

Aging with HIV vs. Aged with HIV: Profiling adults diagnosed with HIV after age 50 in British Columbia

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Background

- Globally, there are an unprecedented number of people living with HIV (PLHIV) who are age 50 or over.
- One way to characterize the diversity among older PLHIV is to classify this group based on age at HIV diagnosis (See Figure 1). In Canada, the HIV-Aged group is expanding.

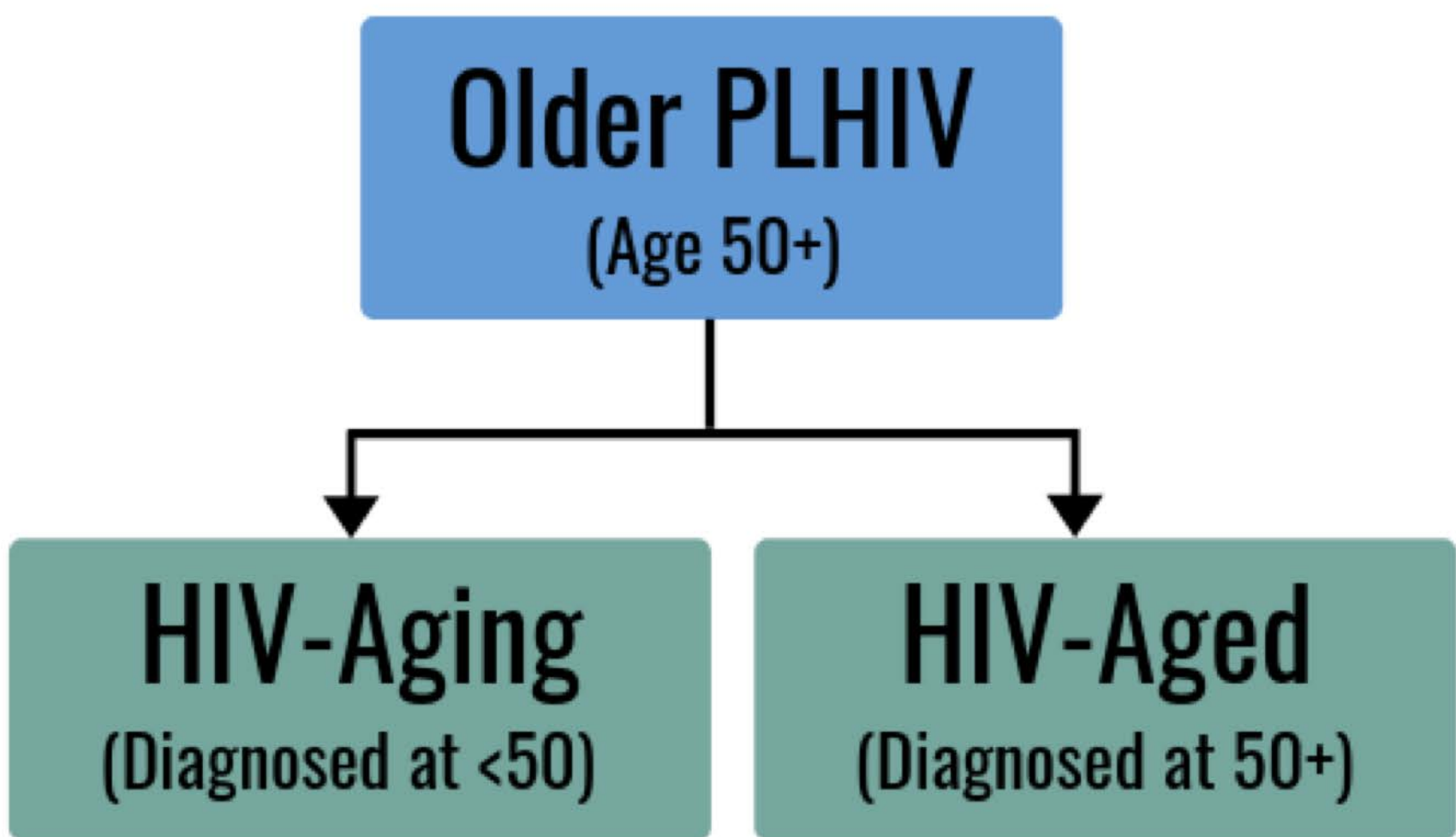


Figure 1: Definition of the HIV-Aged and HIV-Aging subgroups

- Objective:** Using data from BC, we aimed to build on preliminary characterizations of the HIV-Aged by assessing how the age distributions of new diagnoses have changed over time, comparing demographic and clinical characteristics of the HIV-Aging vs. HIV-Aged, and examining how the HIV-Aged engages in the cascade of care.

Methods

- Data source:** We employed data from the STOP HIV/AIDS provincial cohort, a linked database including treatment and surveillance records for PLHIV in BC.
- Chi-squared and Wilcoxon Rank Sum Tests were used to compare the HIV-Aged vs. HIV-Aging subgroups.
- We characterized the HIV-Aged cohort by assessing the relative increase of HIV diagnoses among those 50+ over time. We also estimated engagement in the STOP HIV/AIDS cascade of care over time (excluding individuals with <18 months follow-up).

Results

- The HIV-Aged were more likely to have acquired HIV via heterosexual sex (17.6 vs. 9.1%, $p<0.001$) (See Table 1).

	HIV-Aging (n=2819) n (%)	HIV-Aged (n=1951) n (%)	p-value
Sex			
Female	408 (14.5)	324 (16.6)	0.044
Male	2410 (85.5)	1626 (83.3)	
Risk Group for HIV Acquisition			
Injection drug use (IDU)	893 (31.7)	355 (18.2)	<0.001
Men who have sex with men (MSM)	881 (31.3)	472 (24.2)	
Heterosexual	257 (9.1)	344 (17.6)	
MSM/IDU	234 (8.3)	60 (3.1)	
Other	20 (0.7)	27 (1.4)	
Unknown	534 (18.9)	693 (35.5)	
Hepatitis C ever			
No	1314 (46.6)	812 (41.6)	<0.001
Yes	1119 (39.7)	384 (19.7)	
Unknown	386 (13.7)	755 (38.7)	

Table 1: Bivariate comparisons of clinical and demographic characteristics of HIV-Aging and HIV-Aged groups in the BC STOP HIV/AIDS study cohort (1996-2014) (Total n=4770)

- The proportion of diagnoses among the HIV-Aged has risen to unprecedented levels, from 9.7% (n=142/1458) in 1996 to 28.5% (n=129/453) in 2014 (See Figure 2).

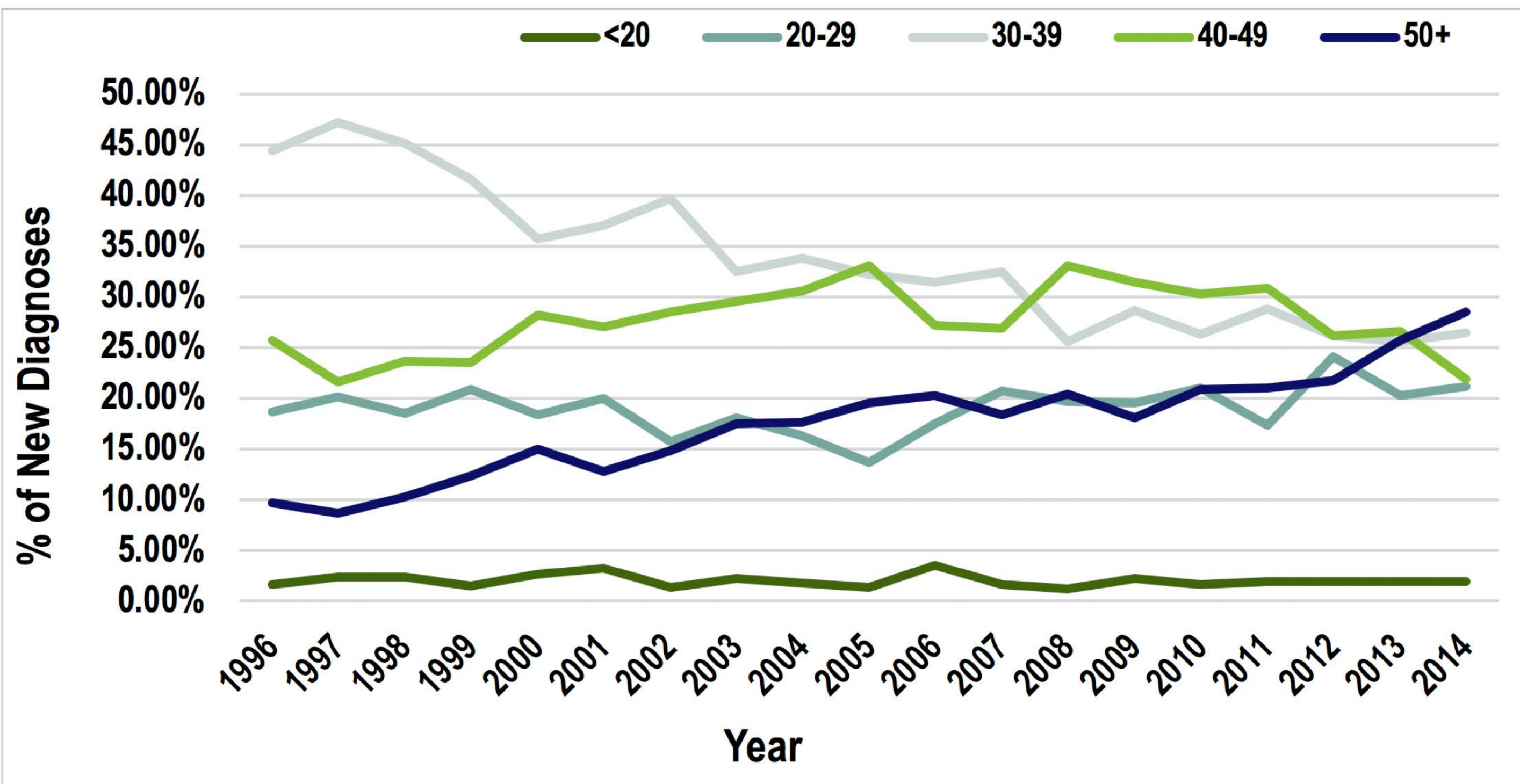


Figure 2: Change in the number of new diagnoses in the STOP HIV/AIDS cohort by age at diagnosis, 1996-2014 (n=12,076)

- The proportion of HIV-Aged who were virally suppressed increased from 70.9% in 2000 to 88.6% in 2014 (See Figure 3).

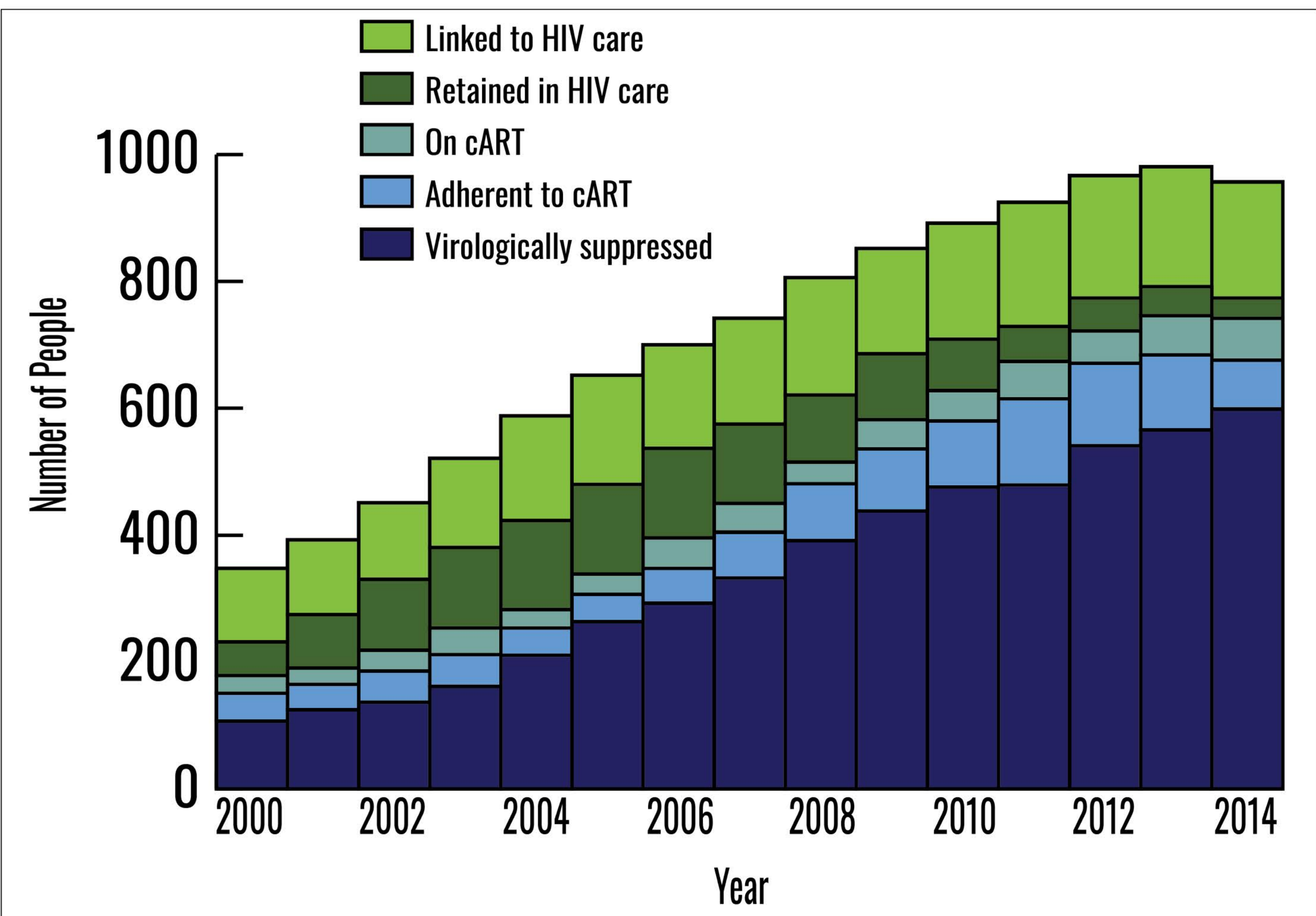


Figure 3: Estimated HIV cascade of care among the HIV-Aged in the STOP HIV/AIDS cohort, 2000-2014 (n=1463)

Discussion

- The number of individuals diagnosed after age 50 (HIV-Aged) has approximately tripled between 1996 and 2014.
- Unadjusted analyses reveal differences between the HIV-Aged and HIV-Aging groups. These differences may have implications for HIV treatment and care.
- Engagement in the cascade of care among the HIV-Aged over time is improving, but further investigations are needed to identify potential gaps in care for this growing subgroup.

Acknowledgements

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- Data Source:** BC Ministry of Health [creator] (2014): BC Centre for Disease Control Microbiology and Reference Laboratory, BC Centre for Excellence Drug Treatment Program, Consolidation File, Discharge Abstract Database, Home and Community Care, Medical Services Plan, Mental Health Services, PharmaNet, Vital Statistics. BC Ministry of Health [publisher]. Data Extract. MOH (2014). <http://www2.gov.bc.ca/gov/content/health/conducting-healthresearch-evaluation/data-access-health-data-central>