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## ANTERIOR AND POSTERIOR VAGINAL PELVIC FLOOR DEFECT REPAIR WITH THE AVAULTA BIOSYNTHETIC SUPPORT SYSTEM

### Synopsis of Video

In this video we show Anterior and Posterior Vaginal Pelvic Floor Defect Repair with the Avaulta Biosynthetic Support System (Bard, United States) in a patients with grade 3 uterus-vaginal prolapse wishing to maintain their uterus. The pelvic status was classified according to the international Pelvic Organ Prolapse staging system (POP-Q) (1).

The rationale of Avaulta Biosynthetic Support System is to repair anterior, central and posterior compartment difects with polypropylene prostheses without removing uterus, due to its importance in the pelvic balance.

### Hypothesis / aims of study

The aim of this new technique is to obtain a total vaginal recostruction, without intraoperative complications and recurrences, with the suspension for the uterus, as described by DeLancey (2, 3).

### Study design, materials and methods

The pelvic status was classified according to the international Pelvic Organ Prolapse staging system (POP-Q) [1].

The anterior vaginal wall was infiltrated with 0.5% lignocaine and 0.25% epinephrine. A midline vertical anterior vaginal incision was made 2 cm below the external urethral meatus, the bladder was dissected from the vagina and the paravescical spaces were reached (Figure ). By the use of fingers we identified the tendin. Two small skin incisions were made on the genitor-femoralis fold, near the hymen, and 2 others were located 2 cm caudally and laterally. We introduced an anterior tunneller that passed throughout the obturator foramen, obturator membrane and the obturator internal muscle and finally reached the vagina. At this point it was anchored to the end of the sling. Subsequently, an opposite passage distended the legs of the prosthesis. The procedure was repeated for all arms. The anterior vaginal incision was closed with 3/0 absorbable suture in a continuous.

The posterior vaginal wall was infiltrated with 0.5% lignocaine and 0.25% epinephrine. A midline vertical posterior vaginal incision was made, the rectus was dissected with fingers and the pararectal spaces reached. We identified (by blunt dissection) the ischiatic spine, SSL and the elevator ani. The prosthesis is inserted and fixed to the SSL Two small skin incisions were made on the glutei, 3 cm posterior and lateral to the anus, and a posterior original tunneller was introduced. The tunneller passed throughout the ischiatic fossa and exited on the para-rectal space bringing outside the 4 slings, 2 for each side. The posterior colpotomy was closed with 3/0 absorbable suture in a continuous manner.

### Results

We obtained he repair of the pelvic organs prolapse without undergoing hysterectomy, without vaginal erosions The two sacrospinous attachments and the anterior and posterior prosthetic reconstruction could explain the absence of recurrences. This procedure maintain a functional vagina to.

### Interpretation of results

This video show the correct procedure with anterior and posterior vaginal pelvic floor defect repair with Avaulta Biosynthetic Support System, safety and efficiently repair of the pelvic organs prolapse, without undergoing hysterectomy and without intraoperative complications and recurrences.

### Concluding message

We reconstructed the anatomical aspect of the pelvis by using Avaulta Biosynthetic Support System, without removing the uterus.

### References

1. Vierhout ME, Stoutjesdijk J, Spruijt J. A comparison of preoperative and intraoperative evaluation of patients undergoing pelvic reconstructive surgery for pelvic organ prolapse using the Pelvic Organ Prolapse Quantification System. *Int Urogynecol J Pelvic Floor Dysfunct*. 2006 Jan;17(1):46-9. Epub 2005 Jul 29
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3. DeLancey JOL. Standing anatomy of the pelvic floor. *J Pelv Surg*; 1996 2: 260-3.

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In this video we shown anterior and posterior vaginal pelvic floor defect repair with the Avaulta Biosynthetic Support System (Bard, United States) in a patients with grade 3 uterus-vaginal prolapse wishing to maintain their uterus. The pelvic status was classified according to the international Pelvic Organ Prolapse staging system (POP-Q).

### Is this a clinical trial?

No

### What were the subjects in the study?

HUMAN

### Was this study approved by an ethics committee?

Yes

### Specify Name of Ethics Committee

The study was approved by the Local Ethics committee "Tor Vergata" University, Rome, Italy.

### Was the Declaration of Helsinki followed?

Yes

### Was informed consent obtained from the patients?

Yes

