Poster # 1008

TREATMENT NEED AND FAST-TRACK ART IN THE BOTSWANA COMBINATION PREVENTION PROJECT

Authors: Refeletswe Lebelonyane[1], Lisa A. Mills[2], Joe Theu[1], Lisa Block[3], Michael Kasonde[2], Tony Chebani[1], Shenaaz el-Halabi[1], Elliot Raizes[3], Shahin Lockman[4], Joseph N. Jarvis[2]

[1]Botswana Ministry of Health, Gaborone, Botswana, [2]CDC Botswana, Gaborone, Botswana, [3]CDC, Atlanta, Georgia, USA, [4]Botswana Harvard AIDS Research Institute Partnership, Gaborone, Botswana

BACKGROUND

To ensure the success of Universal Test and Treat (UTT) it is essential that there are no barriers to ART initiation.

Prior to UTT in Botswana national guidelines recommended baseline blood tests and adherence counseling before ART initiation requiring a minimum of 2-3 visits.

Since UTT implementation in June 2016 the Botswana Combination Prevention Project (BCPP) has offered fast-track ART initiation, with enhanced counseling and ART offered at the first clinic visit.

We evaluated:

(a) the the feasibility of identifying untreated adults in the community through enhanced community testing, and

(b) acceptability and feasibility of fast-track ART initiation and the impact on ART uptake and time to treatment initiation.

METHODS

The Botswana Combination Prevention Project (BCPP) is a cluster randomized trial evaluating the impact of a combination prevention package on HIV incidence in 30 communities.

This sub-analysis of the 15 intervention communities evaluates:

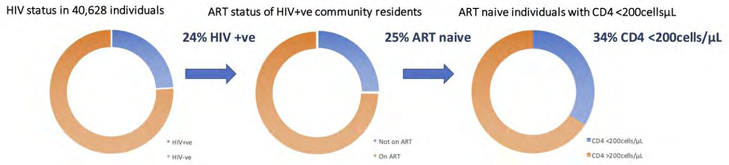
1) The cohort of patients identified through enhanced BCPP testing and linkage activities between October 2013 and May 2016, and
2) Patients initiating ART according to national guidelines and visit schedules from October 2013-May 2016, and those initiating ART following UTT introduction, 1 June-31 November 2016. During the latter period all participants with a positive HIV verification test were immediately referred for ART initiation.

The number of individuals identified in the communities who were HIV-infected and not on ART was determined, and the prevalence of advanced HIV disease (CD4 count < 200 cells/μL) defined.

The proportion of patients initiating ART, the timing of ART initiation, and preliminary treatment outcomes were assessed.

RESULTS

BCPP assessed HIV status in 40,628 individuals; 9,586 (24%) were HIV-infected. Among the 9,406 with complete data, 2,354 (25%) were not on ART, 34% of whom had CD4≤200 cells/μL. 1,120 qualified for treatment by pre-UTT national guidelines (CD4≤350), of whom 76% initiated ART.



Prior to introduction of Universal Test and Treat (UTT)
Overall, prior to UTT 1,775 HIV-infected treatment eligible participants attended HIV-clinics in the 15 intervention communities, of whom **77% (1,359) initiated ART.** Median time to ART initiation was 35 days, with 46% (571 of the 1,253 with a known start date) starting within 30 days.

After introduction of UTT with Fast Track ART
Following introduction of UTT and fast-track ART initiation 1426 eligible participants attended a clinic visit and **96% (1362) initiated ART.** 76% (1012/1328 with a known start date) initiated on the same day as their verification test, 90% (1201/1328) initiated ART within a week of their initial clinic visit, and 97% (1285/1328) initiated within 30 days.

BCPP ART Initiations by Time: Pre-UTT vs. Post-UTT

ART Initiation	Same Day	1-7 Days	8-14 Days	15-30 Days	> 30 Days
Pre-UTT N= 1,359* (Pre June 2016)	0 (0%)	79 (6%)	171 (14%)	321 (26%)	682 (54%)
Post-UTT N=1,362** (June-Nov 2016)	1012 (76%)	189 (14%)	51 (4%)	33 (2%)	38 (3%)

*Pre-UTT – ART timing missing in 106 (8%) of the 1379 ART Initiations
** Post-UTT – ART timing missing in 34 (3%) of 1362 ART Initiations

Baseline CD4 Counts: 75% (1018) of those initiated post-UTT had baseline CD4 count results. 23% (231/1018) CD4 <200 cells/μL.

Safety: Forty two (3%) of individuals initiating fast-track ART had a baseline creatinine clearance (cc) <60mls/min. Of these 13 were clinically unstable, and started on non-TDF based regimens after awaiting blood test results. Twenty nine individuals with cc <60 60mls/min started TDF based regimens; 12 stabilized or improved and remained on TDF, 10 switched, 5 are awaiting repeat creatinine results, and two died. Overall there were 3 deaths in the first 90 days post initial clinic visit in the pre-UTT period and 3 deaths in the post-UTT period.

Viral suppression: Of 1092 patients initiated in the first 3 months 74% (803) had VL at 3 months of whom 89% (711/803) had VL < 400 copies/ml.

CONCLUSIONS

Significant numbers of untreated HIV-infected individuals, including with advanced disease, were identified through intensified community testing.

Fast track ART was acceptable and feasible and led to increased rates of ART initiation and markedly reduced times from initial clinic visit to treatment start.

Virological suppression rates at 3 months post fast-track ART initiation were good.

Rates of advanced immune suppression at ART initiation remain significant, and care must be taken to screen individuals for opportunistic infections prior to fast track ART initiation.

Baseline blood tests for creatinine testing must still be taken at the time of fast track ART initiation if using TDF based regimens.

These findings demonstrate that Fast-track ART initiation is feasible and acceptable to patients, and could help ART programs in Africa reach the ambitious UNAIDS 90-90-90 targets.

Acknowledgements

Centers for Disease Control – Botswana
Botswana Ministry of Health
Tebelopele Counseling and Testing Center
Harvard Chan School of Public Health
Botswana-Harvard Partnership
Botswana Participants

Center for Global Health
Division of Global HIV/AIDS and TB