Facts About Sexually Transmitted Diseases and AIDS

Sexually transmitted diseases (STDs), formerly called venereal disease (VD), are transmitted primarily, but not exclusively, through sexual intercourse or similar sexual contact. The STDs discussed in this handout are syphilis, gonorrhea, herpes, and chlamydia. In addition, acquired immunodeficiency syndrome (AIDS), which is spread primarily by sexual contact or contact with an infected person's blood, will be discussed. All these diseases can be detected with a lab test.

Most STDs can be cured with medication like antibiotics, especially if the diseases are diagnosed in their early stages. However, doctors have observed that certain strains of STD, like gonorrhea, are developing a resistance to antibiotics, which makes them more difficult to treat. Herpes and AIDS can be treated but not cured.

Syphilis and gonorrhea are caused by bacteria that can live only in the human body. Outside the body they die in a short time. For that reason, these diseases are almost always transmitted through sexual contact.

Syphilis

Syphilis goes through several stages of development if untreated. During the first phase, a painless blister similar to a canker sore will appear on the genitals or possibly on the lip or within the mouth. This can be accompanied by some soreness or swelling in a gland near the sore. These symptoms will disappear on their own within four to ten weeks.

The next stage can be identified in most cases by a rash that usually appears on the trunk of the body and is accompanied by a low-grade fever, a throat infection, and headaches. Because all these symptoms can also be associated with other forms of illness, they may not be identified as being caused by syphilis. These symptoms will also disappear on their own in a few weeks or months, possibly in a year. Then syphilis enters its latent period. All symptoms disappear, and the person might think that he or she is cured. But months or even years later the disease becomes active again. It is in this advanced stage that real damage takes place. Lesions break out that can affect the heart, brain, nervous system, circulatory system, and other parts of the body. Permanent damage and even death can result.

Gonorrhea

The infecting organism of gonorrhea is ordinarily found in the genital-urethral area. The first symptom in an infected male is an inflammation of the urethra, the tube leading from the bladder to the tip of the penis. Also, a thin, watery substance is discharged or drips from the penis, and usually the patient feels a painful, burning sensation when urinating. Other painful and often serious complications, such as kidney or bladder disorders, will develop if the disease is not treated.

The early symptoms in the male appear within two to seven days after sexual contact and are rather easily recognized, so he can seek early treatment. Unfortunately, 85 percent of infected females show no early symptoms. Hence, if the infected woman is sexually active, she continues to spread the disease without knowing it. If symptoms do occur, they are similar to those of the male: a frequent and urgent need to urinate accompanied by a painful burning sensation.

Because these symptoms often do not occur in the woman, it is important that any male who discovers that he has contracted the disease inform any female with whom he has had sexual contact. Either she was already infected at the time of contact but was not aware of it or the male may have infected her. In both situations, a doctor's examination is essential.

Herpes

Herpes is a highly infectious virus, which means that it is easily spread. Because no known cure for herpes exists, a person who contracts it may have it for life.

The herpes virus invades the body and attacks the cells in the area of invasion. It causes the skin to burst out in painful, reddish blisters, which appear most often on the penis, in the vagina, or in the anus. Sometimes these sores appear around the mouth also. (Common cold sores or fever blisters are also caused by a herpes virus, but it is a different type of virus.) When the sores heal, the virus travels up the nerves to live, and when the person is under stress or tired or sick, the virus travels back down the nerves and causes the painful sores to erupt again.

For males, herpes is painful and annoying. For females, it can be dangerous because it may be linked to cancer of the cervix. Herpes can also complicate pregnancies, causing spontaneous abortions in some women. Or it can infect the unborn baby and cause brain damage, birth defects, or death. Cesarean deliveries are recommended for females with active herpes.

The herpes virus is passed by direct contact with sores or by contact with the infected area twenty-four hours or less *before* the sores erupt. Symptoms show up usually two or three days after contact, but sometimes they do not appear until much later. The first symptom is usually itching or tingling around the genitals. The infected person may experience general aching, a slight fever, a headache, and swollen glands. Next, the painful sores appear. These can last for up to two weeks. Then they might go away and never return. Or they might go away and return when the person is under stress or run down. The severity generally lessens with repeated attacks.

Although presently no medication can cure herpes, doctors can offer treatment to help soothe the pain and possibly to make the sores disappear sooner. In any case, a medical checkup is important.

Chlamydia

Chlamydial STDs are the most common of the STDs—two to three times more common than gonorrhea, six times more common than genital herpes, and thirty times more common than syphilis. Chlamydia is the shortened name for *Chlamydia trachomatis.* Chlamydia is a species of bacteria that can cause serious infections, especially sexually transmitted diseases. However, if recognized in time, these diseases can be easily cured.

In the initial stages of chlamydial STDs in men, the bacteria settle in the urethra after sexual contact. The symptoms commonly appear within one to three weeks. In the initial stages, chlamydial STDs can resemble gonorrhea. Men might experience painful urination and a watery or milky discharge, especially early in the day. Approximately 10 percent of men who have chlamydial STDs show no noticeable symptoms.

Chlamydia is the cause of half the cases of acute epididymitis, an inflammation of the sperm duct behind the testicle. This condition can cause sterility. Chlamydia is also linked to Reiter's syndrome, which involves a urethral infection followed by joint pain, inflammation of the eyes, and sores on the skin.

Chlamydial STDs are less easily recognized in women because up to 80 percent of women with these diseases have no noticeable symptoms in the early stages. However, if untreated, these diseases can cause serious complications. In the initial stages, chlamydia settles in the cervix (the opening to the uterus) after sexual contact, and symptoms occur from one to three weeks later. The symptoms are a heavierthan-usual, often yellowish, discharge from the vagina, pain or a burning sensation during urination, and a frequent urge to urinate.

Because the symptoms may not be very noticeable, a woman might not know that something is wrong until chlamydia has spread and she begins having abnormal vaginal bleeding or discharge, fever, or pain in her lower abdomen. The lining of the uterus can become inflamed (endometritis). The fallopian tubes may swell and become inflamed (salpingitis), develop pus pockets, and become blocked by scar tissue, resulting in infertility or a tubal pregnancy—a potentially life-threatening condition. Chlamydia is a major cause of pelvic inflammatory disease (PID), which afflicts more than one million women each year, of whom two hundred thousand require hospitalization.

Newborn infants can be infected by their mother during passage through the birth canal. About 30 to 50 percent of babies born of mothers with chlamydia have conjunctivitis, an infection of the eyes, and 10 to 20 percent develop pneumonia.

The chlamydia epidemic is highest among teenagers. However, the disease can be cured with prescribed antibiotics (not penicillin, which is ineffective against chlamydia). Several accurate and inexpensive tests are available to check for chlamydia. Most doctors do not automatically screen for it, so a patient must usually ask for the test.

AIDS

Note. The information and statistics presented here are based on research available at the time this handout was written. Because of constant developments in research about AIDS, this information may need to be updated.

AIDS causes a breakdown in the body's disease defense systems and is characterized by a number of symptoms and diseases. The AIDS virus, also called HIV (human immunodeficiency virus), is extremely fragile and cannot live long outside the body. It is transmitted from infected persons to other people through blood, semen, and vaginal secretions, although HIV can be present in very small concentrations in other bodily fluids.

Presently no cure for AIDS is known. Because it leaves a person vulnerable to a number of life-threatening diseases, AIDS is considered fatal.

HIV Infection and AIDS

Most people infected with HIV have no symptoms of the virus until they actually develop AIDS. Blood tests can identify the presence of the AIDS antibody, a sign that the person has been infected with HIV, but that does not mean that illness will necessarily follow immediately. Most people infected with HIV eventually develop full-blown AIDS, but some people remain without symptoms for several years. People whose blood tests show the AIDS antibody are carriers of HIV and may transmit the disease to others.

People at Risk

Everyone who engages in risky sexual behavior or takes intravenous drugs with used paraphernalia stands at risk of contracting HIV.

Other groups at risk include hemophiliacs and patients who received blood transfusions from donors before the testing of donated blood began. Presently the risk of getting the AIDS virus from a transfusion is extremely low. Pregnant women infected with HIV can transmit the virus to their children before or during birth or, rarely, in their milk.

How the AIDS Virus Is Transmitted

The AIDS virus is transmitted by intimate sexual contact and by exposure to contaminated blood. Usually the body's skin acts as a barrier that protects against infection by viruses like HIV. But when the skin is broken by injury or a needle puncture, any fluid containing HIV can enter the body. Hence the virus can be easily transferred in sexual activities because they involve the exchange of bodily fluids.

HIV can be transmitted through sexual relations from male to male, from male to female, from female to male, and possibly from female to female. The fact that a person is not gay and does not use intravenous drugs does not mean that she or he is safe from AIDS. If someone has unprotected sexual relations with another person, especially outside the context of a stable, monogamous sexual relationship, the possibility of contracting AIDS exists. National heritage, ethnic group, and race do not offer protection from AIDS.

Some sexual activities are particularly dangerous, such as anal intercourse of all types. The risk of contracting AIDS from oral-genital sex on a male is slightly lower if it stops before ejaculation. Oral sex on a female may be more risky during menstruation. HIV is not transmitted by casual contact, such as by coughing or sneezing or handling food. Infected people are not dangerous to those with whom they go to class, share bathrooms, eat, work, or sit. There is no need to question the safety of swimming pools, whirlpools, saunas, or telephone booths. Objects touched by persons with AIDS are not contaminated, with the exception of shared needles. Those who care for people with AIDS can disinfect any surface with a solution of one part household bleach to ten parts water.

HIV is occasionally present in the saliva, tears, or urine of people with AIDS, but in very small concentrations. No conclusive evidence exists that the virus can be transmitted during kissing or other contact with saliva. If there is any risk at all from kissing, it would come from prolonged or rough kissing, which could damage lips or mouth tissue. Donating blood or getting a hepatitis B vaccine will not give a person AIDS.

Protection Against AIDS

The best protection against being infected with the AIDS virus is abstaining from sexual activity before marriage, marrying a person who is not infected with HIV, and then being faithful to one's spouse. Even the use of condoms, recommended by public health officials, does not guarantee 100-percent safety for people who choose to have sex with someone who could be infected. In addition, intravenous drug users should try to stop their drug habit, and above all, they should not share needles or syringes.

Symptoms

Early symptoms of HIV infection are similar to those of the flu. Gradually symptoms can become more severe, and other symptoms may manifest themselves. Here are some common symptoms:

- 1. persistent, excessive tiredness for no reason
- 2. recurring fevers, chills, or night sweats
- 3. unexplained weight loss of ten pounds or more
- 4. persistent enlargement of lymph nodes, or glands, in the neck, armpits, or groin

- 5. persistent sore throat, or white spots or patches in the mouth
- 6. a new, persistent cough
- 7. easy bruising or unexplained bleeding from any part of the body
- 8. persistent diarrhea
- 9. pink or purple bumps or blotches on the skin

Testing

The AIDS antibody test shows only whether a person has an AIDS antibody, not whether a person has developed AIDS. Because of medical, psychological, and social issues involved in AIDS testing, anyone considering the test must understand its implications and limitations. People with positive tests might be discriminated against, so test results must be kept confidential or anonymous.

Anyone testing positive for the AIDS antibody is an HIV carrier and has a moral and ethical responsibility to protect others. HIV carriers should not donate blood or body organs or engage in sexual activity that would endanger others. A woman with a positive AIDS antibody test should avoid becoming pregnant because of the likelihood of transmitting HIV to her child and because pregnancy may speed the development of AIDS in the woman herself. All persons testing positive for the AIDS antibody should seek professional help.

The Need for Support

People with AIDS or a positive AIDS antibody test need support and friendship. They often feel isolated, frightened, and uncertain about their relationships, their future, and their medical condition. If you know someone who has AIDS or a positive AIDS antibody test, you can help that person by maintaining your friendship and sharing activities. Remember that a minor infection for you could be serious for a person with AIDS; do not expose a friend with AIDS to what could be a dangerous illness.

More information can be obtained from the Centers for Disease Control's toll-free hot line: 1-800-342-AIDS.