

HOW DOES YOUR TEAM SCORE? IMPROVING CARDIOVASCULAR RISK ASSESSMENT AMONG PEOPLE LIVING WITH HIV

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Background:

People living with HIV (PLWHIV) face higher cardiovascular risk than individuals without HIV. Annual risk-factor assessment (CVRFA) allows clinicians to target highest absolute risk, maximising prevention. Before reintroducing structured comorbidity screening following COVID-restrictions, we assessed Australian guideline-based CVRFA at Western Sydney Sexual Health Centre (WSSHC) alongside the circulation of 'risk-assessment scorecards' to staff.

Approach:

Retrospective file review: all HIV monitoring attendances among PLWHIV aged ≥ 45 at low/medium baseline cardiovascular risk attending WSSHC ≥ 1 visit/year for ≥ 5 years. 'Any' CVRFA=minimum once yearly diabetes-HbA1c/Cholesterol:HDL/Systolic Blood Pressure ('SBP') or smoking assessment. Complete CVRFA ('cCVRFA')=all 4 assessments. Audit periods: before ('A1'-1/12/2021-30/11/2022) and during ('A2'-1/12/2022-30/11/2023) internal distribution of 3-monthly 'scorecards' (clinic-wide CVRFA metrics, cohort risk snapshots). Chi-square tests assessed A1-A2 CVRFA differences ($p < 0.05$ for significance).

Outcomes:

622 attendances/127 PLWHIV (median age=55, 22% female, 53% overseas-born, median 13.5 years since diagnosis, median CD4 nadir=248 cells/uL, 98% on antiretroviral treatment-viral load<200 copies/ml, mean attendances=2.2 (A1); 2.7 (A2)).

CVRFA: Diabetes/HbA1c assessment=36% PLWHIV in A2 (versus 25% in A1- $p=0.057$), Cholesterol:HDL=52% (vs 32%- $p=0.002$), SBP=56% (vs 52%- $p=0.529$), smoking assessment=91% (vs 83%- $p=0.040$), weight=54% (vs 51%- $p=0.615$), Body-Mass Index/BMI=28% (vs 19%- $p=0.076$). Any CVRFA=98% in A2 (vs 93%- $p=0.076$); cCVRFA=16% (vs 9%- $p=0.084$). 30% females aged 45-59 had cCVRFA (A2 and A1), vs 9% (combined average) in other strata ($p=0.001$).

Risk: 'Intermediate/high' absolute risk (where calculable): 11/20 in A2 (vs 6/12 A1). Median HbA1c/Smoking/BMI results were identical A1-A2 (5.5%/22%/26kg/m² respectively). Median Cholesterol:HDL/SBP/Smoking/Weight=4.1 (A2) vs 4.2 (A1)/132 vs 130 mmHg/80 vs 79kg.

GP-linkage assessment: 74% in A2 vs 56% A1- $p=0.002$. 90% assessed had GPs in A2 vs 83% A1- $p=0.162$.

First-attendance HbA1c or Cholesterol:HDL assessment=41% in A2 (vs 38% A1-
p=0.525); other risk-factors unavailable)

Significance:

In an older, well-engaged cohort, cholesterol, smoking and GP-linkage assessments improved alongside scorecard distribution, although increased attendances likely contributed. With further improvements needed, scorecards may aide clinics/clinicians in targeting cardiovascular risk, including among females.

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