HOW MANY WOMEN, UNDERGOING VAGINAL WALL PROLAPSE REPAIR, DO NEED CONCOMITANT MID-URETHRAL SLING?

Hypothesis / aims of study
women with anterior wall prolapse do not always complain of stress urinary incontinence. However, correction of the cystocele can relieve their obstructive voiding and unmask "occult" SUI. Various techniques have been described to elevate the anterior wall; with examiner finger's, ring forceps, pessaries, swabs, etc, during urodynamic testing to predict which women should have an incontinence procedure performed at the time of reconstructive surgery. However, women who have negative preoperative testing for occult SUI and undergo prolapse repair without a continence procedure may still develop SUI after surgery. This is likely because incontinence instruments, during reduction of prolapse, also increase the maximum urethral closure pressure and functional urethral length, which would mask incontinence. For this reason, reduction testing is not a highly effective method to guide surgeon in choosing which woman require a combined prolapse and incontinence procedure. on the other hand, it is unclear whether this incontinence is caused by straightening the urethra and reducing the bulge or secondary to the dissection of surgery. Also, it is necessary to mention that patients have to pay a lot of money to do these urodynamic tests with equivocal results or all of them should be done additional mid-urethral sling for possible occult SUI with it's special complication. The aim of this study was to know how many women undergoing pelvic organ prolapse repair, need secondary surgery for SUI.

Study design, materials and methods
Between August 2009 and February 2012, 40 women with symptomatic anterior vaginal wall defect or ant. & post, vaginal wall defect > stage 2 (according to the international continence society pelvic organ prolapse quantification system) and reported no stress urinary incontinence symptoms, were enrolled in this prospective trial. Before enrollment to the study, all patients signed informed consent documentation and were counseled about the potential for incomplete resolution of symptoms, or new symptoms of SUI, urinary retention or urge incontinence. All patients underwent a complete urogynecological investigation before the procedure (medical history, clinical examination, ultrasound examination). patients were operated by a single surgeon (an urogynecologist) in a educational hospital. Of the 40 patients, 13 patients underwent anterior colporrhaphy and 27 of them had ant & post. Colporrhaphy. Anterior colporrhaphy with mesh was done for 5 patients. All patients completed ICIQ-SF questionnaire before and 3 months after surgery. 14 patients had some symptoms of bladder overactivity without SUI symptoms. Power analysis was done and data was analysed using spss19.0, comparisons were performed, using pair t-test as appropriate. Significance level set at 5% and confidence interval 95%.

Results
There was not any history of surgery for gynecological disorders among the study participants. The mean age was 48.45 (SD 7.98). 3 women (7.5%) got de novo SUI after colporrhaphy but there was not statistically significant difference in stress urinary incontinence symptoms comparing before and after surgery [95% CI -0.075 (-.160, -.010) PV:08%]
14 patients (35%) had some symptoms of bladder overactivity before surgery (mean ICIQ-UISF score was 10.42±3.84), 3 months after surgery, ICIQ-UISF score reduced significantly to mean 4.5±4.20 [95% CI -5.928 (-8.106, -3.750) p<0.05]. one patient (1/40) got urinary retention after surgery, that was managed with an indwelling urethral catheter for 7 days and intermittent urethral catheterization for rest 4 weeks.
One patient complained de novo urgency symptoms after operation that was treated with an anticholinergic drug for one month.

Interpretation of results
Few patients with advance anterior vaginal wall prolapse got de novo SUI after colporrhaphy. On the other hand, patients with some bladder overactivity symptoms, presented significant reduction in their bothering signs after operation.

Concluding message
Overall, occult stress urinary incontinence has been reported to coexist with pelvic organ prolapse in different percentages. Urodynamic tests with or without reduction of prolapse can not discover occult SUI in all patients (because of some false negative results). On the other hand, just few patients with anterior vaginal wall prolapse, get de novo SUI after operation. Prophylactic mid-urethral sling during anterior vaginal wall prolapse repair, is not cost effective. Also it increases surgical complications like urinary retention, bladder perforation...
It may be concluded that for patients with advance anterior vaginal wall prolapse without symptomatic SUI, first we do a standard colporrhaphy. If she get new SUI after operation, we will decide for second treatment.

References

Disclosures
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