

HIV Treatment Might Increase Clearance of HPV Infection in Women

February 10, 2010

Women living with HIV who regularly take antiretroviral (ARV) therapy may be more likely to clear [human papillomavirus \(HPV\)](#) and cervical lesions than women who don't consistently take their meds, according to a study [published](#) in the March 1 issue of *The Journal of Infectious Diseases*.

Researchers have long known that HPV infection causes cervical lesions, also known as squamous intraepithelial lesions (SIL), and cervical cancer. It is also well known that rates of HPV infection, SIL and cervical cancer are higher in HIV-positive women than in the general population. What has been less clear is whether ARV therapy can reduce the prevalence of HPV infection and, with it, the risk of HPV-related diseases.

To determine the impact of HIV treatment on HPV infection and the development of SIL, Howard Minkoff, MD, from the State University of New York (SUNY) Downstate in Brooklyn, and his colleagues followed 286 HIV-positive women for at least 2.5 years before they started ARV therapy and for at least 2.5 years afterward. Women were tested for HPV infection and the presence and severity of SIL. Women were also rated based on their adherence to HIV treatment and divided into two groups for analysis—adherent, meaning consistently taking their HIV medication correctly at least 95 percent of the time, or non-adherent.

The participants represented a subset of volunteers participating in the larger Women's Interagency HIV Study (WIHS). Just over half of the women were infected with HPV upon entering the study, and about 25 percent had a strain of HPV known to cause cancer. Sixteen percent of non-adherent women had SIL before starting ARV therapy, compared with 22 percent of adherent women.

Minkoff's team found that adherence to ARV treatment appeared to have a modest effect on the detection and clearance of HPV infection. Women who were adherent to treatment had a 33 percent drop in the overall detection of cancer-causing HPV strains, compared with a 9 percent drop in non-adherent women. Women who were adherent to treatment were also more likely to see a reduction in SIL than women who were non-adherent.

The study, though demonstrating only a moderate difference between adherent and non-adherent women, is significant. Previous studies have only compared women on ARV therapy with women not on HIV therapy. The weakness of this approach is that women who start ARV therapy are

usually sicker to begin with than women who don't start treatment. In this case, HPV infection and SIL were explored only in women on treatment, thus reducing the chance that one group would be sicker than the other at the study's outset.

Nevertheless, the authors conclude that further studies are needed to confirm their results and to determine whether the difference they detected between adherent and non-adherent women would also influence cervical cancer risk.

© 2026 Smart + Strong All Rights Reserved.

<http://beta.docker.poz.com/article/hiv-hpv-papilloma-17992-8273>