

THE LANCET HIV

Supplementary appendix

This appendix formed part of the original submission and has been peer reviewed. We post it as supplied by the authors.

Supplement to: Mulubwa C, Hensen B, Phiri MM, et al, for the HPTN 071 (PopART) Study Team. Community based distribution of oral HIV self-testing kits in Zambia: a cluster-randomised trial nested in four HPTN 071 (PopART) intervention communities. *Lancet HIV* 2018; published online Dec 21. [http://dx.doi.org/10.1016/S2352-3018\(18\)30258-3](http://dx.doi.org/10.1016/S2352-3018(18)30258-3).

Appendices material for “Community based distribution of oral HIV self-testing kits in Zambia: a cluster-randomized trial nested in four HPTN 071 (PopART) intervention communities”

Appendices

1. Type of HIV testing services selected by individuals eligible for an offer of and choosing to test for HIV in HIV self-testing zones
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Appendix 1. Type of HIV testing services selected by individuals eligible for an offer of and choosing to test for HIV in HIV self-testing zones

	HIV self-testing			Overall (%, n/N)	HIV finger-prick RDT (%, n/N)	Overall (%, n/N)
	Supervised (%, n/N)	Unsupervised (%, n/N)	Secondary distribution (%, n/N)			
Overall	81.7 (3,727/4,561)	11.2 (511/4,561)	7.1 (323/4,561)	56.4 (4,561/8080)	43.6 (3,519/8,080)	86.5 (8,080/9,343)
Male	73.9 (1,484/2,008)	12.0 (241/2,008)	14.1 (283/2,008)	56.1 (2,008/3,582)	43.9 (1,574/3,582)	88.0 (3,582/4,070)
Female	87.9 (2,243/2,553)	10.6 (270/2,553)	1.6 (40/2,553)	56.8 (2,553/4,498)	43.2 (1,945/4,498)	85.3 (4,498/5,273)
Overall 16-29	85.8 (2,327/2,712)	10.2 (277/2,712)	4.0 (108/2,712)	56.8 (2,712/4,777)	43.2 (2,065/4,777)	90.8 (4,777/5,262)
Males 16-29	82.9 (962/1,161)	9.8 (114/1,161)	7.3 (85/1,161)	56.3 (1,161/2,063)	43.7 (902/2,063)	91.6 (2,063/2,253)
Female 16-29	88.0 (1,365/1,551)	10.5 (163/1,551)	1.5 (23/1,551)	57.1 (1,551/2,714)	42.9 (1,163/2,714)	90.2 (2,714/3,009)
Overall 30+	75.7 (1,400/1,849)	12.7 (234/1,849)	11.6 (215/1,849)	56.0 (1,849/3,303)	44.0 (1,454/3,303)	80.9 (3,303/4,081)
Male 30+	61.6 (522/847)	15.0 (127/847)	23.4 (198/847)	55.8 (847/1,519)	44.2 (672/1,519)	81.2 (1,519/1,871)
Female 30+	87.6 (878/1,002)	10.7 (107/1,002)	1.7 (17/1,002)	56.2 (1,002/1,784)	43.8 (782/1,784)	78.8 (1,784/2,264)

Appendix 2: Description of cost components

Component	Description
Intervention costs	These were the additional costs of introducing HIV self-testing into PopART. Costs of HIV self-testing: procuring HIV self-testing kits, including the actual cost of kits and transportation up to central level. Cost of supplies: including cost of supplies that directly support implementation of the intervention; e.g. stationary (including teaching aid reproduction) and extra bags for the HIV self-testing kits. Personnel costs.
Research Costs	Included costs which were related to impact evaluation, social science and economic evaluation
Community Sensitization and mobilization	Costs of additional community engagement activities related to HIV self-testing distribution including personnel, supplies, transportation and travel and capital costs. For example the cost of sensitization meetings with Ministry of Health at central, provincial and district levels and community sensitization meetings.
Quality Assurance	Costs of specific QA/QC activities related to HIV self-testing disaggregated by personnel, supplies, transportation and travel, and capital costs.
Project coordination	These generally included shared costs related to administrative and project coordination activities including supervision and mentorship, mostly incurred at central office. Costs associated with technical support from central office – travel costs such as per diem, accommodation and transportation – including personnel costs.
Set-up costs	These are costs which were incurred before 1 February 2017 to set up the project
Trainings	Costs of initial trainings; Initial protocol training for field staff.
PopART Community intervention costs	All costs related to PopART community finger prick RDT activities
Cost of the intervention (HIVST) Arm	Intervention costs plus PopART community intervention costs
Cost of non-HIV self-testing	PopART community intervention costs

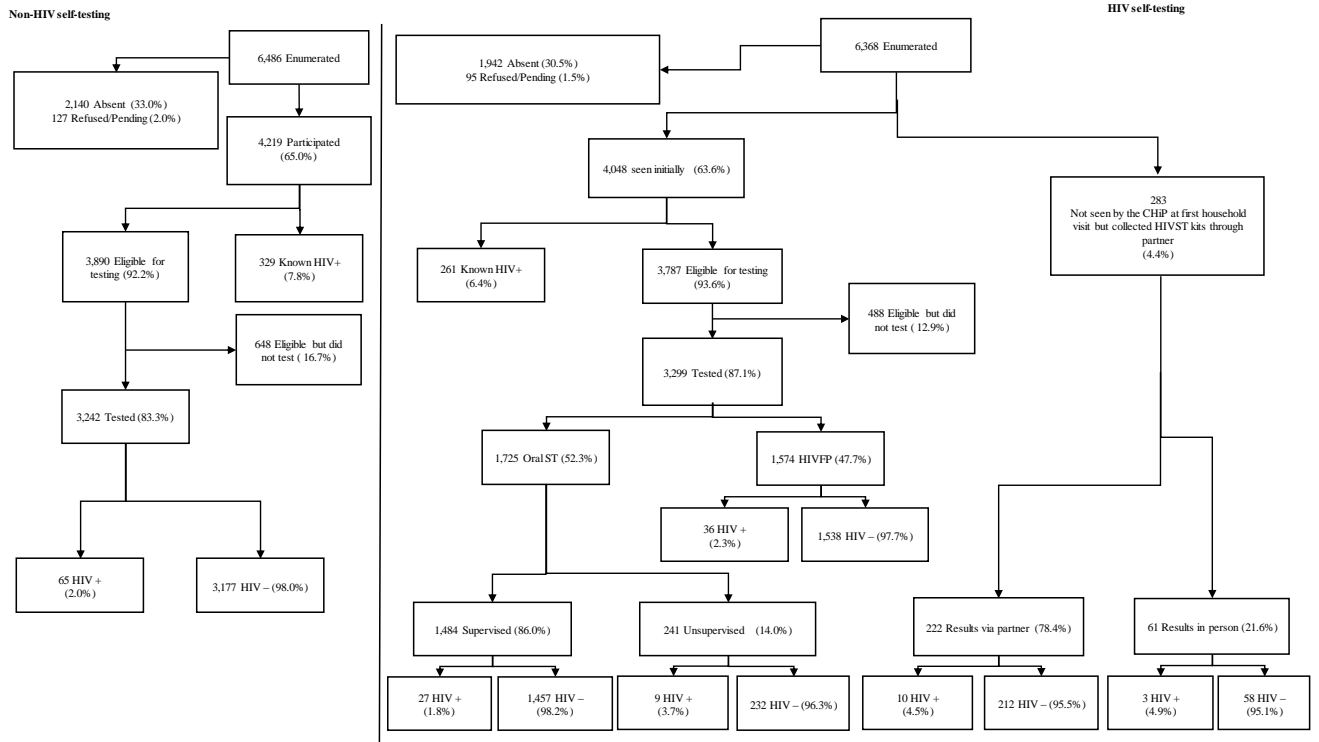
Appendix 3. Unit costs (US\$) by HIV self-testing and non-HIV self-testing groups

Item	Non-HIV self-testing group	HIV self-testing group
<i>Total intervention costs</i>	<i>Value (US\$)</i>	<i>Value (US\$)</i>
PopART Costs		
Staff costs	145,694	145,694
General supplies	3,693	3,693
First line testing supplies	22,004	9,927
Second line test supplies	677	296
<i>Sub-total costs</i>	<i>172,069</i>	<i>159,610</i>
HIV self-testing costs		
Personnel		48,456
Administration		9,844
Transportation & Travel		6,796
Supplies		4,089
HIVST kit		13,683
Equipment		613
Parallel HIV testing*		654
<i>Sub-total costs</i>		<i>84,135</i>
Total Costs	172,069	243,745
Outcomes		
	<i>number</i>	<i>number</i>
Number of persons enumerated	13,706	13,267
Number of persons tested	7800	8080
Number of Newly HIV+ persons identified	204	237
HIVST kits distributed		4561
Number confirmed HIV self-testing HIV+ persons ^{&}		109
Incremental number of individuals tested		280
Cost-effectiveness (US\$)		
	<i>Value (US\$)</i>	<i>Value (US\$)</i>
Cost per person enumerated	12.55	18.37
Cost per person tested	22.06	30.17
Cost per newly HIV+ person identified	843.47	1028.46
Cost per HIV self-test kit distributed		18.45
Cost per confirmed HIV self-testing HIV+		771.88
Incremental costs		71,675.78
Incremental cost per person tested		255.98

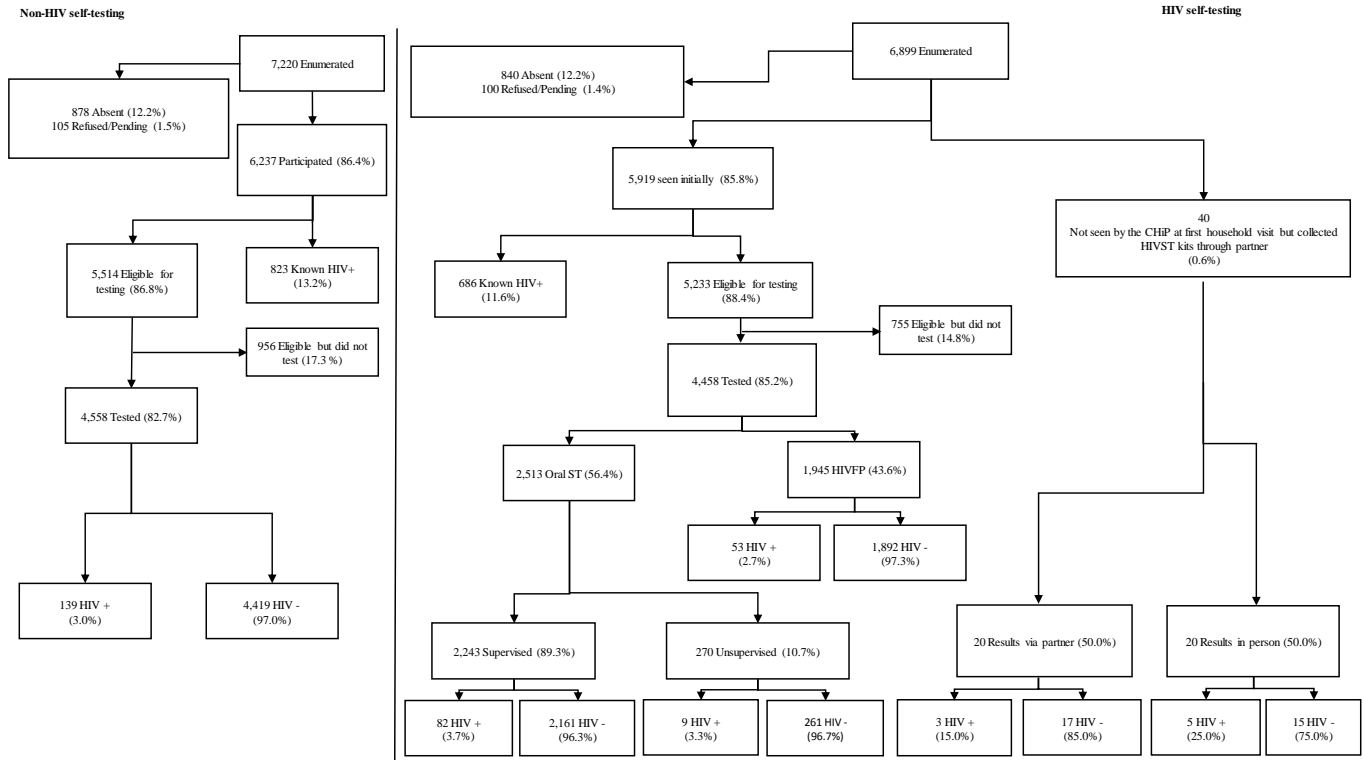
Key: [&]Confirmed HIV self-testing HIV+ - individuals who self-tested HIV positive and accepted a confirmatory test

*Parallel HIV testing is when Determine HIV and UniGold tests are performed to confirm an HIV test result

Appendix 4: Enumeration and uptake of HIV testing in the HIV self-testing and non-HIV self-testing groups among males



Appendix 5: Enumeration and uptake of HIV testing in the HIV self-testing and non-HIV self-testing groups among females



Appendix 6: Social harms matrix

Source 1	Source 2	Type
20170329_Z6_FGD	FGD (CHiPs)	Threatening harm/ divorce
20170329_Z6_FGD	FGD (CHiPs)	Couple separated
20170317_Z5_FGD	FGD (CHiPs)	Invasion of privacy
20170329_Z1_FGD	FGD (CHiPs)	Deceit / forced testing
20170321_Z6_IDI	Male (adolescent, accepted, supervised)	Deceit / forced testing
20170220_Z6_HIVST	FGD (CHiPs observation)	Forced testing
Monitoring visit	Case 1	Attempted forced testing
Monitoring visit	Case 3	Emotional distress
Monitoring visit	Case 4	Marriage Separation
Monitoring visit	Case 10	Emotional distress
Monitoring visit	Case 11	Emotional distress
Monitoring visit	Case 14	Blackmail (using results as evidence against spouse)
Monitoring visit	Case 17	GBV and Threatening suicide
Key: Z1, Z5 and Z6 are site codes		