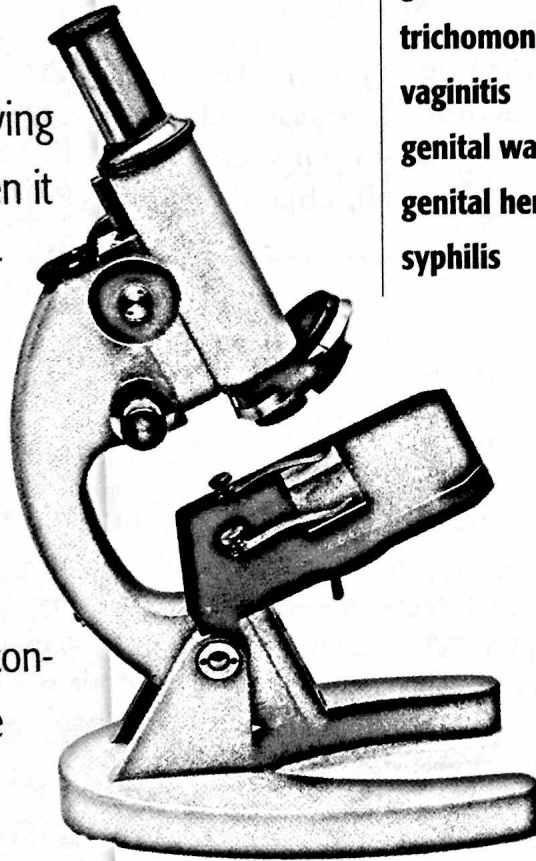


Common STDs and Their Treatments

You have probably heard the saying, "An ounce of prevention is worth a pound of cure." This saying certainly holds true when it comes to sexually transmitted diseases. This lesson will provide the facts about common STDs, including their symptoms and treatment. Chapter 30 will contain information on the most deadly STD of them all, AIDS.



HEALTH TERMS

chlamydia
nongonococcal urethritis
gonorrhea
trichomoniasis
vaginitis
genital warts
genital herpes
syphilis

HEALTH CONCEPTS

- Knowing the risk and symptoms of common STDs is an important first step toward prevention for sexually active people.
- Learning to identify the symptoms of STDs can help infected individuals seek appropriate treatment.
- People who discover that they have been infected with an STD have a responsibility to seek treatment and to inform any and all past sexual partners.
- Common sense, positive values, and good decision-making skills all contribute to the prevention of STDs.

Chlamydia

Chlamydia (kluh-MID-ee-uh) is an infection caused by a bacterium that affects the vagina in females and the urethra in males. The U.S. Centers for Disease Control and Prevention estimates that more than 4 million new cases of chlamydia infection occur each year. Chlamydia is a common cause of sterility and, if untreated, can lead to nongonococcal urethritis (non-gon-uh-KOK-uhl yur-ih-THRYT-uhs). Also known as NGU, this is an infection caused by several different kinds of bacteria-like organisms that infect the urethra in males and the cervix in females.

In males, the symptoms of chlamydia include pain and burning during urination and an unusual discharge from the penis. In

females, the symptoms are not always obvious. If symptoms do occur, they may include an unusual discharge from the vagina, pain in the pelvic region, and painful urination. Untreated chlamydia in females can cause **pelvic inflammatory disease** (PID), a painful infection of the ovaries, fallopian tubes, and/or uterus. A pregnant female who has chlamydia can transmit it to her baby during delivery. In infants, the disease can cause eye infection, blindness, and sometimes even pneumonia.

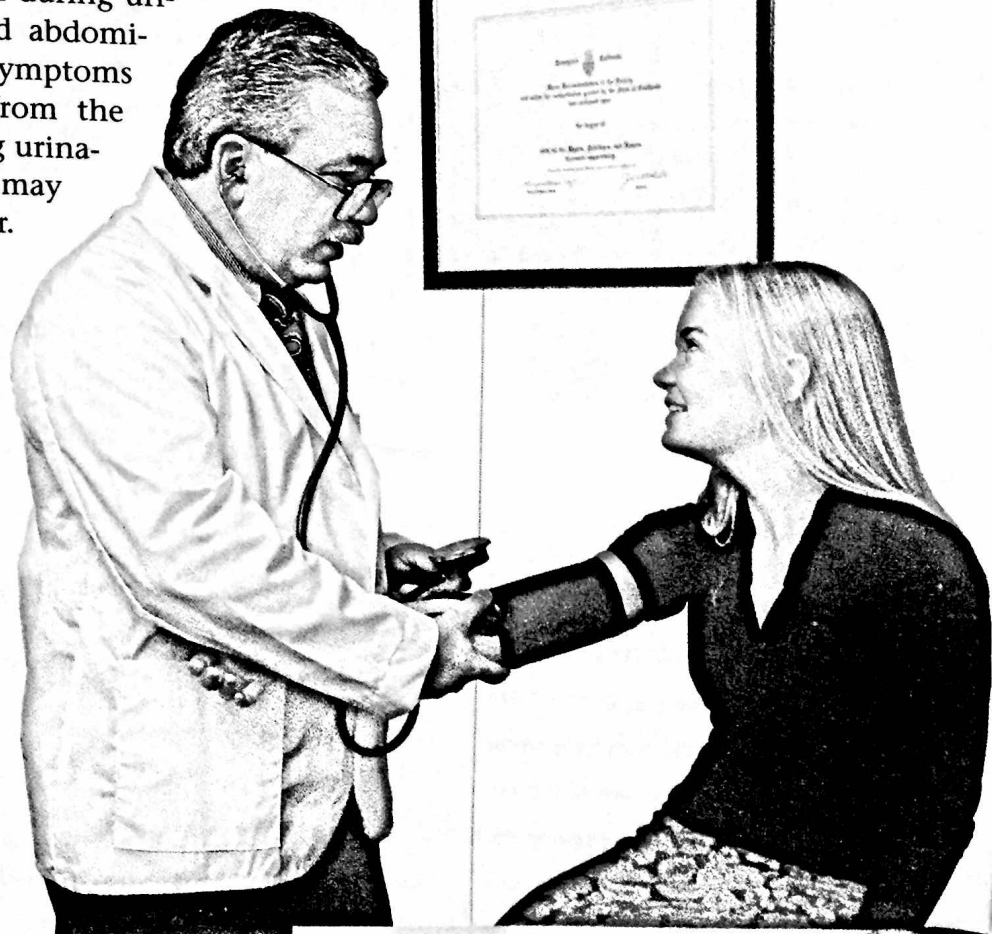
Chlamydia is diagnosed through a laboratory test. Certain antibiotics can cure chlamydia. However, if scar tissue has already formed, treatment cannot undo that damage. Chances of sterility in the male and the female will remain.

Gonorrhea

Gonorrhea (gon-uh-REE-uh) is an STD caused by bacteria that affect the genital mucous membrane, primarily in the lining of the urethra of the male and in the cervix and vagina of the female. The bacteria are transmitted during sexual contact. A person cannot pick up the pathogens from towels or toilet seats because the bacteria cannot live outside the body. A pregnant female can, however, transmit the infection to her unborn child.

Symptoms of gonorrhea are not always obvious, especially in females. In the female, symptoms may include a slight discharge from the vagina, a burning sensation during urination, abnormal menstruation, and abdominal pain or tenderness. In the male, symptoms may include a whitish discharge from the penis and a burning sensation during urination. The lymph nodes in the groin may also become enlarged and tender. These symptoms usually appear between three days and three weeks after sexual contact with an infected person. These symptoms may go away on their own, but the disease is still present in the body.

Gonorrhea can be confirmed only by a medical diagnosis. In a male, gonorrhea is diagnosed by examining discharge from the penis under a microscope. In a female, a culture test of the vagina is done to make the diagnosis. This involves taking a sample of cells from the vagina and examining them under a microscope. Gonorrhea can be treated with antibiotics.



h t link

pelvic inflammatory disease For more information on pelvic inflammatory disease, see Chapter 19, page 447.

▼ **Your family physician, school nurse, your parents, and other health-care professionals can give you accurate health information.**

Trichomoniasis

Trichomoniasis (trik-uh-muhn-EYE-uh-suhs) is *a vaginal infection that can lead to urethra and bladder infections*. Males are rarely infected with trichomoniasis, but they can be carriers. Like chlamydia, this STD can lead to nongonococcal urethritis. In females, symptoms of trichomoniasis include burning and itching in the vagina, a yellowish-green discharge, and pain upon urination. In males, symptoms include itching of the penis, a clear discharge, and pain upon urination. Trichomoniasis can be cured with a medicine that can be prescribed only by a physician.

Trichomoniasis can also cause vaginitis, another secondary infection, in females. *Vaginitis is a common inflammation of the female genitals* that can be carried by males. Vaginitis is rare in young women who are not yet sexually active. In more than 90 percent of all cases, vaginitis is caused by a bacterium, protozoan, or virus transmitted through semen and certain other body secretions. Medication is now available that can be taken in a single dose and that cures vaginitis within 24 hours.

Genital Warts

Genital warts are *pink or reddish warts with cauliflowerlike tops that appear on the genitals*. Genital warts are caused by a virus called the human papilloma virus (HPV). Once infected, a person has the virus for the rest of her or his life. The warts appear on the genitals one to three months after infection. A physician can remove the warts, but they may reappear. Medical treatment may also include

application of a prescription skin medication. This STD is known to be one of the causes of cervical cancer in women.

Genital Herpes

Genital herpes appears as *blisterlike sores in the genital area* that are caused by the herpes simplex type 2 virus. Like genital warts, genital herpes cannot be cured. The virus remains in the body for a lifetime. The sores usually appear two to twenty days after contact with an infected person and may last as long as three weeks. Other symptoms include fever and a burning sensation during urination. With the help of moisture and friction, the virus can spread to other areas of the body. This is why a person with herpes is told not to rub the skin and to keep the skin dry. The blisters can break out at any time and often occur during periods of stress.

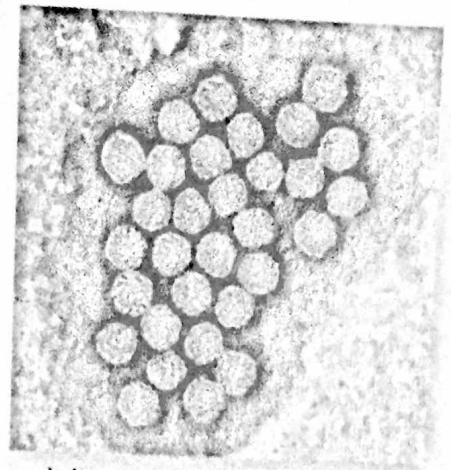
Herpes is diagnosed by a medical examination of genital sores and verified by lab tests. Medications are used to treat the symptoms. To avoid spreading genital herpes, an infected person should avoid having sexual contact when blisters are present and right after they disappear.

Syphilis

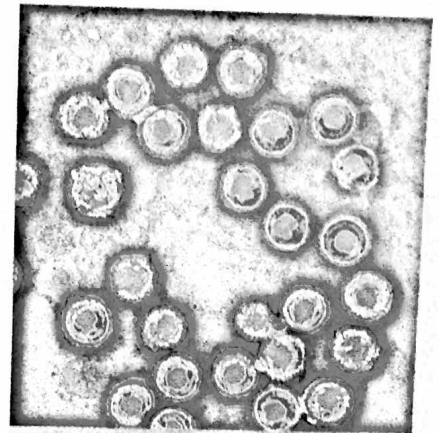
Syphilis (SIH-fuh-luhs) is *an STD that attacks many parts of the body and is caused by a small bacterium called a spirochete*. When left untreated, it can damage vital organs, such as the heart, the liver, the kidneys, and the central nervous system, including the brain. It can cause heart disease, blindness, paralysis, and insanity.

Syphilis is different from other STDs in that it develops in stages. Symptoms appear and then go away on their own. However, if treated in the early stages, the disease can be cured.

- **Primary Stage.** The first sign of syphilis is a *chancre* (SHAN-kuhr), a painless, reddish sore at the place where the pathogen enters the body, usually the genitals. It appears within 10 to 90 days after contact with an infected person. The chancre lasts one to five weeks and will then go away, even if untreated. However, the disease remains in the body.
- **Secondary Stage.** If not treated, the pathogen will be circulated in the blood. Within one to six months after contact, the highly contagious second stage of syphilis appears. This stage is commonly characterized by a non-itching rash on the chest, backs of the arms, and legs. In females, the rash is most often found on the outer edges of the vagina. Sores may develop from the rash. These sores will likely give off a clear liquid filled with infectious spirochetes. Swelling may occur in the lymph nodes under the arms and around the groin. Fever, sore throat, and a general sick feeling are common symptoms. Without treatment, these symptoms will disappear, but the disease continues to develop.



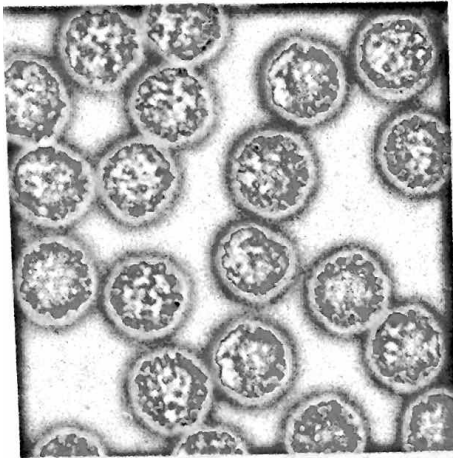
genital wart



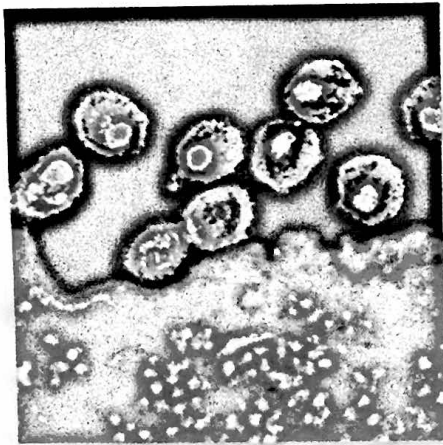
herpes blister

▲ **Genital warts (top) and genital herpes (bottom) are caused by virus.**

ACTIVITY Tell how genital warts are different from genital herpes.



Hepatitis B



HIV

▲ **Hepatitis B and HIV are caused by viruses carried in the bloodstream.**

hot link

hepatitis B For more information on hepatitis B and other forms of this infectious disease, see Chapter 28, page 629.

- **Latent Stage.** The third stage of syphilis usually begins about two or more years after the initial infection. All signs disappear, leading the individual to think that he or she is cured or perhaps never had the disease. However, it is in this stage that syphilis begins to attack the heart and blood vessels and the central nervous system. The damage to these areas is slow and steady. Even though people have reached the latent stage, they can relapse into the second stage, and sores will reappear.
- **Neurosyphilis Stage** (NOOR-uh-SIH-fuh-luhs). If untreated, syphilis moves into the neurosyphilis stage within 10 to 30 years, and the heart, skin, brain, and spinal cord are affected. A person loses the ability to coordinate muscular movements and may experience blindness or insanity. The central nervous system is affected, resulting in a loss of mental abilities. A person in this stage of syphilis may experience paralysis and convulsions. Syphilis in this stage can be treated but not cured.

The medical test for syphilis is a blood test. The presence of the spirochete bacteria in the blood or in sores indicates the presence of the disease. Penicillin is the main drug used in the treatment of syphilis. No matter how effective the treatment is, it cannot undo any harm that has already been done. Early treatment is crucial.

Other STDs

Several other problematic infectious diseases are spread through sexual contact:

- **Chancroid** (SHAN-kroyd) is a bacterial infection with many similarities to the primary stage of syphilis. Deep sores show up near the genitals. Contact with these sores will spread the disease. Chancroid is treated with antibiotics.
- **Candidiasis** (kan-duh-DY-uh-suhs) is a yeast infection of the vagina. This condition usually occurs without sexual contact, but is often passed to a partner during sexual contact. Symptoms include a yellowish discharge, strong odor, and itching. It can be cured through medicated creams and tablets sold over the counter.
- **Pubic lice** are tiny insects that attach themselves to skin and hair in the pubic area. The lice feed on blood and cause intense itching. Treatment consists of using a special medicated shampoo.
- **Scabies** is an infestation of the skin by mites that cause red, swollen, itchy bumps similar to those found during the primary stage of syphilis. Itching begins four to six weeks after infection. Treatment includes hot baths and medicated creams.
- **Hepatitis B** is caused by a virus that attacks the liver. It also can be spread through contact with infected blood. Symptoms do not show up for six months, during which time a person may not

know that he or she is infected. Treatment includes bed rest and a healthy diet. A **vaccine** is available.

- Human immunodeficiency virus (HIV) is the virus that causes AIDS. **HIV** also can be spread through contact with infected blood. Once the virus is contracted, it remains in the body. At this time there is no cure for HIV or AIDS, and the disorder is considered fatal.

Responsibilities of Infected Individuals

Treatment for sexually transmitted diseases is an important personal as well as social responsibility. Having an STD is not like having a cold. It will not simply go away if a person waits long enough. The individual must take action to have the disease treated. Although a person may feel embarrassed about having an STD, he or she should seek treatment from a private doctor or a public health clinic immediately. By law, it is guaranteed that all information will remain confidential.

It is also important for a person infected with an STD to notify all people with whom he or she has had sexual contact. The infected person has a responsibility to educate partners about the symptoms and risks of the STD and encourage them to have a medical checkup. Informing someone else about the possibility of having an STD could save that person's life. A doctor or a public health clinic can help an infected person take these steps.