

Urinary Catheterization

Indications

- ▶ Prolonged Anesthesia
 - ▶ Prevents urinary retention
 - ▶ Able to monitor urinary output
- ▶ Urinary Obstruction
 - ▶ Benign Prostatic Hypertrophy (BPH)
 - ▶ Blood clots (cancer, infection, trauma, etc.)
 - ▶ Stones
 - ▶ Neurogenic (Diabetes, Multiple Sclerosis, Parkinsons, etc.)
- ▶ Hygiene
 - ▶ Only for bedridden patients, unable to use handheld container, and no caretaker
 - ▶ Other options: handheld container, bed pan, bedside commode, diapers
- ▶ Diagnostic purposes
 - ▶ Collect a clean urine sample
 - ▶ Imaging of urinary system (VCUG)

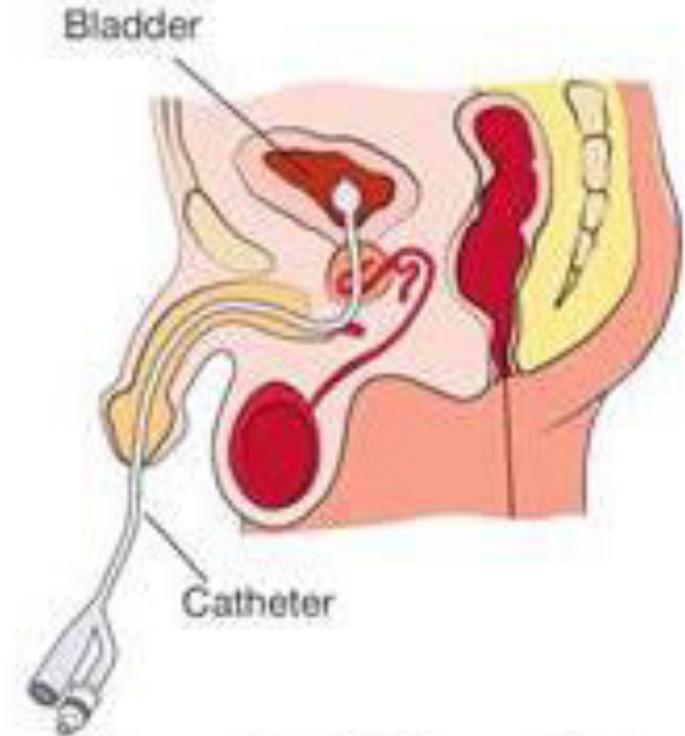


Figure 2 – Male catheter

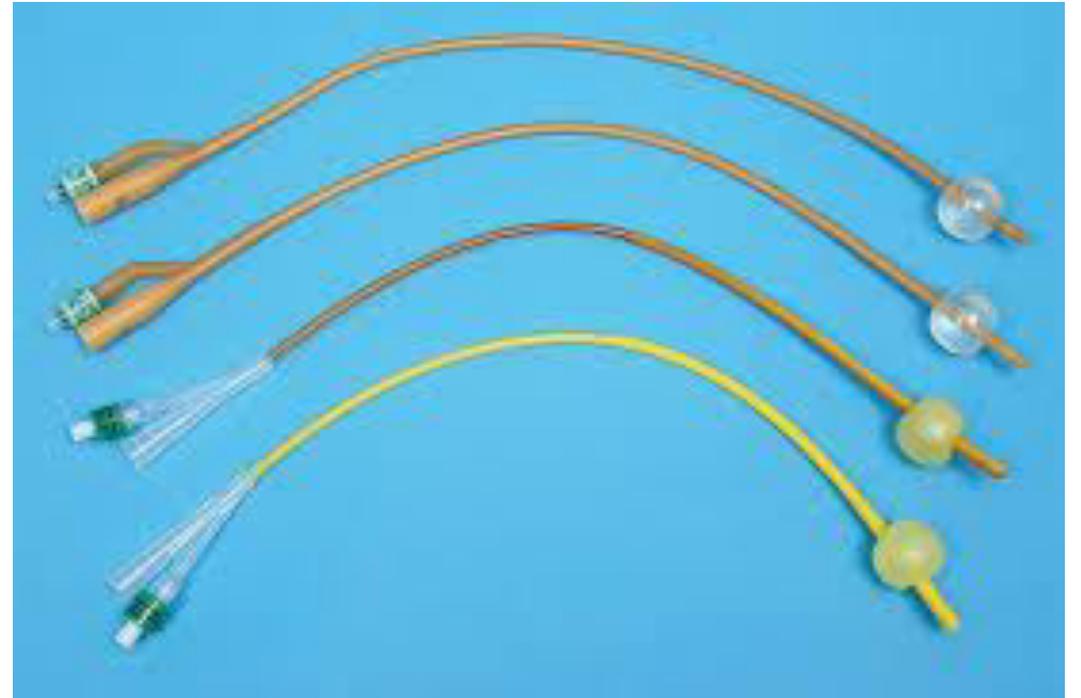
Types

- ▶ Condom catheter
- ▶ Indwelling/Foley catheter
- ▶ Intermittent/Straight catheter
 - ▶ Suprapubic catheter



Sizes

- ▶ 3 French = 1 mm
- ▶ Children: 5-12 Fr
- ▶ Adults: 12-18 Fr
- ▶ Hematuria or sediment: up to 26 Fr
- ▶ How do you choose the right size?



Contraindications

- ▶ Urethral tear
- ▶ Patients that do not have an indication!!!

Case Study

- ▶ A nurse calls you at 2 AM. She says she wants to insert a catheter in a patient because she is very tired of helping him go to the bathroom every 15 minutes. What do you do?

Possible Adverse Outcomes

- ▶ Infection
- ▶ Trauma
 - ▶ Inflating balloon inside urethra
- ▶ Neurogenic bladder

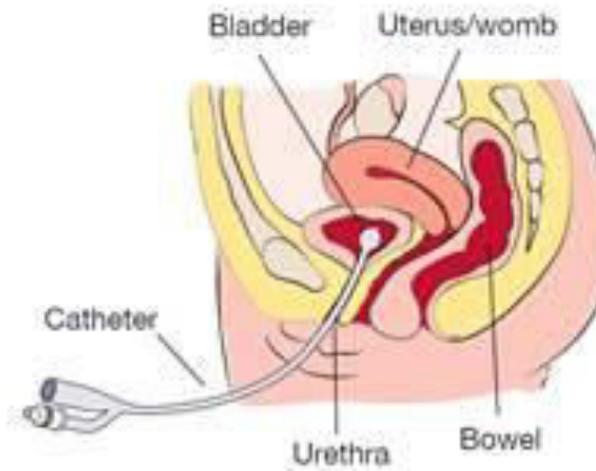


Figure 1 – Female catheter

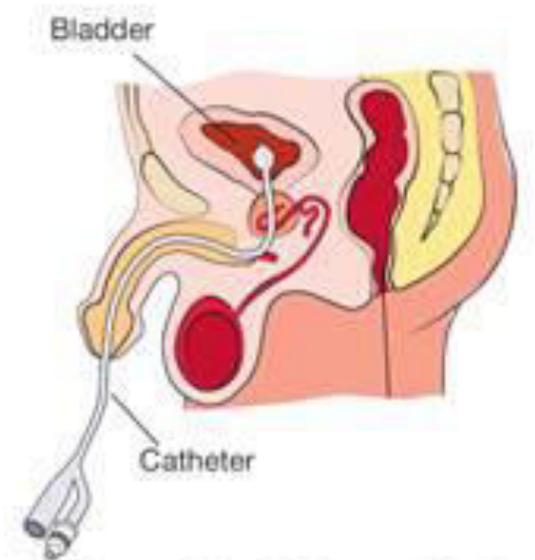


Figure 2 – Male catheter

Ways to decrease infection

- ▶ Only use if there is an indication
- ▶ Use proper hygiene during insertion
- ▶ Connect bag to catheter before inserting
- ▶ Remove catheter as soon as possible



Introduction

- ▶ Introduce yourself and obtain patient's name
- ▶ Explain procedure and gain consent
- ▶ Hand hygiene
- ▶ Maintain privacy and ask about a chaperone

Preparation - Patient

- ▶ Correct position
 - ▶ Male: supine (on back)
 - ▶ Female: supine (on back) with knees bent, feet together, and legs open
- ▶ Exposure
 - ▶ From above knees to above waist



Procedure - Hygiene

- ▶ Hand Hygiene and wear gloves
- ▶ Clean area around urethral opening with alcohol or iodine
 - ▶ From inner area to outer area
 - ▶ Repeat three times with a new cotton swab each time

Procedure - Anesthesia

- ▶ Gently expose urethral opening
- ▶ Apply 1-2 ml of lidocaine solution inside urethral meatus
- ▶ Wait 2-3 minutes



Procedure - Insertion

- ▶ Connect bag to catheter
- ▶ Lubricate the end of the catheter
- ▶ Using gauze, Hold penis in one hand (male) or spread labia (female) to expose urethra
- ▶ Insert catheter into urethra until urine draining
- ▶ After urine begins to drain, insert a further 5 cm
- ▶ Inflate balloon with 5-10 ml saline solution



Procedure – Insertion – male vs female

- ▶ Distance less in females
 - ▶ 5 cm vs 20 cm
- ▶ More change of direction in males

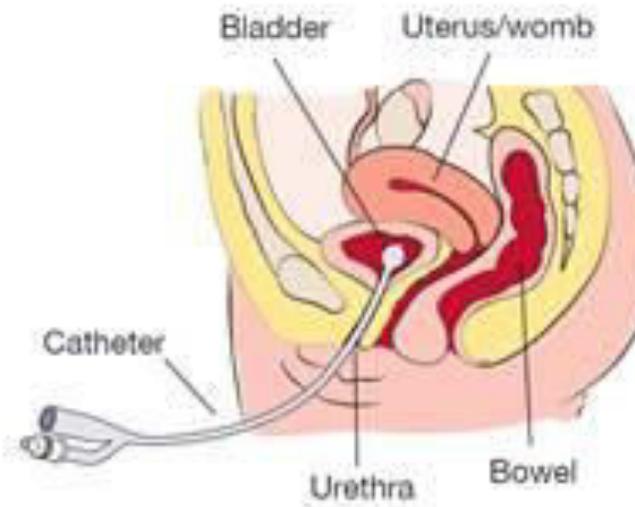


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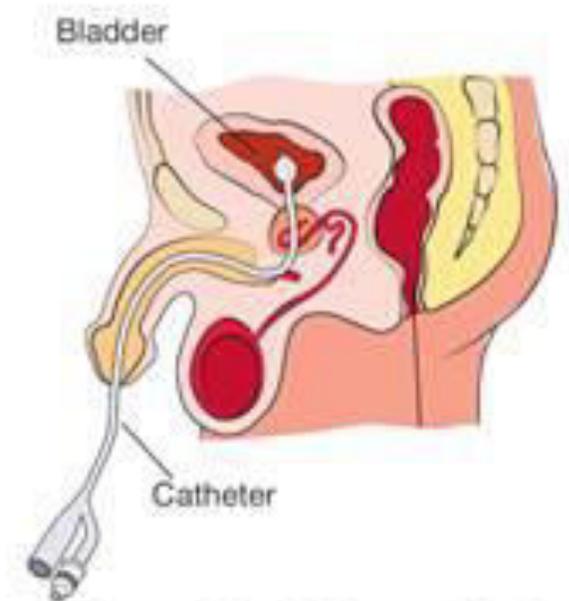


Figure 2 – Male catheter

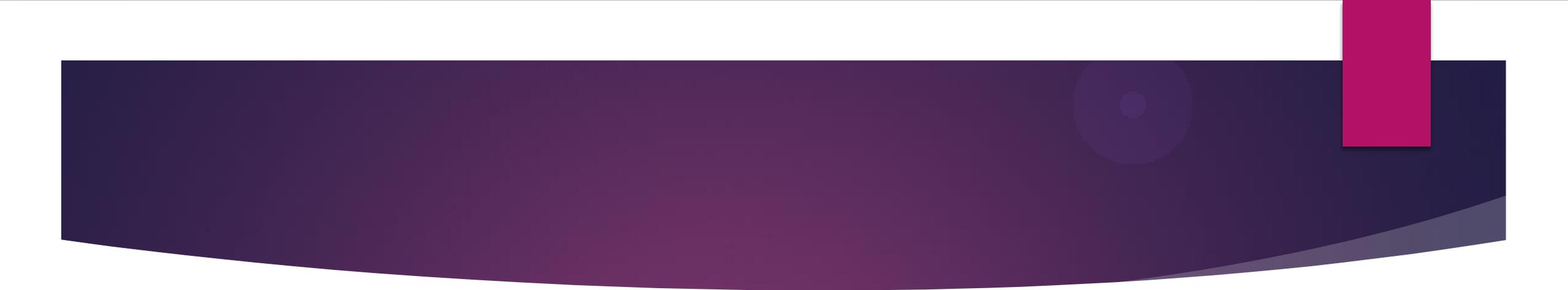
Procedure - Conclusion

- ▶ GENTLY pull on catheter to ensure balloon is inflated
- ▶ Tape the catheter to the patients upper leg
- ▶ Hang catheter bag from side of bed



Post-Procedure

- ▶ Cover patient
- ▶ Thank patient
- ▶ Clean area
- ▶ Documentation



Thank you