

Association between cervical inflammation and cervical shedding of human immunodeficiency virus DNA

Abstract:

A cross-sectional study was conducted among prostitutes in Nairobi, Kenya, to determine the prevalence and correlates of cervical human immunodeficiency virus (HIV) DNA. Ninety-two HIV-seropositive prostitutes were evaluated during 137 clinic visits. Cervical HIV DNA was detected by polymerase chain reaction assay in 36 (39%) women at initial visits and in 40 (44%) women at any visit. There was a significant correlation between cervical HIV and microscopic evidence of cervical inflammation (odds ratio [OR], 7.2; 95% confidence interval [CI], 2.1-24.6). Using multivariate analysis to adjust for possible confounding, the adjusted OR for the association between cervical inflammation and cervical HIV DNA was 8.7 (95% CI, 2.0-37.2). Conditions associated with cervical inflammation are associated with the detection of HIV proviral DNA. Whether such conditions lead to increased infectivity remains to be proven.