

# Prolapsed Cecoureterocele an Unusual Cause of Female Acute Urinary Retention: Case Report and Review of the Literature

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## Abstract

**Background:** Urinary retention in females are rare. Ureteroceles are uncommon causes of acute urinary retention in females. There are a wide variety and presentations of ureteroceles with potentially diverse treatments. Open and endoscopic options have been described. We present a case of a 38-year-old female with acute urinary retention from a prolapsed ureteroceles associated with a stone. **Objectives:** To highlight caeco-ureteroceles as a rare cause of Acute Urinary Retention in females. A 38-year-old female presented with a history of severe lower urinary tract symptoms (LUTS) along with a urethral protrusion of a few weeks' duration. Examination showed she was in retention with a tender irreducible and inflamed mass covered with mucosa protruding from the urethra. A urethral catheter was passed beside the mass to relieve the retention. A calculus was palpated in prolapsing mucosa consistent with a prolapsing caeco-ureteroceles. Under local anesthesia, the mucosa was incised and 1.5x1.5cm spherical calculus was extracted. Urine was observed flowing out of the ureteroceles. The patient improved significantly from her symptoms and a follow-up ultrasound scan did not show hydronephrosis. **Conclusion:** Prolapse caeco-ureteroceles with stone could cause acute urinary retention in females. A heightened index of suspicion is needed when a female presents with an associated urethral protrusion.

**Keywords:** Caeco-ureteroceles, Females, Acute retention, urinary symptoms.

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## INTRODUCTION

Urinary retention in females are rare. Ureteroceles are uncommon causes of acute urinary retention in females. There are a wide variety and presentations of ureteroceles with potentially diverse treatments [1]. Open and endoscopic options have been described. We present a case of a 38-year-old female with acute urinary retention from a prolapsed ureteroceles associated with a stone [2]. This study highlights caeco-ureteroceles as a cause of Acute Urinary Retention in females for its rarity.

## CASE REPORT

A 38-year-old female presented with a history of severe lower urinary tract symptoms (LUTS) along with a urethral protrusion of a few weeks' duration. It was associated with poor stream straining intermittency and incomplete bladder emptying. LUTS got progressively worse over a few weeks and culminated in urinary retention with severe lower abdominal pains

before she was brought to us. There was no history of haematuria, trauma, or gynecological symptoms or disorders.

Examination showed a lady in severe painful distress, afebrile, not pale with tender and distended bladder. She had a tender and inflamed mass covered with mucosa protruding from the urethra. (Figure 1) Gentle attempts to reduce the mass were not successful. A urethral catheter was passed beside the mass to relieve the retention. A calculus was palpated in prolapsing mucosa as shown in Figure 2. This is consistent with a prolapsing caeco-ureteroceles with a calculus. The patient was unable to afford any investigation because of indigence.

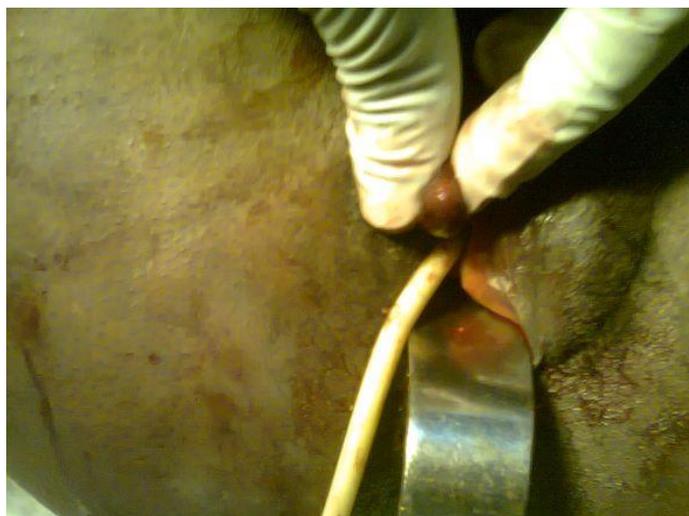
Under local anesthesia, the mucosa was incised and 1.5x1.5cm spherical calculus was extracted. (Figure 3) Urine was observed flowing out of the ureteroceles. The redundant mucosa (Figure 4) was trimmed and retracted back into the bladder. The patient

improved significantly from her symptoms and a follow-up ultrasound scan did not show hydronephrosis. The catheter was removed after 2 days and discharged.

She could not do further additional investigations. She was lost to follow-up.



**Figure 1: Protruding caeco-ureterocoele from urethra meatus with an impacted calculus**



**Figure 2: Fixing the ureterocoele for open incision**



**Figure 3: Extracted calculus from the ureterocoele**



**Figure 4: Redundant mucosa about to be trimmed**

## DISCUSSION

Ureterocele are most often encountered in the paediatric age group and are uncommonly encountered in the adult population. Most of our knowledge is based on case reports and case series [1]. In children, ectopic ureterocele, often associated with duplicated collecting systems are common, while a majority of the few reported ureterocele in adults are mainly orthotopic unilateral single systems [1, 2]. They are often seen in patients between the third and fifth decade which is consistent with the age of our patient.

Clinical presentation varies significantly but Lower Urinary Tract Symptoms (LUTS) and Urinary Tract Infection (UTI) are the commonest [2]. Few cases of urine retention from prolapsing caeco-ureterocele in adults have been reported and they are usually in females [3-9]. As observed in our patient, calculi, usually associated with adult ureterocele have been noted in 4–39% of cases in some studies. Most of the stones are calcium oxalate and calcium phosphate [10] in composition.

The diagnosis is usually confirmed with contrast imaging investigations such as intravenous urography and computerized axial tomography. Neither was done in our patient because she could not afford them. Endoscopic treatment is most commonly utilized in the management of these patients after reducing the prolapse into the bladder using diathermy, Holmium, and KTP lasers [6, 11, 12].

In our patient, open incision, extraction of calculus, and trimming of redundant mucosa were simple, safe, and effective in the management of the patient. The complications will include vesicoureteric reflux and urinary tract infection which could be managed conservatively. This could not be evaluated because the patient was lost to follow-up. Follow-up should be carried out with micturating cystogram; serum urea electrolytes and creatinine; urinalysis and urine microscopy culture and sensitivity.

## CONCLUSION

Prolapse caeco-ureterocele with stone could cause acute urinary retention in females. A heightened index of suspicion is needed when a female presents with an associated urethral protrusion.

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