semester's start when each counselor squeezes in at least an hour's private talk with each girl. She finds out the girl's background, her weak points, her strong ones and prepares an individual folder on her.

As the semester continues, a major portion of her time will be devoted to counseling on study problems. At the fourth week of the semester, the counselor talks with every girl who received an unsatisfactory grade.

All of these interviews and counseling sessions take time and lots of it, but the counselor's job doesn't end with the talk. She reports to Miss Angerman on the scholastic situation of each girl who is doing poorly and her approach to the girl's problem receives thorough study by the assistant director.

Some of the problems faced by counselors are more serious than shyness, homesickness or scholastic difficulties. Occasionally there is a coed with a serious maladjustment. This is when the counselor counts herself out and calls in expert help.

There is a major reason for close supervision by Miss Angerman. A counselor can help with the usual adjustments. She can advise on boys and dates and studies. She cannot tamper with the truly disturbed. Miss Angerman, with a backlog of experience in personal relations, studies carefully the reports of counselors on problem coeds and keeps a close tab on their progress in the weekly conference. When real trouble flares, expert help is called in immediately, ranging from doctors to psychologists.

Although counselors give first place to setting up a working relationship between themselves and their charges, this is not all of their job by a long shot.

According to the rule book, theirs is a half-time job, but most find it a full-time concern. Either the counselor or her assistant must be on duty in the house at all times, which means setting up and sticking to a complicated schedule.

One weekend each month the assistant counselor assumes full responsibility while the counselor takes her "free weekend." The assistant counselor also receives one free weekend a month. They are advised to leave thoughts of their houses behind them

on that weekend. The philosophy behind the rule is that each must have a break from her responsibilities regularly or the job will overwhelm them.

The counselor is responsible for knowing where each coed is after closing hours. Then she must check to make sure that all have returned who were out by special permission. Every evening, too, she makes one or two checks of every room during study hall to be sure decorum is maintained.

Three times a week the counselor appears for "cafeteria duty." She takes up her stance in the Cate Center cafeteria to make sure order is maintained and that the girls are dressed properly.

At least once, and likely twice a week, each counselor at unspecified times checks the rooms of her coeds for cleanliness and order. Once every seven weeks the counselor will serve as a hostess in the Cate Center Lounge where coeds and their dates gather on weekends.

Organization and maintenance of house services is another time-consuming duty of the counselor. She sets up a routine for mail service, the taking of messages for house occupants and telephone duty by residents.

The maintenance of information files sounds innocuous but it is another time-consumer. The counselor keeps files containing the telephone number of each coed, the house register, a room chart, schedule cards, weekend permissions from parents, sign-out cards, a list of those receiving special permissions, lateness reports, disciplinary actions and personal data.

And just so the counselor won't be overwhelmed with free time on her hands, there are those periodic surveys and reports on everything from the condition of house equipment, such as ironing boards and mops, to the number of keys lost by students.

As might well be imagined, a counselor's work can pretty well put a crimp in her social life. Somehow or other, however, most of the counselors do have time for dates, even if not very much time. One vivacious house director, newly engaged, contents herself with a brief glimpse of her fiance after her 10 o'clock class on Monday, Wednesday and Friday, a five-minute phone call every night and dates on the weekend nights when the assistant counselor is on duty.

But no matter what the sacrifice, in time, effort and social life, the counselors apparently love every minute of it. From one end of Cate Center to the other, every counselor would detail her woes, glance despairingly at her books, then launch into a glowing account of how wonderful it is to be a counselor.

PHARMACISTS TAKE FIVE

Continued from Page 13

caution. About 20 colleges have already put the lengthened curriculum into effect.

Oklahoma's plan will be established on the basis of one year of pre-pharmacy courses and four years of professional courses, fitting neatly into O.U.'s University College set-up, where every freshman spends his first year or more taking general liberal arts courses.

However, a program with two years of general courses and three years professional study will also be possible at O.U. This system facilitates the transfer of students from junior colleges and other schools.

Dean Clark is quick to point out the merit in both approaches to the five-year plan. "Personal contact with many state college officials emphasizes that a curriculum consisting of two years of pre-pharmacy plus three years of professional training is desirable. It has been planned to appeal to students who may transfer to the O.U. College of Pharmacy.

"Recent experience indicates general approval of the two-and-three program by Oklahoma college officials and advisers. Because of the internal operation of O.U., students here may qualify to enter the College of Pharmacy for four years after one year in the University College."

Dean Clark believes the new system has advantages to the University as well as to the students themselves. "The improved five-year program makes for greater flexibility in the use of facilities, faculty and the scheduling of classes," he explains.

Enrolment in the College of Pharmacy has increased almost 70 per cent in the last five years—from 84 in 1955-56 to 142 students this year.

The new curriculum at O.U. will add 24 credits for a 160 total for the 10 semesters, bringing the semester load down to 16 class hours a week plus laboratory time as compared to 17 plus under the old system.

Most of the changes within the College of Pharmacy will consist of rearranging courses and the addition of physical and emergency pharmacy. Basic courses in speech and either accounting or economics have been added for the pharmacist's better understanding of the business world.

The main purpose of the five-year pharmacy curriculum is to better prepare the pharmacist for the world in which he lives. By being exposed to a more liberalized general curriculum, he will be better equipped to accept his place in community; and by mastering more comprehensive professional courses, he will be better qualified to pursue his specialty as an expert on drugs.