

## Introduction

A urinary catheter is a flexible tube used to empty the bladder and collect urine in a drainage bag. The procedure for the insertion of the catheter includes inflating the balloon in urinary bladder. In male, the procedure is more complicated compared to female as male's urethra is longer. This case report discuss the complication of misplacing the balloon which can be missed as other emergency conditioned.

## Case Discussion

A 77 years old male with known case of Benign Prostatic Hyperplasia on indwelling urinary catheter for the past 1 year. Patient regularly changed his urinary catheter biweekly at "Klinik Kesihatan". He presented at emergency department (ED) with reduced consciousness level back at his home. Further history from family member, patient had been lethargic for the past 2 days and complaint of abdominal discomfort. They noted pus inside the urine bag on the day of presentation to ED, claimed the catheter was changed 2 days prior to onset of symptoms. Upon examination, his abdomen was distended with generalised tenderness but more at lower abdomen and palpable bladder. Also noted about 150cc pyurea inside the urine bag. Blood investigation and UFEME show urinary tract infection (UTI) with acute kidney injury. His blood sugar level is 2.6 and patient subsequently fully regained consciousness after given 50cc of Dextrose 50%. However his abdominal x-ray showed dilated bowel, thus patient was treated as symptomatic hypoglycemia secondary to UTI and also to rule out intestinal obstruction. Patient was referred to surgical team and CT Abdomen showed the urinary catheter balloon was inflated inside prostatic urethra.

## Discussion

Misplaced urinary catheter balloon can lead to serious complication including urethral trauma which can cause urethral stricture in long term. In this case, it is complicated with UTI and also urine retention that causes the bladder to distend and push the bowel, giving a false picture of dilated bowel on abdominal x-ray.

## Conclusion

Although urinary catheter insertion is a simple procedure, but as a healthcare provider we should not take it for granted. All the steps must be followed properly to ensure patient's safety as per Medical Ethics 'do no harm'.

**Keyword:** Urinary catheter balloon, urine retention, urinary tract infection



Figure 1: Abdominal Xray



Figure 2: CT Abdomen

**Reference:** Jacquelyn Cafasso, Deborah Weatherspoon, Ph.D., MSN, (November 16, 2023), Urinary Catheters, <https://www.healthline.com/health/urinary-catheters>