

PATIENT FOCUS



# PATIENT'S GUIDE TO URINARY TRACT INFECTION (UTI)

### WHAT IS UTI?

A UTI is an infection in the urinary tract. Infections are caused by microbes—organisms too small to be seen without a microscope. Bacteria are the most common cause of UTIs. Normally, bacteria that enter the urinary tract are quickly removed by the body before they cause symptoms. But sometimes bacteria overcome the body's natural defenses and cause infection.

The urinary tract is the body's drainage system for removing wastes and extra water. The urinary tract includes two kidneys, two ureters, a bladder, and a urethra. The kidneys are a pair of bean-shaped organs, each about the size of a fist. They are located below the ribs, one on each side of the spine, toward the middle of the back. Every minute, your kidneys filter about 3 ounces of blood, removing wastes and extra water. The wastes and extra water make up the 1 to 2 quarts of urine you produce each day. The urine travels from the kidneys down two narrow tubes called the ureters. The urine is then stored in a balloon like organ called the bladder and emptied through the urethra, a tube at the bottom of the bladder.

## **SYMPTOMS**

You should see your health care provider if you have any of these signs or symptoms:

- a burning feeling when you urinate
- frequent or intense urges to urinate, even when you have little urine to pass
- pain in your back or side below the ribs
- cloudy, dark, bloody, or foul-smelling urine
- fever or chills

## **DIAGNOSIS**

Health care providers diagnose UTIs by asking about your symptoms and then testing a sample of your urine. Your urine will be checked with a microscope for bacteria and white blood cells, which the body produces to fight infection. Because bacteria can be found in the urine of healthy people, a UTI is diagnosed based both on symptoms and a lab test.

#### TREATMENT

UTIs are treated with antibiotics that can kill the bacteria causing the infection. The antibiotic prescribed will depend on the type of bacteria causing your UTI. Some antibiotics may be ruled out if you have allergies to them. Tell your health care provider if you are allergic to any medicines.

You may need to take antibiotics for a few days or for 7 days or longer. The length of treatment depends on a few factors:

- how severe the infection is
- whether you were given the right antibiotic at first
- whether the bacteria resists the antibiotic
- whether you have repeat infections
- whether you have a urinary tract abnormality that blocks the flow of urine
- whether you are male or female; men may need longer treatment because bacteria can hide deep inside prostate tissue

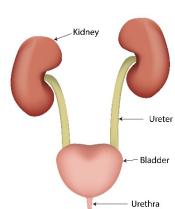
Follow your health care provider's instructions carefully and completely when taking antibiotics.

• Drinking lots of fluids and urinating frequently will speed healing. If needed, you may take various medicines to relieve the pain of a UTI. A heating pad on the back or abdomen may also help.

#### References

American Urological Association Foundation www.UrologyHealth.org

National Kidney Foundation www.kidney.org



**The Urinary System**