For Health Professionals

Health Alerts

Health Advisory #88 - Antibiotic Resistant Syphilis - July 19, 2004

Antibiotic-Resistant Syphilis is Spreading

By: LINDA A. JOHNSON, Associated Press Writer

A fast-spreading mutant strain of syphilis has proved resistant to the antibiotic pills that are offered to some patients as an alternative to painful penicillin shots.

Since the late 1990s, doctors and public health clinics have been giving azithromycin to some syphilis patients because the long-acting antibiotic pill was highly effective and easy to use. Four pills taken at once were usually enough to cure syphilis. But now researchers at University of Washington in Seattle have found at least 10 percent of syphilis samples from patients at sexually transmitted disease clinics in four cities had a strain resistant to azithromycin. "That suggests that this mutation is pretty widely distributed geographically," said Sheila A. Lukehart, research professor of infectious diseases.

The percentage of samples from San Francisco with the mutant strain jumped from 4 percent in 1999-2002 to 37 percent in 2003, with the increase taking place largely among gay or bisexual men with multiple partners. The study was reported in Thursday's New England Journal of Medicine.

Experts say doctors should switch to penicillin or other antibiotics if azithromycin does not work. But some of those antibiotics can cause nausea and other side effects and must be taken for two weeks; some patients do not complete their treatment and are not cured.

Experts said the findings also show that syphilis patients treated with azithromycin must have follow-up tests to be sure they are cured. After syphilis sores disappear, the disease can silently attack the brain and cause dementia, paralysis and death.

Penicillin has long been the recommended treatment for syphilis. But it must be given in two buttocks injections much more painful than typical shots, because a large amount of the solution must be forced into the muscle.

Syphilis decreased in the United States through the 1990s, then climbed 19 percent from 2000 to 2003 to about 7,100 cases, according to the Centers for Disease Control and Prevention. The CDC attributed the spike to a twelve-fold rise in cases among gay and bisexual men, many of whom are also infected with the AIDS (news - web sites) virus.

Lukehart studied 114 syphilis samples from Seattle, San Francisco, Baltimore and Dublin, Ireland, finding 28 percent were resistant to azithromycin, including 88 percent of the Dublin samples.
Dr. John Douglas, director of the CDC’s division of sexually transmitted disease prevention, said the agency is formulating a plan to test for resistant strains in some areas.

More information can be found at http://www.cdc.gov/nchstp/dstd/SyphilisInfo.htm