NEUROSURGERY IS WHAT YOU MAKE IT*

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AT THE BEGINNING

The middle thirties was a stimulating period for neurosurgeons. The new specialty was about halfway through the years of expansion, with an increasing demand for its services. This expansion was not yet apparent to the general medical profession. There was still some unbelief about the practicalness of such a restricted field. Because neurosurgery dealt chiefly with the brain its votaries appeared to move in a rather exotic atmosphere. Almost all of the members of the Harvey Cushing Society were professors, major or minor.

Into this galaxy two unorthodox members were introduced. They were starting to practice neurosurgery in far western communities that did not boast of medical schools. The entrance of Dr. Haven of Seattle and myself from Vancouver illustrates the dictum that there are no absolute truths. We never did hear the reason. We would like to think that it was because of the interest of Dr. Cushing himself, but he hardly knew us. When I first met Harvey Cushing in 1932, and again in 1935, he seldom saw me except in the company of Dr. Ken McKenstie. So I became, as I supposed happened to Hale Haven, what Dr. Cushing termed a “spiritual grandson.”

During my early years in the Society I was always chagrined to admit that there was no medical school in Vancouver. One missed the atmosphere of the teaching center when away out West and always felt like a student again, when back. Later on, the large centers seemed to lose some of their glamour. Envy for opposite numbers changed to a wonder if they would not like to trade places. There came a day when one enjoyed, as always, meeting university colleagues, but welcomed a return to the “wide open spaces.” I could not say this with free conscience next year, for this fall, at long last, a medical school is due to open at the University of British Columbia, in Vancouver.

Since the policy of this Society was changed from that of a small, restricted group to the equivalent of a National or North American Association, there has been a rapid growth of our membership. The expansion has been paralleled by an increase in the proportion of members who do not have direct affiliations with teaching or research institutions. To these men, in particular, I address my preliminary remarks.

The introduction of a new specialty in medicine to a community is seldom

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the occasion for a committee of welcome. A few leaders in the local profession will say, with conviction, that “there is always room for a well trained man.” They will help to set the stage for the neophyte by arranging a suitable hospital appointment and then, as a sympathetic audience, sit back to watch Act One unfold. The remainder of the doctors will appear to be singularly disinterested. They have hitherto not recognized any special need. Patients in the new category may be a rarity in their experience. Or they may always have treated, with satisfaction, the lesser conditions in the new field, and hold the conviction that what they cannot treat should go to another center, preferably far away.

One’s early experience in actual practice is apt to shatter the complacency that years of sheltered post-graduate study usually provide. The first patient who appeared on my doorstep complained of blurred vision, and had some obscure form of retinal degeneration. I was almost as shocked by his name as by my failure to recognize his disease. His family name and surname were the same as a very distinguished neuropathologist. The significance of this curious coincidence I was never able to fathom. If the first surgical case had presented himself with the same name I might have heeded the obvious warning and been spared an ordeal. There was little doubt that this patient had a brain tumour but localizing evidence was not overly clear. It was a shock to find that the gallery was crowded with interns, nurses, and a generous sprinkling of staff doctors. After expertly turning down a bone flap I was unable to remove the tumour. Indeed, I could not find it. The audience would have regarded removal of that tumour as a near-miracle. Having seen one try hard and fail, they were satisfied and friendly. The decision to take up a life of logging or fishing, which had been resolved by the operator during the course of his unsuccessful endeavour, was abandoned. A career in neurosurgery was launched.

Fifteen to twenty years ago it was easier for a neurosurgeon to obtain special dispensation for equipment and operating room than it is today. There was no need for reserved beds. Most of the major neurosurgical operations were tedious, and impressive by virtue of their length. “How do you ever stand those long operations?” was the daily query of our colleagues. Only the irreverent asked “What are you doing all that time?” Nowadays, our operating time corresponds with the average major procedure in general surgery. Operation on the chest and heart may be much longer and perhaps more impressive. A bone flap for brain tumour is inconspicuous on the daily operative list of a large general hospital. Any air of grandeur which might still have lingered has been dissipated by the very serious pressure for hospital beds, which makes even our most sympathetic colleagues look with a jaundiced eye on special indulgence.

To accomplish good neurosurgery in a non-teaching general hospital, within the framework of a department of general surgery, requires a certain tenacity of purpose. Whether one works exclusively in a single, specially designed operating room, or in several different hospitals, or in six different
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operating rooms in the same hospital—as I have done, one can devise and improvise a setup that is adequate. But there can be no quarter with the fundamental principles of our special craft. Firm insistence on standards of skin preparation, draping and wound closure, together with an instinct to handle tissues gently, rigid control of hemorrhage, and a keen awareness of the dangers of anoxia; this has maintained our prestige in the changing order of surgery. It has allowed us to wander with singular impunity from scalp to toe, restricted only by the convention that we are seeking nervous tissue—neurological surgeons by repute, general surgeons by design.

The ability of the well-qualified neurosurgeon to extend his surgical activities outside the confines of the skull and the spinal canal has allowed many of us to develop a satisfactory practice in a community which, so we were told, could not possibly support the services of a “brain surgeon.” It has also brought us perilously close to a situation which was foreseen by Dr. Cushing many years ago. Speaking in 1913 on “Realignments in Greater Medicine,” he said: “. . . the existence of the operating specialist, as contrasted with the general surgeon, is justified only if the former takes advantage of his opportunities to contribute to the knowledge of the disorders he specially treats. When progress ceases to be made, through the intensive studies which the smaller field of work permits, there is every reason why the vagrant specialty should be called back under the wing of its parent, general surgery, from whom under no circumstances should it ever be permitted to wander too far.” Therein lies our quandary. How may the neurosurgeon who has no research assistants, no teaching assignments, no intensive concentration of special cases, maintain the zeal to investigate and to promote knowledge in his restricted field, failing which he deserves and will receive no special privilege?

Experience has taught me some of the negative answers to this question, and a very few answers that might qualify as positive. One has learned not to initiate bright projects, which depend chiefly for their sustenance on the activity of someone in an ancillary department. Alternatively, it takes only a few lessons to find how tiresome and ineffective is any attempt to duplicate the activities of another department in one’s own person. Try making a clinical movie, all by yourself, to be persuaded of that. Unless one is an inventive fellow or a gifted craftsman with a flair for improving the mechanics of our job, the most satisfactory contribution is entirely a product of mind—the revealing consideration of a solitary case, or the fruitful synthesis of a well chosen group.

One of the outstanding exponents of this method was the late Professor Otfrid Foerster, who is remembered with affection by many of this Society. He had an unusual capacity for extracting scientific data from purely clinical observations. Sometimes it appeared to the foreign workers at his Clinic, as though he regarded all diseases of the nervous system, or operations thereon, as physiological experiments. That was, of course, only one side of his character as a doctor, but it was the most evident aspect to his pupils. The back-
ground of his special ability was an encyclopedic knowledge of the literature in neurology and neurosurgery, and particularly in neurophysiology. Professor Foerster’s methods are as favorable to the circumstance of practice in an isolated general hospital as in a specialty service within a university. They are particularly adapted to the needs of a lone neurosurgeon because they depend on no one but himself.

**LATER ON**

Before I am tempted to overstrain your credulity I will abandon the role of venerable sage, and leave further consideration of this subject to my successors in office, who may serve as a better example. There is another aspect of a career in neurosurgery which I introduce with diffidence, although convinced that it is a matter of importance. I refer to the responsibility of the neurosurgeon to the medical profession as a whole, having in mind the problems of medical economics.

This Society was formed during a period that some dismal realists now refer to as the “Hungry Thirties.” It was a time when agencies outside of medicine were beginning, in this country, to scrutinize critically the costs of medical care. Dr. Cushing was keenly aware of the far-reaching implications of the problems and became earnestly involved in the activities of a committee of national importance. The story is well told by John Fulton. During 1934–35, Dr. Cushing was a member of the Medical Advisory Committee to the Committee on Economic Security. There was then being evolved in Washington the first of a series of congressional bills with which you are all probably more familiar than I. Harvey Cushing distrusted reformers outside of medicine who proposed to alter the whole pattern of medical practice. His attitude in the face of these problems was forthright, the reaction of an individualist who made up his mind about the important issues and then strove mightily to be consistent. Feeling secure in his position in the medical world, he did not hesitate to criticize what he considered to be faults in the attitude of organized medicine, at the same time that he proposed more considered thinking to the enthusiasts for extreme legislation.

It would be an affront to our colleagues in general practice and in the other specialties, to suggest that a training for neurosurgery endows the recipient with any special ability to lead medicine out of today’s economic morass. But an established neurosurgeon has a position in his medical community which should make him potentially more acceptable for responsible office than many of his confreres. As a relatively lone specialist who draws patients from a wide field, he has made the close acquaintance of a very large number of doctors. He has no obvious axe to grind. Sir William Osler once said of himself that he was befriended by all medical men because he was in competition with none. The relative absence of competition and the special facilities for hospital work that are usually enjoyed by the neurosurgeon, are privileges to be repaid, if privilege is to remain.

Most of my friends in medical practice talk and act as though they would
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like to forget about economics, if that were possible. They have been trained to treat the sick and want only to get on with the job. As matters concerned with the costs of medical care become more complex, they become increasingly frustrated. When their problems are brought to medical meetings it is not unusual for confusion to be further compounded. Like Mrs. Ramsbotham, whose young Albert was swallowed by the lion, they feel that “someone’s got to be summoned.” They wonder whom they should trust, and vaguely hope for good leadership.

At a time when traditional ethical and social values in Western civilization are in the melting pot, it is not surprising that the claim of Medicine to remain an independent, self-governing guild should be challenged. It is perhaps more surprising to sense the unwitting faith in our organization that is implied by our demand for continuance of a large measure of self-government. Guidance of our affairs has rather suddenly become very complex. Responsible office in a general medical society can no longer be delegated as a mere token of esteem. Few of us are fitted by personality or training to withstand buffets of public criticism, the rancour of dissatisfied colleagues, or worse still, the doubts of uninformed friends. Yet this may be the lot of a leader in Medicine, today. We require men who will consistently represent the profession as a whole, men who will speak out for Medicine. They are needed, not alone in the councils of national associations, but in the smaller societies and committees of the regions and districts. They must come from all branches of medicine—not excepting neurosurgery, which has seldom shown any predilection for the ivory tower.

REFERENCES