



Reconstructive Urology

Two-Stage Transperineal Management of Posterior Urethral Strictures or Bladder Neck Contractures Associated with Urinary Incontinence after Prostate Surgery and Endoscopic Treatment Failures

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Abstract

Objectives: The treatment of posterior urethral strictures or bladder neck contracture associated with severe urinary incontinence after prostate surgery and failure of endoscopic treatments is controversial. We report our experience with a transperineal approach in two steps: end-to-end urethroplasty/anastomosis and subsequent artificial urinary sphincter implantation.

Methods: Between September 2001 and January 2005, we observed six patients (58–68 yr old), with a combination of severe urinary incontinence and posterior urethral stricture with anastomotic bladder neck contracture after prostate surgery. In all cases, repeated endoscopic treatments of the strictures failed. The patients underwent transperineal end-to-end urethroplasty or anastomosis followed by transperineal artificial urinary sphincter placement after 6 mo.

Results: After the first surgical step, all patients were completely incontinent with absence of urethral strictures and complete anastomotic healing in all cases. Therefore, all patients underwent artificial urinary sphincter insertion. After a mean follow-up of 38 mo (range: 18–57 mo), five patients are continent with no postvoid residual urine and a perfectly functioning device. One artificial urinary sphincter was removed due to urethral erosion.

Conclusions: In patients with posterior urethral strictures or bladder neck contractures associated with severe urinary incontinence, an artificial urinary sphincter implantation as a second step allows verification of the outcome of a previous end-to-end urethroplasty or anastomosis and utilizes a dedicated operative field to reduce the risks of prosthesis implants.

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