Endometriosis is the heterotropic occurrence of an island of endometrial glands and stroma outside of the uterus. The bilateral ureteral involvement of endometriosis is extremely rare. Herein, we investigate the metachronous ureteral involvement of endometriosis.

A 41-year-old woman had a hysterectomy and ureteroureterostomy on her left side due to endometriosis 6 years ago, and complained of right flank pain and a mild facial edema during a follow-up. In the computed tomography (CT) scan of her abdomen and pelvis taken two years ago, hydronephrosis, severe left renal atrophy, and dilation of the right ureter were found and after insertion of a right double J ureteral stent. She had a regular examination every third month. On examination, her physical status was considered good, but knocking tenderness was found in the costovertebral area. She was normal in her vital signs, laboratory tests, urine analysis, urine cytology, and chest X-ray, and CT scan of her abdomen and pelvis did not significantly differ from previous scans. As a recurrence of endometriosis was suspected, an explorative laparotomy was carried in order to preserve renal function. At that time, endometriosis was found in the right ureter 5cm above from the urinary bladder, and as the right ureter was severely closed by the ovaries, a bilateral salpingo-oophorectomy and uretero-neocystostomy were carried out after dissection.