



Study: HIV-Positive Postmenopausal Women Are Vulnerable to Bone Fractures

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Postmenopausal women living with HIV are at risk for future bone fractures because of a high prevalence of low bone mineral density and high bone turnover, according to a new study reported on by [Asian News International](#). The study will be published in the [Journal of Clinical Endocrinology & Metabolism](#).

“As HIV-infected individuals live longer with potent antiretroviral therapy (ART), metabolic complications such as low bone density and osteoporosis are increasingly recognized,” said Michael Yin, MD, of Columbia University Medical Center in New York City. “We hypothesized that postmenopausal women might be particularly vulnerable to the adverse effects of HIV infection or ART on the skeleton.”

Yin and his team conducted a longitudinal study to assess bone health in 92 HIV-positive and 95 HIV-negative postmenopausal women. The bone density of the lumbar spine, femoral neck and hip, along with body composition, were measured using dual X-ray absorptiometry (DXA).

Researchers discovered positive postmenopausal women had lower bone mineral density at both the spine and the hip than HIV-negative menopausal women. “While the reason for HIV-associated bone loss remains unclear, it may be related to increased levels of cytokines (proteins produced by cells that aid communication between cells), direct effects of antiretrovirals on bone cells or hormonal/nutritional deficiencies that are common in HIV,” Yin said.