

VAGINAL MESH RECONSTRUCTION OUTCOME IN RELATION TO SEVERITY OF 3RD DEGREE ANTERIOR WALL PROLAPSE

Hypothesis / aims of study

Pelvic organ prolapse (POP) is a prevalent condition that is known to affect the quality of life.

It is common among older women, although other risk factors including high parity- vaginal deliveries, instrumental deliveries and high body mass index (BMI), have been suggested as predisposing factors.

Reconstructive surgery is a common treatment for 3rd degree prolapse.

The Pelvic Organ Prolapse Quantification System (POP-Q) is a staging system in which eight sites are measured and according to the measurements one can determine the severity of the prolapse and the leading site of the prolapse.

As opposed to 2nd and 4th degree, the 3rd degree is composed of a wide range of prolapse of the leading part.

Our medical center serves an orthodox Jewish population with a high average parity per women. As a result, there is a high percentage of women with symptomatic prolapse including 3rd and 4th degree prolapses

Until now there is no reference in the literature to the severity of the prolapse and its impact on the surgical outcome.

Our objective is to answer that question by comparing different degrees of anterior wall prolapse within the 3rd degree (according to POP-Q) and their surgical outcome.

Study design, materials and methods

A retrospective cohort study.

One hundred thirteen women who underwent reconstructive surgery using vaginal polypropylene mesh. Data from medical files was retrieved, including demographics, pre and post operation POP-Q measurements, surgical outcome from the follow-up visits.

The participants were divided according to their pre-operation POP-Q – Ba measurement and post operation outcome was reviewed and compared in relation to the pre-operation data.

Post operative measurement values of -3 or -2 were considered success.

Results

There were 89 women with 3rd degree anterior wall prolapse.

The women were divided into 2 major groups according to their pre-operation Ba measurement; one group comprised of Ba measured +2,+3, the second group was comprised of Ba measured +4 and above.

Post operative Ba measurements were compared in relation to the pre-op measurements.

Ba Pre-operative measurements		Ba post-operative measurements		total	
		Un successful	successful		
+2, +3 cm	Count	2	37	39	
	% within group	5.1%	94.4%	100%	
	≥ +4 cm	Count	15	35	50
		% within group	30%	70%	100%
total	Count	17	72	89	
	% within group	19.1%	80.9%	100%	

Interpretation of results

The success rate of reconstructive surgery for pelvic floor prolapse was statistically higher (94.4%) in the group comprised of +2,+3 Ba measurements (according to Fisher's exact test).

Other possible confounders were analyzed using logistic regression test and none was found to affect the main outcome.

Concluding message

According to our research the success rate of reconstructive surgery in mild 3rd degree prolapse is significantly better compared to advanced 3rd degree prolapse

This is the first report that addresses the issue of stratifying the 3rd degree anterior wall prolapse in correlation to surgical outcome and can be used as a prognostic factor to assess success rate of reconstructive surgery.

We believe that this information can improve the decision making process of electing the best treatment for patients with 3rd degree prolapse.

Disclosures

Funding: none **Clinical Trial:** Yes **Registration Number:** #021-16-MHMC **RCT:** No **Subjects:** HUMAN **Ethics Committee:** Maynei-Hayeshua Helsinki committee **Helsinki:** Yes **Informed Consent:** Yes