

Dear all,

Most of us think about the disease in very simple terms: if you feel sick, you are sick; if you feel healthy, you are healthy. However, because HIV may be causing subtle changes in the immune system long before an infected person feels sick, most doctors have adopted the term "HIV Disease" to cover the entire HIV spectrum, from initial infection to full-blown AIDS (which can also be called "Advanced HIV Disease"). The continuum that follows and its stages are representative of the experience of many people with HIV. The time that it takes for each individual person to go through these stages is varied. For most people, however, the process of HIV disease is fairly slow, taking several years from infection to the development of severe immunodeficiency. Today we are sharing with you an article regarding information about the stages of HIV.

Infection

HIV enters the bloodstream and begins to take up residence in the cells. People with HIV are considered to be infectious immediately after infection with the virus. Although some studies suggest that the level of infectivity varies over time depending on the stage of the disease in which the person is, it is not possible for most HIV infected people to find out what their level of infectivity is. A person with HIV is infectious at all times. Also, a person does not need to have symptoms or look sick to have HIV. In fact, people may look perfectly healthy for many years despite the fact that they have HIV in their bodies. The only way to find out if a person is infected is by taking an HIV antibody test.

Primary Infection (or Acute Infection)

Primary HIV infection is the first stage of HIV disease, when the virus first establishes itself in the body. Some researchers use the term *acute HIV infection* to describe the period of time between when a person is first infected with HIV and when antibodies against the virus are produced by the body (usually 6-12 weeks). Within the first 72 hours after exposure, *post-exposure prevention* (PEP) may be possible. Up to 70% of people newly infected with HIV will experience some "flu-like" symptoms. These symptoms, which usually last no more than a few days, might include fevers, chills, night sweats and rashes (not cold-like symptoms). The remaining percentage of people either do not experience "acute infection," or have symptoms so mild that they may not notice them. Given the general character of the symptoms of acute infection, they can easily have causes other than HIV, such as a flu infection. For example, if you had some risk for HIV a few days ago and are now experiencing flu-like symptoms, it might be possible that HIV is responsible for the symptoms, but it is also possible that you have some other viral infection. The important thing to do is call an AIDS hotline to discuss whether you were in a situation that put you at risk for HIV and whether you should consider taking an HIV test. During acute HIV infection, the virus makes its way to the lymph nodes, a process which is believed to take three to five days. Then HIV actively reproduces and releases new virus particles into the bloodstream. This burst of rapid HIV replication usually lasts about two months. People at this stage often have a very high HIV "viral load." However, people with acute HIV infection usually will not test HIV antibody positive, since it takes the body approximately one to three months to produce antibodies against HIV. Scientists disagree about whether anti-HIV treatment is useful during primary HIV infection, and there is little information from clinical trials. *Most HIV specialists believe that early highly active antiretroviral therapy.*

While many researchers are optimistic about early anti-HIV treatment, they are also concerned about drug side effects, long-term effects and the possibility of developing drug-resistant virus if people use powerful anti-HIV drugs before they become ill due to HIV disease. Some researchers think that if HIV replication can be slowed down early in the course of disease, it will take longer before a person develops AIDS. *Several studies have shown that low blood viral load levels in the early stages of HIV disease are associated with less severe illness and slower disease progression.* Some even think that it might be possible to eradicate, or completely kill off HIV, if treatment is started very early. So far, though, complete HIV eradication has not occurred, and most doctors recommend that anti-HIV treatment should be

continued indefinitely once it is started.

Seroconversion

This term refers to the time when the body begins producing antibodies to the virus. About 95% of the people infected with HIV will develop antibodies within three months after infection. Nearly all people will develop antibodies within six months after infection. Most people develop antibodies within three months and some can take up to six months. People who get tested need to wait at least three months for the test. If their first result is negative, they should come back for a second test three months later.

Immune System Decline

The virus appears to slowly damage the immune system for a number of years after infection (perhaps because the body is able to keep it in check during this time). In most people, however, a faster decline of the immune system occurs at some point, and the virus rapidly replicates. This damage can be seen in blood tests, such as lowered Cell counts, before any actual symptoms are experienced.

People who are HIV-positive should see a doctor to monitor their immune systems. By getting lab indicators (such as the viral load test) and observing how they are changing over time, they can get a better sense of whether HIV has already caused any damage to their immune systems. As mentioned above, a development in the last couple of years in the treatment of HIV disease is what doctors call "Early Intervention" or "Early Care." The principle behind this concept is that early rather than late medical care may give people better chances of survival and better quality of life. It is extremely important that people with HIV learn that they have to see a doctor *even* if they feel fine at the moment because the virus could be already damaging their immune systems.

Mild, Non-Specific Symptoms

Once the immune system is damaged, many people will begin to experience some mild symptoms (skin rashes, fatigue, slight weight loss, night sweats, thrush in the mouth, etc.). Most, though not all, will experience mild symptoms such as these before developing more serious illnesses. Although one's prognosis varies greatly depending on one's ability to access support, services and preventative treatment, it is generally believed that it takes the average person five to seven years to experience their first mild symptom. These symptoms are not specific to AIDS. However, they should be of concern to people who have tested positive to HIV. Usually, symptoms occur when the virus has already caused considerable damage to the immune system. For that reason, people with HIV should not wait until symptoms appear to get medical treatment. Also, people with high risk for HIV should not wait to get symptoms to take the HIV-antibody test.

More Severe Symptoms; Opportunistic Infections and Diseases

When immune system damage is more severe, people may experience opportunistic infections (called "Opportunistic" because they are caused by organisms which cannot induce disease in people with normal immune systems, but take the "opportunity" to flourish in people with HIV). Most of these more severe infections, diseases and symptoms fall under the Centers for Disease Control's definition of full-blown "AIDS." In a San Francisco study of gay men, the median time to receive an AIDS diagnosis among HIV-infected men is 10-11 years. (Again, this statistic predates the advent of more powerful anti-HIV drugs.) Receiving an AIDS diagnosis does not necessarily mean that the person will die soon. Some people have lived many years after their diagnosis. However, it is extremely important that people in this stage of HIV disease get adequate care for any symptoms or conditions that develop. People with an AIDS diagnosis have coined the term "living with AIDS" to describe their experience. This term is preferred over others because it implies empowerment which may be crucial in maintaining a positive frame of mind and possibly even in surviving longer. As the term "HIV-disease" becomes more common, many people are also using the term "living with HIV" to refer to anyone who has the virus.

Does everyone who has HIV eventually get sick? Nobody knows. Many researchers believe that, in some small percentage of people with HIV, the immune system may be able to defeat the virus. As existing treatments are used earlier in the course of HIV disease and new treatments are developed, these, too, will postpone, and possibly prevent, illness. Unfortunately, however, studies show that the majority of *untreated* people do eventually become ill from HIV. Long-term studies of San Francisco gay men infected with HIV between 1978 and 1980 have shown that by 1992, 85% had developed AIDS, and 15% remained symptom-free. No one knows whether these men will eventually develop AIDS, or what percentage of the symptom-free men will develop AIDS in the years to come. Some long-term survivors may do so well because of their unique body chemistry, or access to a combination of medical, emotional and spiritual support, or something yet unknown to us. Others may find their health declining even with access to all of these things. We don't really know the answer yet, although you can be sure scientists and researchers are searching for the common thread that links long-term survivors together.

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