

Some Depressive Symptoms Wane With Age in Group With HIV—Some Do Not

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Affective and cognitive depressive symptoms, and apathy, waned with age in people living with HIV (PLWH) in an analysis of 3848 men and women with or without HIV [1]. But somatic symptoms and anhedonia persisted into older age. The study also confirmed that PLWH carry a heavier burden of depressive symptoms than people without HIV, but this trend diminished with age.

University of California, San Diego (UCSD) researchers reminded colleagues that depression remains twice as prevalent in PLWH as in the general population. Research links older age to declining depression rates in the general population, the researchers noted, but studies of depression and aging with HIV have yielded inconsistent results.

The UCSD study involved PLWH and people without HIV from all HIV Neurobehavioral Research Center data collection points in the United States. All completed the Beck Depression Inventory-II (BDI-II) questionnaire about depressive symptoms [2]. BDI-II incorporates 5 subscales: somatic, anhedonia, apathy, affective, and cognitive. Linear regression analyses to explore BDI-II subscale outcomes had HIV status, age, and their interaction as predictors; covariates were sex, race, neurocognitive impairment (global deficit score), and lifetime substance use disorder.

The study group had 3057 PLWH and 791 people without HIV. PLWH contributed a significantly higher proportion of men than the group without HIV (81.2% vs 18.8%, $P < 0.001$), lower proportions of whites (46.3% vs 56.4%) and Hispanics (16.8% vs 22.3%) and a higher proportion of blacks (34.1% vs 16.1%) ($P < 0.001$). The group without HIV had more education years (13.3 vs 12.9, $P < 0.001$), a lower proportion of lifetime substance users (65.9% vs 71.4%, $P < 0.001$), and a lower proportion with neurocognitive impairment (28.8% vs 43.0%, $P < 0.001$).

PLWH reported significantly more depressive symptoms across the five BDI-II subscales (affective, beta = 0.19; cognitive, beta = 0.16; somatic, beta = 0.30; anhedonia, beta = 0.24, apathy, beta = 0.19) ($P < 0.05$ for all). For the combined group with or without HIV, older age led to fewer affective (beta = -0.08), cognitive (beta = -0.15) and apathy (beta = -0.03) symptoms ($P < 0.05$ for all), but older age did not significantly diminish somatic and anhedonia symptoms. Unadjusted models found a statistically significant HIV x age interaction indicating that the difference between PLWH and people without HIV in somatic symptoms narrowed as people aged.

For the whole group, in adjusted models factors significantly associated with greater depressive

symptoms across the five subscales were lifetime history of substance use, being female, being white versus black, and greater neurocognitive impairment.

UCSD investigators concluded that PLWH have “disproportionately higher rates of depression” than people without HIV, confirming earlier findings. This greater toll of depressive symptoms with HIV declined with age, but only for affective, cognitive, and apathy symptoms—not for somatic and anhedonia symptoms. Because of this disparity, the researchers suggested that interventions for older PLWH with depression should focus on somatic and anhedonia symptoms.

References

1. Ham L, Prescott M, Ellis R, et al. Disparities in depressive symptoms among people with HIV diminish with older age. International Workshop on HIV & Aging 2023, October 26-27, Washington, DC. Abstract 15.
2. Naviaux lab. UCSD. BDI-II. <https://naviauxlab.ucsd.edu/wp-content/uploads/2020/09/BDI21.pdf>