American Journal of Obstetrics and Gynecology

Vol. 33

FEBRUARY, 1937

No. 2

American Association of Obstetricians, Gynecologists and Abdominal Surgeons*

UNDERGRADUATE TEACHING OF GYNECOLOGY IN NORTH AMERICA

PRESIDENTIAL ADDRESS

Louis E. Phaneup, M.D., Sc.D., F.A.C.S., Boston, Mass.

THE specialty of gynecology has gone through three different phases. It was at first attached to medicine, then to surgery, and it is now coordinated with obstetrics. The Greek conception of the teaching and practice of medicine had a tendency toward unification: thus, Hippocrates taught and practiced both medicine and surgery. The Arabs owed their success in the sciences to the Greek authors, whose writings they translated and whose traditions they followed. With the migration of the center of medical education to occidental Europe, the physicians abandoned the practice of surgery to the surgeons and barbers. During the thirteenth century physicians and surgeons again appropriated all the branches of medical practice. Diseases of women, the therapeutics of which were medicosurgical, were treated by all. In France, Récamier, although a physician, practiced uterine curettage, amputation of the cervix, and vaginal hysterectomy.

After the discoveries of Pasteur and Lister the surgeons took over the practice of gynecology to a great extent, and justly profited by the impetus and improvement which they contributed to this branch of medi-

^{*}All papers published in this Issue up to page 342 were read at the Forty-Ninth Annual Meeting of the American Association of Obstetricians, Gynecolorists and Abdominal Surgeons, held at Bretton Woods, N. H., September 14 to 16, 1936.

Note: The Editor accepts no responsibility for the views and statements of authors as published in their "Original Communications."

cine. By the end of the nineteenth century, well-established Women's Clinics were functioning in several countries, many combining gynecology with obstetries in both teaching and practice. In Great Britain, Germany and Austria, combined departments, under the guidance of departmental heads well grounded in both branches of the specialty, were created, thus placing the teaching of diseases of women on a sound basis. In France, however, gynecology and obstetries were distinctly separated, as they are today, the teaching of the former being in the hands of general surgeons, who, when appointed to the chairs of gynecology, limited their instruction and practice to that art.

In America several physicians made noteworthy contributions to the development of the science and art of gynecology. The names of Ephraim McDowell, J. Marion Sims, Robert Battey, Nathan Bozeman and many others are familiar to all practitioners and medical students and recall to mind the importance of their original work. McDowell opened the door to abdominal surgery, and the story of Jane Crawford has been told and retold in the classroom and before medical societies. To J. Marion Sims we owe a debt of gratitude for conquering a distressful malady, vesicovaginal fistula, and even to this day the technic which he so carefully developed is employed unchanged in the treatment of a number of these disorders. Following Sims in the Woman's Hospital in the State of New York, Thomas Addis Emmet presented to the world the principles of vaginal plastic surgery. Robert Battey, of Rome, Georgia, proposed his operation of removing the ovaries to "establish at once the change of life for the effectual remedy of certain otherwise incurable maladies." This operation was a source of controversy from the beginning, and may have helped to settle the point that normal ovaries should not be removed. The brothers, John Light Atlee and Washington Lemuel Atlee, played an important part in American gynecology. Washington Atlee was awarded the prize of the American Medical Association for the year 1853 for his paper entitled "The Surgical Treatment of Fibrous Tumors of the Uterus. Heretofore Considered Beyond the Resources of Art." On Jan. 5. 1861, the Obstetrical Society of Boston was organized. This society, the oldest in our specialty in this country, has held continuous meetings since that date or for seventy-five years. The American Gynecological Society was founded in 1876 and the American Association of Obstetricians and Gynecologists in 1888, this organization becoming the American Association of Obstetricians, Gynecologists and Abdominal Surgeons in 1920. The progress of American gynecology is well depicted in the transactions of these two National Societies.

In North America the tendency of the present is to unite the two specialties in a woman's clinic. This ideal situation is becoming more and more apparent in educational centers, such as the university hos-

^{*}Trans. A. M. A., vol. 6, 1853.

pitals. In certain American schools, where obstetries and gynecology are given in a number of different hospitals, it is deemed advisable to have separate chairs; since the physical plants are geographically so far apart, their correlation is a difficult task for one individual to control. In such instances, it is desirable that the instructor in obstetrics be well grounded in gynecology and the teacher of gynecology in obstetries. While a physician may limit his instruction and practice to one or the other branch of the specialty, his efficiency will be all the greater if his fundamental training has been equal in both. An obstetrician who has not had thorough training in gynecology is handicapped in presenting the art to his students, just as a gynecologist who does not have a basic understanding of obstetrics is at a disadvantage in attempting to impart knowledge in relation to pregnancy and childbirth. If, for one reason or another, the head of the department prefers to teach obstetries or gynecology, the other branch should be presented by an associate who may also hold a full professorship or who may occupy a prominent position in the department. If gynecology is not given the place which it deserves in a woman's clinic, it is likely to be appropriated by the Department of Surgery. Adequate preparation for the teaching of diseases of women involves a knowledge of pathology, bacteriology, endocrinology, irradiation, conservative treatment and surgical technie; obviously a long period of postgraduate study is essential to acquire this erudition. In the Tufts Medical School, although the chairs are separate, both departmental heads are in charge of unified clinics and practice both branches of the specialty.

In the past, one of the greatest hindrances to a combined department has been a well-planned course in obstetrics with very little attention being paid to gynecology. As pointed out, the practice of this art includes considerably more than the performance of an hysterectomy. The attitude of many teachers has changed materially during the last decade, directing their instruction toward diagnosis, office treatment, and the indications for operation. The technic of major pelvic operations should be left for postgraduate study and whatever time the undergraduate student spends in the operating room should be devoted to the study of living pathology. In other words, the time of the medical student should be utilized for basic sciences and whatever knowledge he can best acquire during his undergraduate days, rather than to subject matter which can be better obtained by postgraduate instruction.

That gynecology is not synonymous with pelvic surgery is manifested by the fact that only a limited number of patients with pelvic symptoms in a large clinic come to operation. At the New England Medical Center, a part of which is the Boston Dispensary, founded in

1796, there are no facilities for housing patients except for diagnosis. This is one of the large out-patient clinics of Boston. In 1934 there were 2,209 gynecologic patients making a total of 8,928 visits. Of this group only 84 or less than 4 per cent were recommended to hospitals for operation. In 1935, 2,103 patients made 7,117 visits and 71 patients, slightly more than 3 per cent, were referred for operative procedures. While it is true that in hospitals having a House Service a larger number of patients may be sent in for surgical intervention, these figures tend to show, nevertheless, that the majority of patients with gynecologic complaints may be treated by conservative means. At our 1929 meeting, Walter T. Dannreuther, in his paper entitled "The Teaching of Postgraduate Gynecology," stated that in the year 1928, at the gynecologic clinic of the New York Postgraduate Medical School and Hospital, 2,864 new patients had been seen, of which 228, about 8 per cent, had been operated upon. In view of the foregoing, one cannot help but feel that conservative therapy, even though prolonged over a considerable period of time, is more skillful treatment than castration by hysterectomy, and will certainly react to the advantage of the patient in most instances.

The American Board of Obstetries and Gynecology, the foundation and function of which formed the subject of Dr. Dannreuther's presidential address in 1932, has done and is doing a great deal to elevate the standards of our specialty in this country. Examinations conducted by this board have shown that education in gynecologic and obstetric pathology has been sadly deficient in our American medical schools, and a not uncommon statement by candidates for the board's examination is that they have not looked at a microscopic slide since they left the medical school.

Fred L. Adair, writing on obstetric education in the report of the Sub-Committee on Obstetric Teaching of the White House Conference, states:

There are relatively few places where additional training in obstetrics can be secured. Such opportunities exist mostly in the large cities in connection with maternity hospitals. Usually such hospitals have not had close connection with medical schools.

What is said about obstetrics applies equally to gynecology. Many of the large hospitals in America have no separate gynecologic service or woman's clinic, the gynecology being assigned to general surgery. In the presence of this condition, it is evident that patients, for the teaching of our specialty, cannot be grouped and used to advantage to the patient, the student, and the teacher. By segregating these patients on a separate service, on the other hand, the methods employed for their care can be better demonstrated and special laboratories for gynecology can be established within the department. It

should be apparent that the physician who regards himself as a specialist should have a basic knowledge of the pathology involved in the lesions which he is treating conservatively or operatively, and that he should have at hand the proper facilities to impart this knowledge to his students. The formation of these services in gynecology or in obstetrics and gynecology offers another advantage and that is a place where the student may be further trained after leaving the medical school. Such services can be adjusted to offer two types of education: training in gynecology for a number of months as part of a general hospital interneship and a residency where every few years a welltrained specialist may be graduated. The facilities for special training for men who have served long interneships and desire to specialize in this branch of medicine are extremely limited in America. The establishment of gynecologic or of women's clinics in all large hospitals would be a logical solution of this problem. Working along these lines, the American Board of Obstetrics and Gynecology, in the April, 1936, number of the American Journal of Obstetrics and GYNECOLOGY, published a survey of obstetric and gynecologic opportunities in 89 hospitals in the United States and 12 in Canada, this survey having been made in 1935.

H. J. Stander, in an article entitled "Teaching of Obstetrics and Gynecology in the United States," gives the following excellent reasons why the department of obstetrics and gynecology should be a combined one:

1. Both branches of the specialty deal with the physiology of the reproductive system of women. 2. We are just on the threshold of discoveries in such fundamental questions as the hormones, related to menstruation and reproduction; how can one not schooled in all phases of female physiology hope to comprehend, much less add to, the information of the intricate relationships of these hormones? 3. All progress in medicine depends upon careful observation and investigative work. Obstetrics and gynecology are in a field with common interests and its investigative work should be conducted in a combined department. 4. Operative obstetrics to be done well should be done by one familiar with and trained in operative methods and asepsis. Similarly the gynecologist, if he is to be somewhat more than a knife-loving operator, must have an obstetric point of view.

With this obstetric point of view in mind, the pelvic surgeon will refrain from doing high amputation of the cervix when treating cervical lacerations in young women during the childbearing age, he will not do abdominal fixation of the uterus in an attempt to correct retroversion or prolapse in women who are to have more children, and he will not remove the uterus to control hemorrhages of endocrine origin in the adolescent. I have previously emphasized, by figures, that the therapy of gynecology is mainly conservative.

^{*}Am. J. Surg. 28: 61, 1935.

The American Board for Medical Specialties was organized in 1933 and 1934 for the purpose of coordinating graduate education and certification of medical specialties in the United States and Canada. This board reports to and functions in conjunction with the Council on Medical Education and Hospitals of the American Medical Association. It is made up of representatives from the Association of American Medical Colleges, the American Hospital Association, the Federation of State Medical Boards of the U.S.A., the National Board of Medical Examiners and the several special examining boards. This is evidence of the effort which the profession in America is making to elevate the standards for the various specialties. The effect of such constructive activity should be far reaching.

In order to ascertain the existing conditions in regard to the teaching of gynecology in North America, a personal study was started in October, 1934, and the list of medical schools approved by the Council on Medical Education and Hospitals of the American Medical Association, published in the Journal of the American Medical Association, Aug. 26, 1933, was used as a basis. There were listed 87 approved schools, 11 of which covered only the first two years of instruction, leaving 76 schools, 67 in the United States and 9 in Canada, which gave courses in gynecology. A questionnaire containing 17 questions was sent to the 76 professors of gynecology or professors of obstetrics and gynecology. Fifty-six, or 73 per cent, of these questionnaires were returned. The data compiled therefrom are, therefore, only approximate, but a sufficient number of schools answered to make the figures fairly representative of a cross-section of the departments in the United States and Canada.

It was found that gynecology existed as a separate department in 21 schools; that it was combined with obstetrics in 34 schools, and associated with general surgery in only 3 schools. In one instance in which gynecology is combined with general surgery, it is so allied only clinically; i.e., gynecologic patients are assigned to the surgical service, but the course in gynecology is separate and not integrated with obstetries. In another instance, gynecology is combined with both obstetries and surgery. Since the teaching is done in a university hospital, the patients are divided into two groups: (1) surgery and gynecology, (2) obstetries and gynecology. The services are for three-month periods, the first three months the surgical and gynecologic service taking the tumor and inflammation cases and the obstetric and gynecologic service taking the plastic repairs and the functional cases. three months the order is reversed, etc. In the third instance gynecology is a division of the surgical department and is not combined with obstetrics. To summarize (Chart 1), gynecology is combined with obstetrics in 60 per cent, it is a separate department in 37 per cent, and it is united with surgery in 5 per cent of the 56 schools answering the question. The fact that the majority have a combined department tends to show that the ideal arrangement is being gradually reached, and further tends to imply that the small minority who still combine gynecology with general surgery should take steps to remedy this condition, if we correctly assume that the large majority are desirous of expending their efforts in the proper direction.

It was definitely shown (Chart 2) that gynecology is taught largely by clinicians and not by full-time teachers in these 56 schools, 39 schools having part-time, 12 schools both full- and part-time and 5 schools full-time teachers.

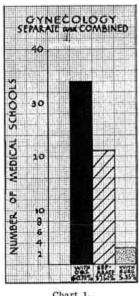


Chart 1.

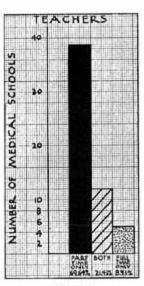


Chart 2.

Gynecology is taught (Chart 3) in the third and fourth years in 83 per cent of the schools in the United States which answered the question. The Canadian schools, because of their five- and six-year courses. teach this subject in the last two or three years. Didactic lectures (Chart 4) are given in 90 per cent and omitted in 10 per cent of these schools, while clinical lectures are held in 86 per cent, and not employed in 14 per cent, the figures being nearly the same. lectures vary from 6 to 72, the average number being 29, and clinical lectures from 4 to 224 with an average of 41, the highest number of lectures applying to obstetries and gynecology being in a combined department. The subject was required of all students, and all stated that they were assigned to the out-patient department. This seems to

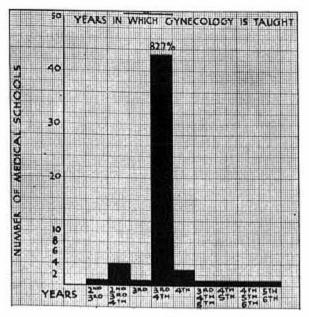
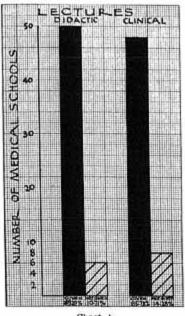


Chart 3.



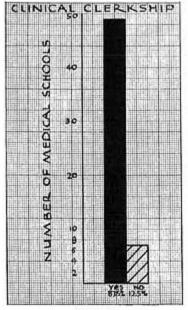


Chart 4.

Chart 5.

history-of-obgyn.com obgynhistory.net stress the fact that the teachers of this specialty in the United States and Canada are impressed by the value of out-patient teaching, which emphasizes history-taking, diagnosis, and conservative treatment.

As to the period of assignment to the out-patient department, 47 of the 56 medical schools answering showed a variation of three hours to twelve weeks with an average of twenty-two days or forty-four hours, assuming that two hours in the out-patient department constituted a day and six such days a week. In 87 per cent of these schools, students were assigned to the gynecology department of the hospital as clinical clerks (Chart 5), their term of residence varying from two to forty weeks with an average of nearly six weeks.

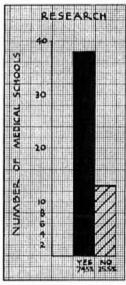


Chart 6.

Research (Chart 6) is earried on in the department of gynecology in 38 schools, or nearly 75 per cent, of the 51 schools which answered the question. In one of these schools research is an elective subject.

In answer to the question: "State your views with regard to a separate department of gynecology or a combined department of obstetries and gynecology," 38 schools, or 68 per cent, favor a combined department, 14 schools a separate department, 3 schools have varied opinions and 1 school did not reply.

The answers to the question: "What constitutes an adequate teaching department in gynecology?" demonstrate that the large majority favor didactic lectures, limited in number, to give an idea of the scope of gynecology and to place emphasis on history-taking, the examina-

tion of patients in the out-patient department and the carrying out of office procedures in the treatment. Those who favor operative clinics do so in order to demonstrate gross pathology on the living rather than to inculcate lessons in technic. One of the best arrangements which is functioning at the present time in a combined department is the following: Third year, (a) didactic course and clinical lectures, (b) two months of gynecologic pathology and gynecologic ward rounds. Fourth year, (a) clinical lectures thirty-two hours; (b) two months' residence in the woman's clinic, full time, of which approximately one-third is given to gynecology, operating room, ward work and outpatient department.

To the inquiry: "Give suggestions you may have with regard to the teaching of gynecology, such as its place in the curriculum, methods of teaching, course, content, etc.," interesting and illuminating data were received. Space permits quoting only a few of the replies.

One professor of gynecology writes: "Obstetries and gynecology should occupy a place in the curriculum equal to that assigned to general surgery. The course in gynecology should be interrelated with that in obstetrics. I favor a lecture course, ward work, out-patient department work, etc., carried out in a combined manner in these two."

- 2. Another answer: "I believe that gynecology is of less importance for the student than obstetrics. Emphasis should be placed upon pathology, diagnosis, and the method of treatment which is indicated. Do not believe that any attempt should be made to teach operative gynecology per se to undergraduates."
- "Because of the great advances made in recent years in medical and surgical gynecology, this subject should by all means be taught as a major branch."
- 4. "I believe that didactic teaching during the junior year, with not too much emphasis on treatment and clinical teaching, with emphasis on diagnosis and treatment in the senior year, is a desirable arrangement, remembering always that gynecology is today to a large degree a specialty and should, therefore, not be overemphasized at the expense of obstetrics."
- 5. "Present set-up is a result of reorganization about four years ago. Up to that time gynecology had been a short didactic course, submerged in general surgery. It was taken out of this department and separate wards set up for it, which change has very much added to its importance in the minds of students and a very decided increase and general interest in the field."
- 6. "I believe the teaching of gynecology must vary in different schools with the clinical facilities and the personnel of the teachers in the department. We try to get away from the didactic recitation as far as possible, and substitute for it what we call studies in gynecology, in which we rely a great deal on visual instruction. Lantern slides are used and a notebook is used which is very profusely illustrated."
- 7. "I feel that the ideal is a combined department in a University hospital. In our own school we have separate departments for the reason that gynecology is taught in four hospitals and obstetrics in ten. It is practically a physical impossibility for one man to correlate this amount of teaching. I feel, because of this fact, better results are obtained by having separate chairs, although there is some overlapping in the clinical teaching in hospitals. Even though the chairs are separate, there is close cooperation between the departments of obstetrics and gynecology. The head of the department of gynecology has a combined obstetric

and gynecological hospital service, although he teaches only gynecology. I believe the teacher of gynecology should do a certain amount of obstetrics in order to have the obstetric point of view."

- 8. "Separate department develops better gynecologists. Better gynecologists deliver better gynecologic service to patients and better instruction to students. I believe the greatest contributors to gynecology have been men who do little or no obstetrics."
- 9. "I think that more emphasis should be placed on gynecologic pathology, both gross and microscopic. Inasmuch as gynecology comprises about one-half of the ordinary doctor's practice, my opinion is that more time should be allotted to this study than is given to it in the average school."
- 10. "Because of the fact that the general practitioner is frequently confronted with the problem of interpreting pelvic symptoms, gynecology should occupy a prominent place in the students' curriculum. In the teaching of gynecology, emphasis should be laid upon pathology, diagnosis, and the principles of treatment, and a discussion of the technic of operations should be limited to only the standard procedures. As to the method of teaching, didactic lectures covering the main subjects are necessary, but they should be supplemented by clinical conferences with exhibition of cases, discussion of case histories and demonstration of gross and microscopic pathology. Quizzes are undoubtedly of value not only in forming some estimate of what the student is obtaining from the course, but also to clarify the subject in the student's mind. I would prefer smaller classes as this would permit more personal instruction to be given to a smaller group of students."
- 11. "We see no reason for changing our system, although I believe the best teaching is in the out-patient department and not in the operating theater. The methods of diagnosis, pathologic demonstrations, and simple methods of therapy are all important."
- 12. "I believe in a preliminary didactic and demonstration course followed by clinical study with emphasis in methods of examination and diagnosis. Anatomy, physiology, and pathology are the foundation."

SUMMARY

There is at the present time a strong tendency in North America to unite the departments of obstetrics and gynecology into a combined department or woman's clinic. This unification offers many obvious advantages, since, in the study, the teaching and the practice of these two branches of medicine, overlapping constantly occurs. The physiology of menstruation and of reproduction, the interrelationship of the various hormones, which we are beginning to understand, are all factors which point to the ideal of a combined department. While the woman's clinic may function satisfactorily under one departmental head in the university hospital, separate chairs of obstetries and gynecology are administered with greater facility in those schools in which these subjects are taught in several hospitals, as the coordination of the teaching where the physical plants are distantly apart is a difficult task for one individual to assume. However this may be, the teacher of obstetrics should have fundamental training in gynecology as the teacher of gynecology should have in obstetrics, if the best results are to be obtained. For purposes of teaching and giving the patient the best care, the department of gynecology in large hospitals should be separated from general surgery and should function as a unit or as a part of a woman's clinic. Since only three out of fifty-six medical schools in North America combine gynecology with general surgery, the facts seem to be against such an alliance. Most teachers of gynecology express the opinion that the undergraduate student should spend most of his time in the out-patient department where emphasis is placed on history-taking, diagnosis, and office treatment. Pelvic surgery should be taught as a postgraduate subject, and the technic of operations should find but little place in the undergraduate curriculum. There is an increasing demand for well-established gynecologic or combined services in the large hospitals of America in order adequately to instruct the undergraduate student and to furnish residencies for those who desire to specialize in this field. The American Board of Obstetrics and Gynecology, sponsored by this Association, is playing an important rôle in the improvement of the practice of our specialty in this country. Relying on the progress which has already been made, the future may be faced with optimism.