

## Epididymitis

Epididymitis is a syndrome resulting from acute inflammation, pain, and swelling of the *epididymis*. It is very common inflammatory condition and/or infection in men of all ages.

The epididymis is a comet-shaped organ located above and behind the testicle. It is filled with multiple twisted tubules and is the site where sperm mature and where sperm are stored prior to their movement into the vas deferens during ejaculation.

Epididymitis can be caused by the spread of infection from the prostate or bladder. However, the most common cause of epididymitis in young sexually active men is due to organisms that cause *urethritis*, an infection or inflammation within the urethral channel that runs from the bladder through the penis. This is often a non-bacterial organism such as *chlamydia*. In men over age 35, bacterial infection caused by an obstruction in the lower urinary tract is a common cause of epididymitis. At times, epididymitis can be viral in origin. On occasion, no infectious source of epididymitis is found. Epididymitis is often found in men who are weightlifters and men who are employed in occupations that require the lifting of heavy objects.

Acute epididymitis can vary greatly in severity, ranging from mild to severe. In mild epididymitis, there is pain, swelling, and tenderness in the epididymis. As it progresses, the degree of swelling, discomfort, and tenderness are amplified dramatically. In severe epididymitis, often the epididymis cannot be differentiated from the testicle because of the inflammatory process. The entire scrotum can be swollen, red, and accompanied by fever and chills as well as generalized illness. On rare occasions, epididymitis can be so severe as to require hospitalization for intravenous antibiotics and occasional surgery.

Physical examination of the scrotum and urinalysis are important. Scrotal ultrasonography is extremely helpful to help achieve the proper diagnosis as well as to rule out an abscess that might require surgical intervention.

The treatment of acute epididymitis is directed at the specific organism responsible. In young man, this is often a course of a tetracycline-derivative antibiotic such as Vibramycin. Additionally, rest, anti-inflammatory medication, scrotal support/elevation are helpful. Jockey shorts with elastic content are particularly helpful. Locally applied heat can be beneficial as well.

Epididymitis often requires a prolonged course of antibiotics and a significant amount of time before resolution. Occasionally, after resolution, there will be an irregularly firm and sensitive epididymis as a result of scar formation and inflammation. After complete resolution of the epididymitis, it is important to

undergo studies to rule out structural urological abnormalities that could have be responsible for giving rise to the epididymitis.