

URINARY TRACT INFECTIONS

Complicated UTI

See also specific patient groups and conditions below

Complicated UTIs are more likely in the following situations:

- Recurrent infection
- Treatment failures
- Previous urogenital surgery
- Urinary tract abnormalities
- Urinary or suprapubic catheters
- Symptoms of renal infection, e.g., fever or flank pain (see [Acute Pyelonephritis in Adults](#))
- Infants and neonates (see [UTI in Children](#))
- Pregnancy (see [UTI in Pregnancy](#))

Organisms

- *Escherichia coli*
- *Proteus sp.*
- *Klebsiella sp.*
- *Pseudomonas aeruginosa* (if recurrent infections)

Treatment

- Always send a pre-treatment MSU sample and review empirical treatment with the result. ([See Diagnosis of UTI in Adults - Quick Reference](#)).
- A positive catheter specimen urine does not necessarily mean there is a UTI present, a clinical assessment should be made, and antibiotics are only given if there are signs and symptoms of a UTI.
- If treating a catheter-associated UTI, the catheter should be changed (or removed if possible) as soon as possible after starting antibiotics, unless the catheter has been changed in the previous 7 days ([NICE NG113](#)).
- Treatment for a recurrent infection is a longer 7-day course of antibiotics (see lower/UTI or pyelonephritis guidance).

Resources

- The [TARGET antibiotics toolkit hub](#) includes leaflets to discuss with patients, [diagnostic tools](#), and other UTI resources.