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OUTCOME OF OBESE FEMALE PATIENTS TREATED BY T.O.T.® FOR STRESS URINARY INCONTINENCE

Hypothesis / aims of study

To assess the effectiveness of T.O.T.® in women with BMI over 30 compared to patients with BMI under 30.

Study design, materials and methods

48 consecutive patients with Stress Urinary Incontinence and a BMI > 30 underwent T.O.T.® (Uratape® and Obtape®, non elastic polypropylene tapes) procedure from November 2001 to January 2004. They were compared to 197 patients who underwent the same procedure in the same period of time. Patient's characteristics, peri-operative and post-operative complications, continence rates and voiding parameters were analysed according to BMI. Mean age was 58 years (31-81) and mean parity 2.7 (0-8). Patient's characteristics are described in table 1.

Table 1

	BMI<30 N=197	BMI>30 N=48	P
Age	57±12	58±13	NS
Parity	2.2±1.1	2.7±1.7	NS
Menopausal status	62.4%	54.2%	NS
Previous surgery	16.2%	10.4%	NS
Pure stress incontinence	51.3%	31.3%	<0.01
Stress incontinence and OAB dry	14.7%	37.4%	<0.001
Mixed incontinence	31.9%	31.3%	NS

Data are presented as mean ± standard deviation, %, NS=not significant.

We didn't find any statistical difference between the 2 populations of patients, except for associated urgencies. Symptoms of OAB dry was higher in the group of BMI>30.

Anaesthesia was general for 38 patients, spinal for 8 patients and local for 2.

Results

Mean follow up was 12 months (3 -29). 2/48 (4,2%) peri-operative complications occurred : one vaginal perforation and one urethral perforation. No immediate post-operative retention was observed, but 2/48 patients (4.2%) had a residual urine>100ml lasting 2 and 5 days. 1 of the 2 patients was treated by tape release (dilatation), and both patients recovered normal micturition (based on uroflowmetry). 1 patient complained from transient back pain due to the position during the procedure. Effectiveness was analysed according to the BMI and no statistical difference was found in the 2 groups (continence rates= 85.7% for BMI<30 and 77.1% for BMI>30). These results are in accordance with previously reported continence rates in obese patients.(1)

Among the 33 patients suffering from urgency or urge incontinence, the urgency disappeared for 19/33 (57.6%) patients, was improved for 7/33 (21.2%), and got worse for 7/33 patients (21.2%). 1/15 patients (6.6%) complained from *de novo* urgency.

Uroflowmetry, residual and duration of the micturition were analysed for 20 patients, both pre- and post- operatively, as shown in table 2, and no difference was observed between pre- and post-operative values. 2 patients had Qmax<15ml/s, but without any residual urine. None of the patient had Qmax<10ml/s.

Table2

	Pre-op	Post-op	<i>P</i>
Maximum flow rate (ml/s)	32,8 ± 14,1	29,3 ± 14,7	NS
Residual (ml)	10,8 ± 28,4	12,2 ± 20	NS
Duration of miction (s)	27,3 ± 18,3	34,4 ± 31,4	NS

Data are presented as mean ± standard deviation, NS=not significant.

Interpretation of results

T.O.T.[®] is a simple and minimally invasive procedure, with low morbidity even in the obese group. In addition, it is at least as effective in obese women as in those with lower BMI. Voiding parameters remain unchanged pre- and post-operatively.

Concluding message

Compared to other studies, T.O.T.[®] seems to offer a comparable efficacy to retropubic techniques (2) for treatment of incontinent obese patients.

References

- (1) Urinary stress incontinence in obese women: tension free vaginal tape is the answer. BJU-Int.2001 Dec;88(9): 881-3
- (2) Body mass index and outcome of tension free vaginal tape. Eur-Urol 2003 Mar;43 (3):288-92