RE-EXAMINING OUR DEFINITION AND ESTIMATES OF RETENTION IN CARE

Bulsara SM[1,2]., Wainberg ML[3]., Newton-John TRO[2]

[1] The Albion Centre, Surry Hills, NSW 2010, Australia
[2] Clinical Psychology, Graduate School of Health, University of Technology Sydney, Ultimo, NSW 2007, Australia
[3] Department of Psychiatry, Columbia University, New York, NY, USA

BACKGROUND

Holistic care encompassing psychosocial as well as physical components of health increasingly impacts HIV management. Failure to account for these risks an overly simplified definition and estimate of retention in care, which may skew Australia's ongoing response to the epidemic.

In 2016, the World Health Organization (WHO) updated their definition of retention to *"a person living with HIV who is enrolled in HIV care and routinely attends these services in accordance with the need"* (WHO, 2016). This reviewed definition accounts for individual differences and multi-morbidities, and the role of these in medical management for people living with HIV (PLHIV). Some developed countries (e.g. Australia and USA) have yet to follow suit. Comparative definitions of retention are presented in Table 1.

Table 1: Definitions of 'retention in care'

Guidelines/year	Definition of 'retention in care'
CDC (USA), 2018	≥ 2 visits (VL or CD4) in 12 months, ≥ 90 days apart
WHO (Global) 2016	Attendance to HIV medical review 'as needed'
Kirby (Australia), 2017	≥ 1 CD4 or VL test in 12 months

With an ageing cohort of PLHIV often presenting with biopsychosocial multi-morbidities, more regular attendance is generally required to effectively manage the potential impact of these on HIV; this increasingly reflects the characteristics of PLHIV attending for care at public health facilities.

Australia has long demonstrated above-average retention rates when compared to other developed countries. However our definition of retention, on which our estimates are based, lacks the nuance of the revised WHO definition, and neglects to account for the role of biopsychosocial multi-morbidities in HIV management.

The present study sought to determine how applicable the current Australian definition of retention is to this cohort, and to understand the potential difficulties translating broad metrics of retention into clinical practice.

METHOD

Interim data are presented for PLHIV attending The Albion Centre (Albion; Australia's largest public health facility providing care for PLHIV) for medical care in February 2017. A 12-month retrospective file review was completed for this cohort, and their attendance compared against the current Australian definition of retention, as well as the WHO definition (Table 1). Clients with missing data (e.g. attendance schedules) were excluded from the analysis, as were those who were known to have transferred their care from the service. A total of 177 participants remained.

There is no clear precedent in the literature regarding the cut-offs to define 'on-time' attendance; it was therefore decided to incorporate a lenient definition of *'attendance as needed'*, to include those who attended within two months of their scheduled visit, as well as those for whom there was missing data but were considered retained based on their overall profile, frequency of attendance to Albion, and engagement with other clinical services within the Centre. A 'visit' was considered a face-to-face consultation with an HIV specialist at Albion.

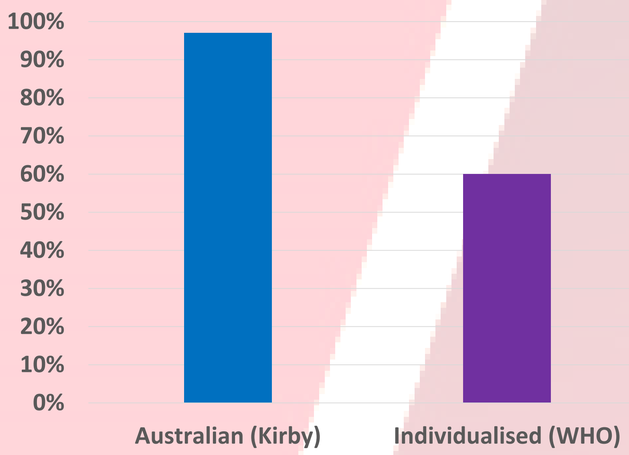
METHOD (cont)

Participants were also assessed according to the Clinical Complexity Rating Scale for HIV (CCRS-HIV; Bulsara et al., 2018), with scores over 30 considered 'complex' or 'warranting attention'. The target cohort of interest was those who met the standard Australian definition of retention (Kirby, 2017), but failed to *'attend as needed'*.

RESULTS

Preliminary results (Figure 1) suggest that while a high percentage of participants are considered retained in care according to current Australian standards (97%), considerably fewer attended follow-up medical reviews as recommended by their doctor, even with a lenient definition of *'attendance as needed'*.

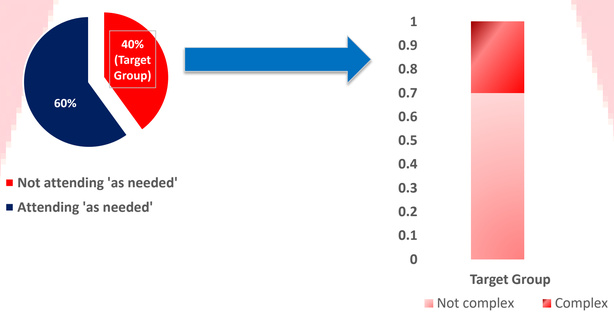
Figure 1: Percentage of participants who attended in accordance with Australian vs. WHO definitions of retention



Approximately 40% of those considered retained according to Australian standards, were not attending appointments *'as needed'* (target group). Approximately 30% of this target group were also considered 'complex' (Figure 2) according to CCRS-HIV scores (i.e. they were assessed as presenting with biopsychosocial multi-morbidities which may impact their management of HIV; Bulsara et al., 2018). It was beyond the scope of this study to determine whether the target cohort were accessing care elsewhere, or the nature of follow-up attempts by clinicians to facilitate engagement.

Figure 2:
(L) 'Target Group' - Proportion of those retained according to Australian definition but not attending appointments 'as needed'

(R) - Proportion of the target group considered 'complex' according to CCRS-HIV scores



CONCLUSIONS

Region-specific estimates of retention are often drawn upon to allocate resources to ensure regions continue to pursue UNAIDS 90-90-90 targets. These pilot results provide preliminary data from one public health facility in Sydney which suggest an overhaul of Australian definitions of retention is warranted, consistent with global WHO guidelines. They also add to existing concerns regarding translating broad recommendations from agencies who develop policies and/or guidelines and provide estimates on all elements of the cascade, into clinical practice.

The present study identified a target cohort of concern, those who *appear* retained according to overly broad definitions, but who do not attend consistent with the individualised schedule determined by their HIV specialist. This cohort warrants closer attention to ensure effective holistic treatment of multi-morbidities which may impact the medical management of HIV.

The results also suggest that current resource allocation to testing and prevention strategies is based on outdated estimates. The present findings corroborate clinical experience that public health facilities supporting PLHIV require greater resources to support a best-practice, integrated care approach to improve retention strategies. In particular, increased staff numbers to support clinicians' attempts to facilitate engagement for PLHIV with complex presentations. Current IT systems also lack the capacity to adequately identify and monitor client attendance and engagement.

To effectively support an ageing PLHIV population with often complex multi-morbidities within the public health system, we need to update our definitions and estimates of retention in care. Greater attention is required on this area of the Cascade, with resource allocation increased to improve our capacity to assist clients to live well with HIV.

Disclosure of Interest Statement:

The authors declare they have no conflict of interest. No funding was sought or received for this project. The Albion Centre is a NSW Health entity, and WHO Collaborating Centre for capacity building on HIV and STI Care, treatment and support.

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