

Increased Knowledge of HIV Status Among Youth: Results of Yathu Yathu Randomized Trial

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BACKGROUND

High quality evidence is urgently needed to inform the design of effective interventions to reduce the burden of HIV among adolescents and young people aged 15-24 (AYP), amongst whom HIV incidence remains high. Findings from HPTN-071 (PopART) in Zambia, community consultations and formative research with AYP, facilitated the co-development of Yathu Yathu, a strategy to deliver comprehensive sexual and reproductive health services (SRHS) to AYP in Lusaka, Zambia. We report the impact of Yathu Yathu on knowledge of HIV status.

METHODS

Yathu Yathu was a cluster-randomized trial (CRT) conducted from 2019-2021 in two urban communities. The communities were divided into 20 zones (~2350 AYP/zone) that were randomly allocated to the Yathu Yathu intervention or control arm. In intervention zones, a community-based hub, staffed by peer support workers, was established to provide SRHS.

In 2019, a census was conducted in both arms. All AYP aged 15-24 who were contacted and consented were given a Yathu Yathu card, which allowed them to accrue points for accessing SRHS at the hub and health facility (intervention arm) or at the health facility only (control arm). Points could be exchanged for rewards, thus incentivizing use of SRHS in both arms.

We conducted a cross-sectional survey in 2021 to estimate the impact of Yathu Yathu on the primary outcome: knowledge of HIV status (self-reporting living with HIV or HIV testing in the last 12 months). We analysed data at cluster-level using a two-stage process recommended for CRT with <15 clusters/arm.



Pictures. Yathu Yathu card (above); Peer support worker at a Yathu Yathu Hub (right)

Knowledge of HIV status was *higher in the intervention arm compared to control* (73.3% vs 48.4%, adjusted prevalence ratio 1.53 95%CI 1.36, 1.72; p<0.001).

RESULTS

- 1989 AYP consented to participate in the survey (50% of participants were male), with consent similar across arms (63% consent/arm).
- **Knowledge of HIV status ranged from 63.6% to 81.2% across the ten intervention zones and 35.4% to 63.0% across the ten control zones.**

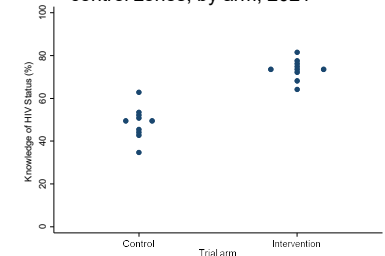
Adjusting for age, sex and community, knowledge of HIV status was higher in the intervention arm compared to control (73.3% vs 48.4%, respectively, adjusted prevalence ratio (PR) 1.53 95%CI 1.36, 1.72; p<0.001). Results were similar by age and sex (Table). However, the impact was greater among adolescents aged 15-19, particularly boys (62.2% vs 27.9%, PR=2.37 95%CI 1.77, 3.17; p<0.001).

Table. Knowledge of HIV status among adolescents and young people in Yathu Yathu and control arm, 2021

	Yathu Yathu Arm	Control Arm	Adjusted Prevalence Ratio (95%CI)	95%CI	p-value
Overall	73.3%	48.4%	1.53	1.36, 1.72	<0.001
Adolescent girls (aged 15-19*)	76.6%	49.1%	1.58	1.37, 1.83	<0.001
Adolescent boys (aged 15-19*)	62.2%	27.9%	2.37	1.77, 3.17	<0.001
Women (aged 20-24*)	84.4%	65.7%	1.33	1.05, 1.69	0.021
Men (aged 20-24*)	70.3%	51.0%	1.41	1.15, 1.73	0.002

* Age at time of consent to receive a Yathu Yathu card

Figure. Knowledge of HIV status across intervention and control zones, by arm, 2021



CONCLUSIONS

- Delivering community-based, peer-led and incentivized SRHS increased knowledge of HIV status among all AYP compared with the current standard of care.

With high HIV incidence among the growing population of AYP in Zambia and neighbouring countries, scaling up the highly effective Yathu Yathu strategy has the potential to make a substantial contribution to increasing access to HIV prevention and care services, and SRH services more broadly, for youth, who are currently left behind.

ADDITIONAL KEY INFORMATION

Protocol paper available at:

<https://www.sciencedirect.com/science/article/pii/S1551714421003049?via%3Dihub>

The key secondary outcome of the Yathu Yathu trial is being presented at CROI 2022. Poster 00710, February 14th.

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