The Attributes of a Good Surgeon

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External influences are slowly changing the face of surgery. In this modern day, a surgeon is expected to meet many expectations from numerous stakeholders. Following is a student’s perspective on the attributes of a good surgeon that not only enable him to satisfy these criteria but also provide him with qualities that a student will endeavour to emulate throughout his career.

The surgeon’s craft has advanced from the days where a barber or butcher treated cuts, burns and fractures. It has evolved from the days when it was ridiculed as a primitive occupation in the eyes of physicians, lawyers and theologians. Today, with the proliferation in knowledge of physiology, anatomy and pathology, we have more than thirteen thousand different diseases, syndromes and injury types according to the World Health Organisation. Thus, it is no wonder that surgeons perform more than 230 million major operations annually across the world. The increased know-how has subsequently led to increased training to master the knowledge. A surgeon undertakes four to six years of medical school training, works for at least two years to learn the basics of patient care and spends six years training to perfect the execution of the knowledge previously attained. Even this is not sufficient to keep up with the growing complexity and sophistication of medicine due to the dynamism of the field and the sheer breadth and depth of knowledge required. However, the recent trend of refined specialisation has seen an enormous improvement in capability and outcomes; where patients once spent weeks in hospital after minor surgeries and death was an accepted outcome, day surgery has become commonplace and mortality has dramatically decreased.

The aforementioned advances in surgery have propagated a vast array of opinions regarding the ideal attributes of a good surgeon. These opinions are formulated by a plethora of stakeholders, namely, patients, lawyers, colleagues and students. There are obviously other parties who feel they can contribute to the discourse, these include; families, insurance companies, hospitals, and pharmaceutical and surgical device industries. All these different beliefs inevitably serve different purposes. The patient wishes to be treated as more than a ‘patient’ and desires a counsellor, a healer, and a friend all in one. The lawyer accuses the surgeon of negligence and urges a more foolproof practice whilst pursuing a path of prosecution. Colleagues expect the highest level of commitment to all things surgical. This begins with collegial involvement and training young surgeons using the oldest apprenticeship model: see one, do one, teach one. Furthermore, a surgeon must remain up to date with contemporary data derived from the wealth of articles.
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published each year, further their craft through research and be a leader of sorts in an ever growing
team of professionals treating any given patient. Finally, students are a unique group that have
expectations of surgeons. When these are met, it leads to inspiration, respect and a dedicated effort
to emulate that surgeon who, during their first surgical term many years ago, ignited their passion.
As a student, I can only legitimately report on the student’s perspective but wish to briefly reflect
upon the other stakeholders.

Firstly, the patient. In our current temporal context of the ‘the information age’, the patient
has access to more cyber knowledge than in any preceding era. Globalised media reporting on
astounding surgical success and innovation has increased the collective weight of expectation not
only for surgeons but for all medical professionals. The eradication of complications is almost
demanded, not merely expected. Furthermore, it is likely that a surgeon’s individual complication
rate will become public knowledge in the near future. This will only serve to increase this demand.
Excellent diagnostic skills, decision making and dexterity are not the only desirable attributes of a
good surgeon. Patients also expect surgeons to possess flawless ethical and moral judgement,
display a great deal of compassion, and often to provide wholesome and holistic counselling in times
of great loss and grief.

When patients’ expectations are not met, or when a surgeon is found wanting of these
desirable attributes, it is not uncommon for lawyers to enter the fray. Once upon a time, the doctor
and surgeon were looked upon as having made their best effort, despite an unfavourable outcome.
A sincere apology was made, hands were shaken and life went on. However, in this age of litigation,
the fear of a writ has restricted surgeons from practicing with the freedom that they once
possessed. As we increase in intelligence and intricacy in all pursuits of life, we find we struggle to
deliver on them faultlessly all of the time. From clerical and administrative errors to flawed designs
and wrongful imprisonment, it is no secret that mistakes occur. Surgeons are not exempt from this
phenomenon. Their errors can be grouped into those created through a lack of available best
practice knowledge and those born of not applying this knowledge correctly. Sometimes, it is just a
matter of inadequate note keeping. Therefore, students and surgeons alike are reminded to be
diligent in recording every narrative of every patient. Regardless of the source of error, lawyers have
used language such as ineptitude and negligence. They expect surgeons to be immune to the
bombardment of personal and professional criticism. For the lawyer it is not personal, just business.
Simply, a good surgeon is one who does not get sued. Surgeons have acknowledged that defeat
occurs despite dedicated effort rather than from a lack of it and so they have attempted to solve the
problem by encouraging more training and experience. It is now required that surgeons practice with complete integrity, upholding the law and maintaining a professional and ethical standard.

This discussion leads to a range of attributes that surgeons find desirable in their current and future colleagues. Thomas Vicary, a mid-sixteenth century surgeon and author, described the attributes of a good surgeon. He said, "I doe note foure things most specially that every chirurgien ought so to have: the first, that he be learned; the second, that he be expert; the third, that he be ingenious; the fourth, that he be well mannered." Today, excellence in both expertise and knowledge is ensured by hours on the training simulator, supervised exposure to increasingly complicated procedures and rigorous research and assessment requirements.

Trustworthiness, an expectation that a surgeon will be responsible in their personal behaviour toward their charges, is also sought after. Even the selection process of future surgeons reveals that trustworthiness is paramount. Trusting a fellow surgeon's appraisal of a prospective surgeon, confirms the inherent trust that surgeons have in one another. Trustworthiness extends to the operating theatre, an arena within which the surgeon once monopolised but now governs less autocratically. Success now requires large enterprises, teams of clinicians, high risk technologies and knowledge that exceeds any one person's abilities. Discipline is also desirable to provide best care. Discipline is required in following prudent procedure and in functioning on a day-to-day basis. Discipline keeps the mind and body sound in an extremely demanding environment. Some would say discipline is the hardest to attain and maintain, which is why it takes many years to prove one's mettle as a surgeon.

Surgeons have always endeavoured to improve themselves and this has been demonstrated by the increasingly rigorous selection criteria applied to young aspirants. Recently we find that surgeons must also take on the mantle of teacher and health advocate. As long as there remains a collegial body which simultaneously unites and propels surgeons forward, there will always be a high standard of excellence among surgeons. William Halsted, father of several surgical procedures and champion of newly discovered anaesthetics, spoke the earliest sentiments regarding a surgical collegial body in an address at Yale in 1904. He passionately stated that, "We need a system, and we shall surely have it, which will produce not only surgeons but surgeons of the highest type, men who will stimulate the first youths of our country to study surgery and to devote their energies and their lives to raising the standard of surgical science." This brings us to the student, 'the first youths of our country'. What is it about surgery that so grips the imagination? That enables a student to stand holding onto a Langenbeck retractor for hours with
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no regard of even the most primitive requirements of the body? That motivates such passionate and sustained efforts to become one of the chosen few? The answer is often discovered in the nature of surgery itself; the extremely unique power and privilege one has over a patient as his innermost hopes, fears and body are exposed upon the operating table, the radical transformation that occurs in a patient’s life after a successful operation, or the satisfaction the surgeon derives from a faultless procedure knowing that all the time, the difference between life and death was perhaps one millimetre.

However, what most do not realise is that the answer also lies within the nature of the surgeon. Within the surgeon lies the power to stimulate, engage, inspire and encourage the eager student. Of course there are varying styles, some may choose to harshly admonish in the present, in order to reap a harvest of diligence in the future. Some choose to mentor the student and gently impart wisdom accumulated over many years. Whichever path is chosen, a dedicated student will always be quick to learn and eager to please. Matters of diagnosing, deciding when not to treat, and reconciling a surgeon’s life with a life of surgery are concerns a student may have and hence these spheres are where a good surgeon can have an enormous influence.

For a student there is nothing more stimulating than a surgeon who zealously teaches his craft. Genuine passion breeds raw enthusiasm which in turn engenders a desire to discover the same reality that has so captured the imagination. A student will love to learn if the surgeon loves to teach. Furthermore, an attitude of fostering interest and taking time to invest in a junior translates to a similar interest in patients, an interest that runs deeper than a laboratory result or a diagnosis. A student is impressionable, always observing and forming opinions. Already an appreciation of the surgeon is developing and the student seeks more.

When a patient presents at a surgeon’s rooms, letter in hand, above all else they seek advice. “Is it serious? Will I be ok? Does anything need to be done?” Yet in almost all medical fields there seems to be, rightly so or not, a large emphasis on diagnosis and a desire for cure. Add to that a glut of diagnostic techniques and we almost pursue an abnormality to remedy. The surgeon is required to make prudent decisions regarding the patient and model these skills to the student. I recently attended the Urological Association of Australia and New Zealand’s Victoria Section meeting at which the benefits of prostate specific antigen (PSA) were discussed at length. Since the commencement of PSA aided diagnosis in 1987, there has been a harvest effect and a large number of prostate cancers diagnosed. At present only a low volume of cancers are detected along with benign hypertrophy or cancer imposters. Consequently, over-diagnosis and unnecessary biopsies are becoming a burden on the system as well as increasing patient anxiety. In response to this we find
increasingly sophisticated PSA related diagnostics such as PSA velocity, doubling time and various isoforms that exist within the blood to further aid diagnosis. My point is not to dispute the merits of these measurements but rather to highlight what is known as the 'Three Toaster Model'. When presented with two toasters at a store, the consumer will more often than not chose the less expensive toaster. Marketers then add a third toaster which is obscenely priced. The third toaster is not manufactured for sale per se but rather its function is to shift the consumer's attention to the second toaster and hence boost sales. The first toaster is soon forgotten although it is perfectly adequate. The student is likely to fall into the same trap as industry and technologically driven studies generate more and more ‘toasters’. The student must learn the art of diagnosis, knowing when to stop searching and start listening. A surgeon is particularly well placed to model this fine attribute.

Knowing when not to treat a patient is a dilemma that often plagues medical professionals. Almost all of our training is centred on when to intervene, when to heal with steel. There is no formal training on when to discuss the inevitable with patients and family. This reality is probably constructed because of the difficulty of the task itself. Atul Gawande, distinguished endocrine surgeon and author, tells of the difficulties surgeons face when talking about death. In a recent article in the New Yorker, he reports from a study that found that a majority of doctors overestimate survival times of terminally ill patients. When pressed by patients, it is no wonder that specific details regarding prognosis are not forthcoming and a relatively optimistic rather than realistic stance is taken.

As a student, seeing devastating, incurable cancers seeding throughout the body can be quite an emotional jolt especially if we have seen similar events in family members. It becomes even more troubling when we witness fourth line experimental chemotherapies being administered or massive procedures attempted in an effort to “do all we can”. This motto has taken on new meaning. Once it meant trying everything possible within the realm of common sense and good practice to save a life. Now, however, it necessitates placing a patient on every monitoring device possible and inserting as many tubes as one can find, in a bed costing a few thousand dollars a night. Recently, a 79 year old patient with pancreatic cancer developed sepsis and end-organ failure. In an effort to “do everything possible” he was admitted to the intensive care unit and died slowly over forty eight hours as his family looked on. Not long after, during my general surgical term, I sat in a family meeting where the surgeon and his registrar spent more than an hour talking with the family of a young patient with a similarly low prognosis. The surgeon realistically outlined the futility of any further intervention. However, he did so with a level of compassion and empathy that enabled the
family to truly accept their loved one's fate without requesting the whole gamut of intervention. The patient died a day later, surrounded not by tubes, beeping monitors and others fighting for their life, but surrounded by his loved ones and prepared to cross the final frontier. The surgeon had not discussed further treatments or 'do not resuscitate' orders, but had rather helped the patient and the family overcome their anxiety about death. It required no less skill than performing an operation. For a student, there are many lessons to be learnt from this experience. We can learn about life and its frailty but more importantly recognise when to concede defeat in a situation in which death will always be the victor. A surgeon, who labours every day in this fight, can always be a magnificent example to students.

A surgeon's life is unique. They are expected to live up to the expectations of many. The thousands of people a surgeon meets throughout his life will all demand the highest that a human can offer. Constant relocation as a trainee, demands on time and financial burden can place strains on relationships. A surgeon has to balance work life with personal life, balance being on call, researching, teaching, consulting and operating with family, children and social responsibilities. However, a surgeon is a man before he is a surgeon. He must at once recognise that he is a man with foibles. Although William Halsted contributed to surgery in ways that cannot be measured, he was addicted to cocaine for the better part of his life. Countless more have succumbed to extraordinary forces beyond their control. Their families have suffered as they devoted all their energies to surgery. Some say the greater you are, the further you have to fall. Yet they all persevered. And that is the greatest attribute of all. A man who perseveres despite sacrifice and loss is a man worth emulating. A surgeon must be such a man and simultaneously, model a life of perseverance to the student.

A good surgeon knows exactly what is expected from him. He will place his patients first, choosing from his diagnostic armament wisely, operating bravely, and placing his instruments down graciously. He will be above reproach and be a person of integrity. He will be a formidable standard bearer for his colleagues. Lastly, he will endeavour to instruct the student placed under him. He will impart his wisdom and tools with which he overcame what lies ahead. Franklin D. Roosevelt once said, "When you come to the end of your rope, tie a knot and hang on." On the last day of my general surgical term, my supervising surgeon asked me if I knew how to hand tie. I had waited so long for this moment. Under the eyes of all the theatre staff, I clumsily tried to tie the drain stitch but failed to complete the proper throws. The surgeon patiently waited as perspiration built up under my face mask and expletives started forming on my tongue. As I successfully tied the knot on my fourth attempt he chuckled and said, "Well done". In my mind, he was a good surgeon.
References


