

Teaching Radical Perineal Prostatectomy in Sub-Saharan Africa: A Minimally Invasive and Cost-Effective Approach to Treating a Malignant Epidemic

Introduction and Objective: We review the unique applicability of radical perineal prostatectomy in West Africa to the treatment of both organ-confined and locally advanced prostate cancer, and the successful teaching program in Dakar, Senegal where radical perineal prostatectomy has been incorporated as a treatment option for the management of prostate cancer.

Materials and Methods: In June 2004 the first radical perineal prostatectomies were performed at Hôpital Général de Grand Yoff in Dakar, Senegal as the start of what would grow into a formal training program to teach this minimally invasive approach to radical prostatectomy. The program was modeled as a classic surgical training program, the hallmarks of which are active participation, direct supervision and graded surgical responsibility. The goal of the program was to establish a center of excellence where radical perineal prostatectomy would be both performed and taught.

Results: Between June 2004 and April 2007 the emphasis of the program was on teaching the anatomy pertinent to perineal prostatectomy. This was accomplished through the use of didactic classroom lectures, surgical videos and intraoperative teaching with West African surgeons as first assistants. Thereafter, the West African surgeons were encouraged to assume a greater responsibility in the operating room. Within just a few years these surgeons were able to progress to completing the procedure from start to finish under direct supervision and, ultimately, to performing the entire procedure without supervision.

Conclusion: Radical perineal prostatectomy is ideally suited to the surgical treatment of prostate cancer in sub-Saharan Africa. It is cost-effective and arguably the least invasive form of radical prostatectomy. It is associated with an average blood loss that does not generally require post-operative transfusion, can be performed in a nerve sparing fashion and affords excellent rates of post-prostatectomy urinary continence. Through a dedicated teaching program the procedure has been successfully taught to West African surgeons and is currently being offered as a surgical treatment option for organ-confined and locally advanced prostate cancer in Dakar, Senegal. This will serve as the platform to teach radical perineal prostatectomy to other urologists throughout the region, and indeed, across the entire African continent.