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SURGICAL APPROACH TO THE TREATMENT OF "SPHINCTERIC STRICTURES" OF THE URETHRA

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ABSTRACT

Elimination of scar narrowing and restoration of patency of the urethral lumen "at any cost" often entails certain undesirable consequences and can lead to the development of so-called "sphincteric strictures", because fibrous changes affect the urethral sphincter, or are localized at the border of the bulbous and membranous parts of the urethra. For urethral strictures, the most appropriate option should be used in accordance with the specific clinical situation.

Keywords: urethra, stricture, anastomosis, urethroplasty, trauma, disease

INTRODUCTION

Elimination of scar narrowing and restoration of patency of the urethral lumen "at any cost" often entails certain undesirable consequences and can lead to the development of so-called "sphincteric strictures", because fibrous changes affect the urethral sphincter, or are localized at the border of the bulbous and membranous parts of the urethra .

The purpose of the study is to analyze anastomotic urethroplasty without crossing the corpus spongiosum for urethral strictures.

MATERIAL AND RESEARCH METHODS

The clinical group included 10 patients who underwent "anastomotic urethroplasty without crossing the corpus spongiosum." The median age of the patients was 68.5 years, and it should be noted that 5 patients (31.3%) were younger than 45 years, and 8 patients (50%) were older than 70. According to the etiological factor, urethral strictures of iatrogenic origin predominated (68.8%). Moreover, in 10 out of 15 cases, the formation of a stricture was a late complication of transurethral interventions. In the vast majority of cases, the stricture (93.3%) was localized in the proximal part of the bulbous urethra. This location is typical for trauma to the urethra during transurethral insertion of instruments. Such operations were not performed in patients with post-traumatic strictures, due to the prediction of the presence of spongiofibrosis in the stricture area. The indication for surgery was: stricture of the bulbous urethra, less than 2.0 cm in length and not of post-traumatic origin.

Study results: All patients had moderate to severe urinary disorders, which led to a significant decrease in quality of life. This was reflected in the average IPSS score of 23.6 points and the median QoL score of 4.5 points.

All patients under 45 years of age had intact erectile function. The average score for the IIEF erectile function domain 30 was 23.25 + 2.1 points. All patients over 70 years of age had severe erectile dysfunction. Their EF domain score on the IIEF-30 scale was 1 point.

All patients with preserved sexual function had no sexual dysfunction in the form of decreased blood supply, sensitivity of the glans penis, erectile or ejaculatory dysfunction.

Postoperative complications were recorded in 2 patients. One patient was diagnosed with a minor soft tissue hematoma of the perineum on the 2nd day after surgery, which did not affect changes in therapy in the postoperative period. The second patient developed acute epididymitis on the 18th day after surgery, which was treated with conservative therapy.

All patients were activated in the evening of the day of surgery. Non-steroidal anti-inflammatory drugs were used to relieve pain symptoms. Antibacterial therapy was not prescribed. The patient's stay in the hospital after surgery was 2-3 days. The patient was discharged from the hospital with a urethral catheter. Retrograde pericatheter urethrography was performed on an outpatient basis on the appointed day. In the absence of contrast material leakage, removal of the urethral catheter was combined with voiding cystourethrography. On the same or the next day, the patient underwent uroflowmetry.

In the first two patients, the first retrograde pericatheter urethrography was performed on the 12th day after surgery. The image showed complete healing of the urethra, which was confirmed by the absence of periurethral contrast material leakage. Removal of the urethral catheter was combined with voiding cystourethrography on the 14th day after surgery. In the third patient, pericatheter urethrography was performed already on the 10th day, where there was also no flow of contrast agent through the suture line, which indicated complete healing. The urethral catheter was removed on the 12th day. In the fourth patient, during an X-ray examination on the 10th day, there was no leakage of the contrast agent into the tissue in the surgical area. Repeated pericatheter urethrography was performed on day 15, where a significant decrease in the amount of contrast agent flowing outside the urethra was noted. On the 17th day in the evening, the patient developed symptoms of incipient acute epididymitis. On the morning of the next day, on the 18th day after surgery, the urethral catheter was removed along with voiding cystourethrography, where leakage of the contrast agent was not detected.

The patient was immediately prescribed standard conservative therapy for acute epididymitis, including antibacterial, anti-inflammatory, analgesic drugs, restriction of physical activity, and wearing a suspensor. With conservative therapy, the symptoms of epididymitis were stopped.

In the fifth patient, pericatheter urethrography was performed on day 7 with removal of the urethral catheter the next day.

In the sixth patient, the urethral catheter came out on its own on the 3rd day after surgery. Spontaneous urination was restored, and he did not go to the doctor, but came for an appointment on the 7th day after the operation, as he was prescribed upon discharge to perform pericatheter urethrography. During retrograde urethrography in this patient a week after surgery, no leakage of contrast material beyond the urethra was observed, which indicated the tightness of the anastomosis and healing of the urethra.

According to control retrograde urethrography six months after surgery, urethral patency was preserved in 9 out of 10 patients (93.7%). Relapse occurred in one patient 4 months after surgery. The reason for the formation of the stricture in this case was, in our opinion, a history of transvesical adenomectomy. Correction of the stricture was achieved by performing internal optical urethrotomy. The patient is under observation.

In one patient, according to retrograde urethrography, a narrowing of the lumen of the urethra in the surgical area was noted by 20% compared to the presenting sections. At the same time, the maximum urination rate was 24.1 ml/s.

CONCLUSION

For urethral strictures, the most appropriate option should be used in accordance with the specific clinical situation.

REFERENCES

1. Buckley, J., McAninch J. Distal penile circular fasciocutaneous flap for complex anterior urethral strictures [Text] // BJU Int. – 2017 Jul;100(1):221-31.
2. Chapple, C., Andrich, D., Atala, A., Barbagli, G., Cavalcanti, A., Kulkarni, S., Mangera, A., Nakajima, Y.. SIU/ICUD Consultation on Urethral Strictures: The man- agement of anterior urethral stricture disease using substitution urethroplasty [Text] // Urology. – 2014 Mar;83(3 Suppl):S31-47.
3. Chen, M.L., Odom, B.D., Santucciю R.A. Substitution urethroplasty is as suc- cessful as anastomotic urethroplasty for short bulbar strictures [Text] // Can J Urol. – 2014 Dec;21(6):7565-9.
4. Ivaz, SL, Veeratterapillay, R, Jackson, M.J, Harding, C.K., Dorkin, T.J., Andrich D.E., Mundy, A.R. Intermittent self-dilatation for urethral stricture disease in males: A systematic review and meta-analysis [Text] // Neurourol Urodyn. – 2015 Jun 11.
5. Johnsen, N.V., Dmochowski, R.R., Mock, S., Reynolds, W.S., Milam, D.F., Kaufman, M.R. Primary Endoscopic Realignment of Urethral Disruption Injuries: A Double-Edged Sword? [Text] // J Urol. – 2015 Apr 4. pii: S0022-5347(15)03686-1.
6. Morey, A.F., Watkin, N, Shenfeld. O, Eltahawy, E., Giudice, C. SIU/ICUD Con- sultation on Urethral Strictures: Anterior urethra--primary anastomosis [Text] // Urology. – 2014 Mar;83(3 Suppl):S23-6.
7. Osman, N.I., Hillary, C., Bullock, A.J., MacNeil, S., Chapple, C.R. Tissue engi- neered buccal mucosa for urethroplasty: progress and future directions [Text] // Adv Drug Deliv Rev. – 2015 Mar;82-83:69-76.
8. Palmer, D.A., Buckley, J.C., Zinman, L.N, Vanni, A.J. Urethroplasty for high risk, long segment urethral strictures with ventral buccal mucosa graft and gracilis muscle flap [Text] // J Urol. –2015 Mar;193(3):902-5.