EDITORIAL

Is Open Urologic Surgery a Lost Skill in this Era of Minimally Invasive Urologic Malady Management?

ur "Legend in Urology" for this edition is Dr. Christian Chaussey. He, as one will recall, was instrumental in the development of extracorporeal shock wave lithotripsy (ESWL). In the beginning, this technique was "soundly" rejected by the urologists, although later, an attempt was made by radiologists to usurp control of ESWL from urologists, which Dr. Chaussey rejected. Today, urologists have to think very hard to remember the last time that they operated on a patient with a kidney stone. Between percutaneous nephrostolithotomy (PCNL), ESWL, and endo-urology, the skill and ability to operate on a patient with a kidney stone is being lost. Kurtulus tells us in this journal the reasons why certain patients may have more significant bleeding after PCNL.

In 1996, Christian started working on high-intensity focused ultrasound (HIFU) for the treatment of prostate cancer. Again, his work was met with significant resistance and much skepticism. However, he persisted, and so far, in Germany, urologists have performed over 2500 HIFU procedures, with excellent results. In March 2006, I brought the first American-made HIFU machine to Canada (HIFU is still not FDA approved) and am still experiencing the friendly criticism from a number of colleagues. However, this procedure represents our general approach to patient management today: to perform surgery that involves minimal invasion, maintains good patient quality of life, ideally less morbidity than open surgery, with the goal of providing comparable cure rates. There is still resistance to HIFU among some urologists mainly because of a lack of long term data, although I have been approached by radiologists who strongly desire training in this procedure.

My concern is for our future urologists. As Klausner reports in his paper on the long term follow up of subcapsular prostatectomy, these procedures are being done for very enlarged prostates. With the widespread acceptance of medical management of benign prostatic hyperplasia, what we are experiencing now is that by the time medical therapy fails, these prostates have grown to a significant size, making the minimally invasive approach much more difficult for the typical surgeon who performs green light laser or TURP procedures. However, the urologist who has been trained in a typical teaching-hospital will not have seen many retropubic subcapsular prostatectomies and will not have the skills to perform this open-surgery operation.

We are also adopting a more conservative watchful waiting or expected surveillance approach to prostate cancer. However, as Lee reports, in his study, 43 of 66 patients (65%) who rejected a qualified surveillance management option were upstaged at the time of radical prostatectomy. I do believe in the approach championed by my colleague Klotz and others. It has saved thousands of men from unnecessary surgery, but I am not sure how many "cures" we have missed because of "threshold variations" or inconsistent and inadequate sampling techniques. Are we becoming reluctant to do open operations, because we are too concerned about the potential side effects, which could theoretically be mitigated by the small number of Canadian Urologists that have had adequate training to perform laparoscopic or robotic radical prostatectomies?

Guzzo reminds us that big bladder cancer deserves big surgery. However, even if lymph nodes are positive, with adjuvant chemotherapy, survival and response can definitely be enhanced. Do not be discouraged by bulky cancer, because debulking surgery will have a very positive impact on survival.

Rodrigues reiterates that radiotherapy is very successful in the management of genitourinary (GU) malignancies. However, if one remembers the postulate that the intent of this less invasive "radical" therapy is to minimize collateral damage, then by utilizing helical tomography the beam and treatment can be even more precise, thereby reducing side effects. Even this conservative radical therapy has side effects and needs to be improved.

The ability to do efficient, clean and complete open surgery is a tremendously valuable acquired skill that is achieved and perfected with the volume of surgeries. We must strive to obtain that fine balance in adopting an aggressive conservative approach ("aggressative") to the patient with a significant benign or malignant GU condition.

One should never feel embarrassed about recommending open surgery for the right patient and for the right reasons, but it behooves experienced urologists who recommend open surgery to provide up-and-coming urologists with the skills to be able to achieve comparable morbidity and long term survival results as those achieved with a "minimally invasive approach."

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