LAPAROSCOPIC SACROCERVICOPEXY FOR UTERINE PROLAPSE

Hypothesis / aims of study
The surgical management of uterine prolapse requires an apical suspension procedure, with or without uterine removal. The abdominal sacral colpopexy can be performed via laparotomy or laparoscopy. Currently there is no definitive gold standard procedure to favor a particular route and concurrent hysterectomy in the treatment of uterine prolapse. The aim of this study is to evaluate the efficacy and safety including incidence of mesh related complications in patients with uterine prolapse who underwent laparoscopic cervicopexy with uterine conservation or after supracervical hysterectomy.

Study design, materials and methods
We have investigated retrospectively the cases of laparoscopic management of uterine prolapse with 14 cases of laparoscopic sacrocervicopexy. Supracervical hysterectomy was done in the 9 cases and uterus was preserved in the 5 cases. Preoperatively, cervical cancer screening including papanicolaou smear and HPV (human papilloma virus) hybrid capture test was done. The degree of prolapse was measured with POPQ (pelvic organ prolapse quantification) system. And the urinary incontinence was evaluated with multichannel urodynamic test with prolapse reduction.

Results
Mean age was 54 years. Mean operating time was 180 minutes in uterine preservation group and 280 minutes in cervicopexy with subtotal hysterectomy group. 8 cases of midurethral tape operation for urinary incontinence, 2 cases of anterior colporrhaphy and a case of anterior and posterior colporrhaphy were performed. No significant intra- and post-operative complications such as infection, bleeding requiring transfusion and mesh related erosion/extrusion. Mean follow up was 18 months (6 months-52 months) and a patient was lost for follow up. Apical support was measured by POPQ system. The symptoms of vaginal heaviness and protrusion were completely disappeared at 6 months postoperatively. Range of point C was changed –1.5 to 7 preoperatively and –7 to –6 postoperatively. Neither recurrence of apical prolapse nor mesh erosion were observed.

Interpretation of results
This retrospective small case series might show the initial learning phase of laparoscopic cervicopexy and may have biases of selecting the surgical route and conservation of uterus/cervix. Even though these limitations, this study shows efficacy and safety of laparoscopic sacrocervicopexy. By the preservation of the cervix, blood supply and healing process of cervix can be preserved and the chance of infection can be reduced. Also the load of mesh in the cases of one strip of mesh can be reduced and even tension can be spread out into the meshes.

Concluding message
Laparoscopic sacrocervicopexy is effective and safe surgical technique in the management of uterine prolapse. By the conservation of the uterine cervix, the mesh related complication was not observed. The larger size, comparative study with long term follow up is needed for demonstrating the benefits and any difference between cervical preservation and hysterectomy.

Specify source of funding or grant
none

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
EastWest Neo Medical Center KyungHee University IRB

Was the Declaration of Helsinki followed?
Yes

Was informed consent obtained from the patients?
Yes