

## ROBOTIC-ASSISTED LAPAROSCOPIC TREATMENT OF URETERAL ENDOMETRIOSIS

### Introduction

Endometriosis is the leading cause of female pelvic pain and infertility and affects approximately 10% of women. Lesions involve the urinary tract in up to 6% of cases with ureteral involvement in a smaller subset of .08% to 1%. Multiple authors describe open and laparoscopic approaches to management of ureteral endometriosis; however, only few publications reported the role of robotic surgery on ureteral endometriosis.

### Design

This report describes one case of ureteral obstruction secondary to endometriosis managed with robotic-assisted laparoscopic segmental resection of ureter and reanastomosis.

### Results

The patient is a 31-year-old, G0P0 with bilateral chocolate cysts after laparoscopic cystectomy and GnRH analogue treatment 2 years ago. Her dysmenorrhea was improved after surgery and there is no chocolate recurrence. However, she presented with severe left lower quadrant pain, and significant genitourinary symptoms including urgency and frequency in recent 6 months. Prior to robotic surgery, CT of whole abdomen revealed focal narrowing at left lower third ureter, leading to proximal ureteral dilatation. There is compatible with endometriosis. The patient underwent robotic-assisted laparoscopic left ureterolysis, resection of endometriosis of the ureter. We first mobilized the left L/3 ureter from surrounding tissue. An endometriotic mass infiltrated to the left ureter. We transected the affected portion of the ureter. The distal and proximal end of the ureter was incised for spiculation using robotic scissors. Anastomosis with 4-0 Monocryl was done. A Bioteq 6Fr. 24cm DJ stent was inserted into the ureter. The ureter was then anastomosed by using interrupted, full-thickness 4-0 Monocryl sutures. The estimated blood loss was 100mL. The ureteral stent was retained for 4 weeks. Pathology revealed severe endometriosis of the left ureter. Postoperatively, the patient is doing well and has been pain free for over 4 years.

### Conclusion

A substantial body of evidence supports the laparoscopic approach as the preferred method for many procedures; yet, a majority of procedures today still are performed by laparotomy. The recent advent of robotic system may provide the bridge necessary for surgeons to incorporate laparoscopic surgery in the treatment of complex cases.

### Disclosures

**Funding:** There was none any external funding of the study or grants. **Clinical Trial:** No **Subjects:** HUMAN **Ethics not Req'd:** This is not a study. We only showed a rare case surgery video of ureter endometriosis. **Helsinki:** Yes **Informed Consent:** Yes