

The Education of a Physician in Early 19th Century

by John Light Atlee, M.D.

Dr. John Light Atlee (1799-1885), son of William Pitt Atlee (1772-1815) and Sarah Light Atlee (1782-1850), and his younger brother, Dr. Washington Lemuel Atlee (1808-1878), were pioneers in surgery in Lancaster County in the mid-nineteenth century. Dr. John L. Atlee was graduated from the Medical School of the University of Pennsylvania in 1820 at the age of twenty-one, and immediately opened an office in Lancaster. His skill as a physician and surgeon earned him a reputation that extended well beyond Pennsylvania. He and his brother, W. Lemuel, revived ovariectomy after the abandonment of that serious procedure early in the nineteenth century owing to the nearly 100% mortality rate. The Drs. Atlee reduced this rate to about 30%. During the 1854 cholera epidemic in Columbia and at the County Hospital, Dr. John L. Atlee anticipated by thirty years Dr. Robert Koch's discovery of the disease-causing germ. Dr. Atlee was the first medical director of St. Joseph Hospital in Lancaster.

*Dr. John L. Atlee was one of the founders in 1843 of the Lancaster City and County Medical Society, and in 1848 he helped establish the Pennsylvania Medical Society. The year previous, Dr. Atlee had been one of the founders of the American Medical Society. He served as president of each of these medical societies during his long career. In 1882 Dr. Atlee presented his inaugural address to the AMA upon assuming its presidency, and it was published in the first volume of the *Journal of the AMA*. Because it describes so well the education of physicians in the early nineteenth century, it is reprinted here with the kind permission of the American Medical Association.*

It should be noted that no fewer than nine physicians are among the descendants of Dr. John Light Atlee (1799-1885), not including his brother, Dr. Washington L. Atlee, or his cousin, Dr. John L. Atlee, a son of Edwin

Augustus Atlee, who also practiced medicine. Edwin studied under Dr. Edward Hand and was graduated from the University of Pennsylvania in 1804. He practiced medicine until 1829.

ANNUAL ADDRESS OF THE PRESIDENT

John L. Atlee, M.D.

GENTLEMEN OF THE AMERICAN MEDICAL ASSOCIATION: Permit me to express my feelings of gratitude for the unexpected honor conferred upon me at the last meeting of the Association, and to cherish the hope that in fulfilling the duties of this responsible position I may be sustained by your cordial co-operation. We meet here to engage earnestly in furthering the interests and objects of the medical profession. We have come together from all parts of our broad country, charged with these great responsibilities. It is fitting to express here deep regret at the absence from our councils of delegates from the Medical Society of the State of New York. Let us hope that this absence may be only temporary, and that at the next meeting every state may be represented.

As specialties are so much in favor at the present time, I have thought it well, though far from favoring them on ordinary occasions, to bring prominently forward, in my address to-day, my own rare specialty, namely, the having been a graduate of sixty-three years' standing. Instead, therefore, of calling your attention to the more strictly scientific subjects that are so generally considered upon such an occasion as this, it has occurred to me that some reminiscences of my early medical life might not be wholly unacceptable, or devoid of interest and instruction.

When I began my medical studies in 1815, there were but few medical colleges in the country — the medical department of the University of Pennsylvania, the College of Physicians and Surgeons of New York, and the colleges at Baltimore, Harvard, New Haven, and Lexington, Ky. The University of Pennsylvania was the leading institution, to which students from all parts of the country came. The facilities for clinical instruction at the university were confined to the Pennsylvania Hospital and the Philadelphia Alms-house; but of these lectures and the distinguished clinical teachers I shall speak again. Having no opportunities for studying practical anatomy before matriculation at the University of Pennsylvania, I devoted myself more particularly to that branch in my first course of lectures, 1817-18. The chair was then filled by Dr. Caspar Wistar, one of the most able and accomplished teachers of anatomy which this country has produced. His amiable deportment and kind treatment of students made an impression upon me which I shall never forget, and after the lapse of more than sixty-five years the thought of him kindles in my breast emotions of genuine

pleasure. As I remember him, he was of medium stature, apparently about sixty years of age, and so impressive was his teaching of anatomy, up to the time of his death, which occurred very suddenly, in January 1818, that his words remain with me yet. He was certainly a man of great personal magnetism, extremely courteous in his manners, and gentle in disposition; he was always ready to converse with the students and help them in their difficulties. It is no wonder that he was greatly beloved by the students. The announcement of his sudden death from disease of the heart, on the night after he delivered his last lecture, produced a shock among the students that I shall never forget.

Just here, I may appropriately allude to the foundation of a social institution, long known in Philadelphia as "the Wistar Parties." Dr. Wistar had been in the habit of inviting to his house, on Saturday evening, men of learning and distinction, both citizens and strangers. The ability and social qualities of the professors of the University of Pennsylvania and of the eminent medical men of Philadelphia, caused always the presence of a large infusion of medical science in the composition of his parties. After his death, these gatherings were revived and continued by his friends, and they were still known as "Wistar parties" in honor of their founder. In this way originated the celebrated social gatherings which occupied so important a share in the social annals of Philadelphia. I remember my gratification when young at meeting some distinguished gentleman from abroad, and many no less distinguished from our own country.

The course of lectures on anatomy, interrupted by the death of Dr. Wistar, was subsequently finished by Dr. John Syng Dorsey, a favorite nephew of Dr. Physick. He completed the course with credit, and was subsequently elected to fill that chair. Unfortunately, he also died from a very short illness, after delivering his introductory lecture, within a week of the beginning of the term. It was a great loss to the university, and a very severe blow to Dr. Physick — one from which he never recovered. At this period there was no American work on anatomy, but about this time Dr. Wistar's Anatomy was published, and adopted as a text-book. It was received with great favor, even with enthusiasm, by the students. The assistants to the professor of anatomy at this period were Drs. William E. Horner and Hugh L. Hodge, afterward highly distinguished in their respective branches, anatomy and midwifery.

Dr. John Redmond Coxe was the professor of chemistry in the winter of 1817-18, a grandson of Dr. John Redman, one of the leading physicians of Philadelphia in his day, and first president of the College of Physicians. Dr. Coxe had the reputation of being one of the most diligent students in Philadelphia. He was very careful in his experiments, and in lecturing was very punctual in filling the whole of the hour allotted to him. The chair of midwifery, during my first course, was filled by Dr. Thomas C. James, a

very modest and agreeable gentleman of Quaker origin. He had such a sense of delicacy that he could not bring himself to lecture on the female organs of generation, but entrusted this part of his course to Dr. Horner. Although a graduate of the University of Pennsylvania, he subsequently became a pupil of Dr. Denman, of London, whose work on midwifery, together with that of Burns, and Dr. Dewees' translation of Baudelocque, constituted the principal works on that subject. Dr. James, after Denman, was a strong advocate for the short forceps.

Dr. Nathaniel Chapman, at this time, and for many years afterward, filled the chair of the institutes and practice of medicine. He was a most eloquent and impressive lecturer, and the idol and tried friend and benefactor of the student. He was, moreover, a man of very marked ability, eloquence, and great social qualities. Having to teach the institutes, as well as the practice of medicine, it required two courses of lectures to complete the subject. The physiology of that day was very different from that of the present. The microscope had hardly begun to be applied to the study of anatomy, and so little did Dr. Chapman appreciate it, that it was a standing joke with him to quote old Leeuwenhoeck as having discovered with his microscope "twenty thousand devils playing upon the point of a needle," thus foreshadowing some of the most remarkable discoveries of the present day, especially disease germs. Professor Chapman was thoroughly posted in the departments which he taught, at that time, although they have advanced wonderfully since his day. He was a man of very imposing presence, rather above the medium height, always neat in his dress, perfectly well-bred, and uniformly obliging and polite to the students. I believe that he did more for the advancement of medicine in his day than any other person with whom I was acquainted. He established a school, called Chapman's Institute, for the benefit of his private students, of whom he always had thirty or forty, and other students who chose to attend. The building was in the rear of his house, with a private entrance, and he employed, as teachers of his classes, gentlemen who afterward became eminent professors at the university and at the Jefferson Medical College, among whom may be mentioned Professor William P. Dewees, Hugh L. Hodge, and John K. Mitchell.

Last but not least among the faculty of that day was Dr. Philip Syng Physick, the great American surgeon, who that winter, 1817-1818, delivered his last course of lectures on surgery. A pupil of John Hunter, he taught the doctrines of that great man. As I recall his course of lectures, it seems to me that he was one of the most impressive teachers that I have ever listened to. Dr. Physick was remarkable for great attention to details, and in his operations upon the cadaver he carefully observed all the rules for operating upon the human body. He also recapitulated the lecture of the preceding day before going on with his subject, by questioning the students who occupied the first two rows of seats in the amphitheater. I may refer to one incident

which may illustrate his method and his carefulness. On one occasion he stumped the whole class; he had been lecturing on lithotomy the preceding day, and he put the question to the first student, "What instruments should be provided for the operation?" The answer appeared to have been correctly given, but he was not satisfied. The question was repeated to the next student, and finally to the whole class with the same result. Dr. Physick then said it was "a pin, gentlemen, a pin," that was needed to complete the list. This showed his precision, and impressed upon us the necessity of taking care never to go to an operation without the minutest preparation.

Dr. Physick was a man of medium height, with very regular features. His face at that time was pale, as if he suffered from delicate health. He was of very abstemious habits. I remember on one occasion, at a party given at his house, when the servant brought in a tray with wine, I was standing beside Dr. Chapman, when I placed my hand upon a decanter, as I supposed, of wine; Dr. Chapman touched my elbow, and told me not to take that; I filled the glass from another bottle, and afterwards asked the Doctor why he had checked me; he said the first was simply colored water that Dr. Physick had provided for his own use.

In speaking of Dr. Physick's teaching, I should also say that he always lectured extemporaneously, the didactic lectures on inflammation being read by Dr. Dorsey, his nephew. Dr. Physick was dignified in his deportment, and eminently grave; we rarely saw a smile upon his face. His usual dress in the lectureroom was a blue coat with metal buttons, white vest, and drab pantaloons. He was remarkably staid and reserved in his manner, and was always regarded with reverence and great respect by the students. He never indulged in any flights of imagination, and was purely a practical lecturer who brought his knowledge from the stores of his large personal experience.

One of his favorite precepts was to insist upon great attention to diet after surgical operations. I may mention this anecdote: In one of his lectures he spoke of a very important surgical operation, and said that there was a necessity for attention to absolute diet. The next day in recapitulating, he asked a student what was meant by absolute diet. The student said "Toast or barley water." "Will any gentleman tell me what is meant by absolute diet?" appealing to the whole class. There was no reply. "Water, gentlemen, water." A precept I have never forgotten, and which, I think, is not sufficiently observed at the present day after important surgical operations.

The clinical teaching of that day was not given at the medical college, as it now is, but at the Pennsylvania Hospital, and the Philadelphia almshouse, then in the city; each institution affording an excellent school of instruction to the students. As the clinical hours were the same at both institutions, I chose the almshouse as affording a larger field.

Among the clinical teachers of that day, very few were superior to Dr. Joseph Parrish, who had been a pupil of Dr. Wistar. He was a man of most amiable character, thoroughly devoted to the advancement of the profession; having large classes of private students every year, to whom he lectured, and for whom he also provided able assistants to aid in teaching. One of these was the late Dr. George B. Wood. Dr. Parrish was a man of warm sympathies, and he testified to his benevolence in the manner in which he conducted his clinics. Let me give you an illustration. A poor, weather-beaten sailor was brought to the alms-house suffering very much from rheumatism. Dr. Parrish ordered the man to be clothed in flannel, and have a bottle of porter daily. On the next clinic day Dr. Parrish, on inquiring, found that neither had been attended to. He repeated the order, with a mild rebuke to the steward. At the next visit, three days afterwards, finding that his previous orders had been disobeyed, he called for the steward, and remained at the bedside of the patient until the order was fulfilled.

With regard to the treatment of that day, I shall say little; the textbooks then studied fairly present it to you. Would that I could speak more satisfactorily of the treatment of the insane as I remember it. They were generally confined in the basement of the alms-house in small cells, some with manacles, others with chains; seldom had they access to fresh air, and often they had nothing but loose straw for their bedding. This unhappy and inhuman state of things continued until Pinel and Esquirol established a course of treatment more consistent with the dictates of science and humanity. In a recent visit to the State Lunatic Hospital, at Harrisburg, Pa., of which I am a trustee, not one of the four hundred insane inmates was the subject of mechanical restraint.

At that time, the resident physicians at the alms-house were not graduates in medicine, but last-course students, who fulfilled their duties while preparing for graduation. The requirements for graduation were attendance upon two full courses of lectures, of four months each, a written thesis on some medical subject, attendance at the hospital or alms-house, and an oral examination in the presence of the whole faculty.

Many of the elderly gentlemen present to-day must have heard of the much dreaded "green-box." During the time of Drs. Rush and Barton, it was reported that favoritism was shown to their respective students, and the same was said of the students of Drs. Chapman and Dorsey. To obviate this, or the appearance of it, a large green screen was placed across one corner of the room, having a door behind it, through which the candidate entered, and here underwent his examination, unknown to any one but the dean of the faculty. This mode of examination was adhered to until after the death of Dr. Dorsey, when it was optional with the student to go into the green-box or present himself openly before the faculty. Some ten or twelve candidates had such a terror of the green-box that they went to New York.

where they obtained the degree of M.D. by undergoing an examination and paying the graduating fee.

It was the time of calomel and the lancet. With regard to the one, I need not speak; but of the latter I feel well assured that the almost total disuse into which it has fallen has cost many valuable lives. From a very large experience in its use, I am satisfied, fully satisfied, that if we depended more on the early use of the lancet in the congestive and inflammatory states of many diseases, our practice would be more successful than it now is. At the present time there is too exclusive reliance upon medicines affecting the nervous and vascular systems, which act with less efficiency and are less prompt. It is, in my opinion, a very important subject, and I feel assured that ere long the lancet will be more freely used than it is now. In the congestive chills preceding inflammatory diseases, and in the cold stages of intermittents, I have frequently broken up the paroxysm, and relieved the patient by the lancet alone.

In the class of 1817-18, there were many men who afterwards became distinguished in their respective departments. Time will not permit me to enumerate them all.

Among the first was one with whom I was very intimate, Dr. George McClellan. A man of great natural talent, quick perception, wonderful memory, prompt to decide and prompt to act, he made himself, during his pupilage, one of the best anatomists in the country, and subsequently brought more talent into surgery, than any man I have ever met with. During his brief, but brilliant career, he performed more surgical operations than any other surgeon in Philadelphia, and he undertook to perform, and did perform successfully, some operations which were considered impracticable by other surgeons. Among these was the removal of the parotid gland. It was my good fortune to visit with him his first patient the day after the operation, and although it was afterwards reported that it was not the parotid gland, I made a very careful examination of the tumor, and of the patient, and was perfectly satisfied of its identity. This operation he performed several times afterwards, one of them on a young Irishman, where Dr. Deal, of Dublin, an eminent surgeon, had previously failed. A beautiful illustration of his diagnostic ability was shown to me when on a visit to Philadelphia. A female infant, about four or five months old, whose parents belonged to one of the most distinguished families in New York, was brought by her father to Philadelphia, to consult the oldest leading surgeons of the city, who all pronounced the case hopeless. The child had from birth a complete paralysis of the right arm and hand. As Dr. McClellan, at that time, was beginning to acquire popularity as a surgeon, the father was persuaded to consult him. Dr. McClellan made a careful examination, and found that the clavicle was pressing on the brachial plexus of nerves, as it passes over the first rib, and that the paralysis was owing to

this cause. All that he did was to elevate the shoulder and the clavicle by mechanical means, and the functions of the arm were entirely restored. I saw it playing equally well with either arm on the nurse's lap.

Dr. McClellan was of medium size, fair complexion and blue eyes. He was very attractive and agreeable in his manner, very vivacious, and was called a "bundle of nerves." He was very fond of society, and a general favorite wherever he was known. There was no jealousy in his disposition, and I may be permitted to add that he was the only surgeon in Philadelphia who congratulated me upon the success of my first operation for ovariectomy in 1843, when I revived the operation which, after its introduction by Ephraim McDowell, had fallen into disuse. He sought me at my hotel, when on a visit to the city, and gave me a most cordial embrace.

Dr. McClellan was among the first to suggest and urge the establishment of another medical college, in Philadelphia, and with the assistance of Dr. Eberle, he determined to get a charter from the legislature. Dr. Eberle, being a native of Lancaster county, and, having practiced both in the city and county for several years before his removal to Philadelphia, had many friends there, and wrote to them, asking their assistance in procuring a charter from the legislature. With a view to furthering the cause, a public dinner was given to Dr. Eberle by the leading gentlemen of Lancaster, and resolutions were then passed instructing our representatives at Harrisburg to favor the charter. Notwithstanding the opposition which had always existed among the friends of the university to the establishment of another school, a charter was obtained authorizing the trustees of the Jefferson College, at Canonsburg, to grant degrees in medicine and to locate the school in Philadelphia. Another member of the class of 1817-18, a native of Lancaster, and when young a schoolmate of mine, was Dr. John Rhea Barton, who began the study of medicine with my preceptor, Dr. Samuel Humes, and through the influence of his uncle, Professor Benjamin Smith Barton, of the university, was appointed a resident pupil at the Pennsylvania Hospital. At that time, I believe, the residents were apprenticed for five years. Such was the distinction he attained in his position that immediately after receiving the degree of Doctor of Medicine he was elected one of the attending surgeons, an unprecedented event. While in this position he acquired the reputation of being one of the most dexterous operators in the country. A gentleman, a physician, who, after graduating here, had spent five years in Paris, and who had seen Dupuytsen, Boyer and Dessault operate, told me that with the exception of Dr. Physick, who had been his preceptor, he had never seen Dr. Barton equalled as an operator. He was ambi-dexterous, and instead of changing sides in amputations, he would change hands.

Among my fellow-students in 1817-18, and fellow-graduates in 1820, I should be unmindful of what is due to extraordinary merit, were I not to

speaking of one who has done more for American medical journalism, than any other physician in the country. I allude to the late Dr. Isaac Hays, the editor of the *American Journal of Medical Sciences*, by whose labors, professional accomplishments, and excellent judgment, the leading medical journal of this country was established. Having assisted Dr. Chapman in editing *The Philadelphia Journal of the Medical and Physical Sciences*, the motto of which was the ill-natured quotation from Sidney Smith, "Who reads an American book?" Dr. Hays established, in 1827, the "*American Journal of Medical Sciences*," which to this day, both in this country and in Europe, is admitted to be, in character and ability, the first. Modest and unassuming, he scorned the arts by which many seek prominence, and during a long and very busy life, sustained the character of a high-toned and honorable gentleman. To him are we chiefly indebted for the preparation of the Code of Ethics of this Association, which some of our physicians, from motives we cannot appreciate, would be willing to mutilate or destroy.

To another fellow-graduate I may with great propriety allude — Dr. Samuel Henry Dickson, one of the most accomplished scholars, both in medical and miscellaneous literature, it was my good fortune to know. Having obtained, by his extensive acquirements, sound judgment and high character, the first position in his native city, Charleston, South Carolina, he was elected Professor of the Theory and Practice of Medicine in Jefferson Medical College, where he lectured with distinguished ability to the close of his life.

Dr. George B. Wood, known to many of you, was graduated at the end of my first course in 1818. The possessor of an ample fortune, he devoted his wealth, his untiring industry, and his great acquirements to the promotion of sound knowledge, and the welfare of the Medical Department of the University of Pennsylvania.

In the winter of 1819-20, when I attended my second course, a change had taken place in four of the chairs at the University. Dr. Physick, in consequence of the death of Dr. Dorsey, had been elected Professor of Anatomy, and Dr. Gibson was brought from Baltimore to fill the chair of Surgery. Dr. Coxe was taken from the Chair of Chemistry to teach *Materia Medica*, and Dr. Robert Hare was appointed to teach Chemistry. These changes were not very agreeable to those who, like myself, were attending their last course, as they took from the chair of Surgery that great man, Dr. Physick, and placed him in a position where he had to renew his early studies. It placed Dr. Coxe in what might be called his favorite element, for there was hardly a single article of the *materia medica* from the time of Hippocrates to that day, that he did not notice in his lectures. It was very amusing to the class, after Dr. Chapman had recommended the use of a medicine as emanating from Dr. Physick, to hear Dr. Coxe, a day or two afterward, taking especial pains to tell us that the remedy had been used from the time

of Galen or Celsus. Dr. Hare, who never failed in an experiment before the class, had great hesitation in explaining the *rationale*, not having the gift of fluent speech. He gave an excellent demonstrative course on chemistry, particularly on the subjects of heat, magnetism, electricity and galvanism, which since his day have excited the attention of the whole civilized world. Dr. Hare was a large man, of great muscular physique, but possessing the manners and feelings of a courteous gentleman.

Dr. Gibson, whom I have referred to as coming from Baltimore, where he had acquired great reputation as a surgeon, had been a pupil of the celebrated Charles Bell, of London. At first, he read his lectures, which rendered him somewhat unpopular with the class, as his predecessor, Dr. Physick, had always lectured extemporaneously. Being told of this, it was said that he afterward committed his lectures to memory.

At the time of my attendance upon lectures, there were very few boards of examiners, and the graduating classes were generally divided into "quizzing clubs" of six students, each of whom took notes at the lectures of the different professors. We examined each other twice a week on the lectures of the three preceding days, and recapitulated on Sunday afternoon; having been told by Dr. Wistar that we could not spend Sunday more profitably than in the dissecting room. So Galen ends his book, *De usu Partium Corporis Humani*, by saying, it is an *epodos*, or a song sung standing before the altars of the gods, *Hymnis deos celebrantes*. The result of these frequent examinations was, that although we had some lazy fellows among us, every member of our class received his diploma.

With the garrulity, and may I not call it, the privilege, of your oldest brother, I present you with some of the reminiscences of my college life. Before I close this address, let me briefly call your attention to some other subjects, which, in my opinion, are of pressing importance.

Let me impress upon the mind of every member of the profession, the necessity of strict and undivided attention to the duties of his high calling. Let no outside influence operate to interfere with these duties. When you undertake the case of a patient, your whole duty belongs to him. The intermission of a single visit, which on your part may have been devoted to pleasure, may sacrifice the life of your patient.

Above all things, ever strive to maintain the honor of the profession. Let no selfish or mercenary consideration deter you from observing the laws laid down in our noble Code of Medical Ethics. Cultivate friendly relations with your local medical brethren, more particularly the younger; and regulate your intercourse with all men in such a way as to cast no stain upon the honor of the profession, which is in your keeping.

In my day, previous to the establishment of medical societies throughout the country, and the organization of the American Medical Association, and the general adoption of the Code of Ethics, I saw many

disastrous effects from the want of brotherly consideration and kindness. The medical men of that day were often in difficulties, patients would be taken from one physician to another without ceremony; and so great was the jealousy existing between them that for more than twenty years after my graduation, it was impossible to form a medical society in my native city and county, because there were so many aspirants for the honors. Here let me speak of some of the difficulties I had to encounter in my early professional life. Instead of being taken by the hand by the older physicians, every obstacle was thrown in my path — consultations were refused, and the treatment of my patients unfavorably criticized.

By the establishment of medical societies, and the adoption of the Code of Ethics, a wonderful change has been effected. We now feel it our duty to sustain our younger brethren, to treat them with courtesy and kindness, to save them from their errors, and encourage them in all their good work. Had the adoption of the Code of Ethics no other result than this, it would have been an invaluable blessing to the profession. But it has accomplished more. It has put the seal of condemnation upon all "isms," and developed an *esprit de corps* that has enlarged the boundaries of our science, and greatly increased the usefulness and social standing of the profession.

Now, gentlemen, being aware that reports and papers upon every important topic connected with the different departments of medicine will be presented by the chairmen of the sections, and by individual members, I have not entered upon the discussion of any subject, either medical or surgical.

Our meetings are for the purpose of promoting social intercourse, as well as for the advancement of medical science; but we should devote sufficient time to the discussion of the various subjects presented to us, and not allow them to be too greatly interfered with by social entertainments.

One word more, and I have done, and I say it chiefly as a word of encouragement to the younger among you. At the close of a long life, one devoted unreservedly to the study and practice of medicine, I will say that notwithstanding its uncertainties, its fatigues, its anxieties, its bitter disappointments, I am completely satisfied that in no other career can a man more fully accomplish his whole duty to God and to his fellow-men; so that when life here is ended, it can truly be said of him, as — be it said with all reverence — was said of Him whom we should all imitate, *pertransivit benefaciendo* — he went about doing good. Trusting that our proceedings may be both harmonious and profitable to us all; and thanking you again for the honor you have conferred upon me, I sincerely hope that the recollections we shall carry home with us will be both agreeable and lasting.