

# Time to Antiretroviral Therapy Initiation and its associated factors among People Living with HIV: Results from the Tanzania HIV Impact Survey 2016-2017

## Authors

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## Background

The universal test-and-treat (UTT) strategy for HIV was recommended by World Health Organization in 2015 and was adopted by Tanzania in October 2016.

Baseline information on the length of time between HIV diagnosis and initiation on antiretroviral therapy (ART) is lacking, which is useful in the evaluation of UTT strategy progress.

To understand time to ART initiation before UTT implementation, we analyzed data from the Tanzania HIV Impact Survey (THIS) 2016-2017.

## Methods

Our evaluation comprises 985 participants living with HIV (PLHIV) aged 15 years and older (figure 1). Participants self-reported HIV status and ART use during interview.

In addition, confirmation of HIV status and detection of ART in blood was done in the laboratory.

A cox proportional hazard model was used to estimate demographics and sexual behaviors covariate effects on 'time to ART initiation' before UTT. Sampling weights and Jackknife variance estimation were included during the analysis.

We estimated adjusted hazard ratios (aHR) with 95% confidence intervals (95%CI).

## Results

Out of 1,070 confirmed PLHIV, 985 were included in the evaluation, whereby 88 PLHIV were diagnosed after UTT adoption and 897 before UTT adoption.

Before UTT, the median time to ART initiation was 4 months (interquartile range [IQR] 3-7 months) compared to 1 month [IQR: 1-2] after.

Prior to UTT, shorter time to ART initiation was associated with being an older adult (50+ years) [aHR 1.39, 95%CI 1.15-1.69] compared to adults 25-49 years and having primary education or higher [aHR 1.29, 95%CI 1.02-1.61] compared to having no formal education.

## Conclusion

Prior to UTT strategy adoption, PLHIV experienced differential time to ART initiation, with those aged 25-49 years and never attended to school notably taking longer time.

These findings provide a baseline for measuring the progress towards UTT in Tanzania once results from the ongoing THIS 2022-2023 becomes available.



Community field mobilizer taking THIS information from a family in Tanzania.



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