A Latent Class Analysis of Seroadaptation among Gay and Bisexual Men

Are seroadaptive behaviours effective at reducing the transmission of HIV among GBM?

What is the importance of this study?
- Gay, bisexual, and other men who have sex with men (GBM) are at a disproportionately higher risk of HIV infection.
- Seroadaptive strategies take into consideration the known or assumed HIV status of individuals and their partners to avoid transmission.
- Understanding the patterns of seroadaptive behaviours may be useful for addressing GBM’s sexual health needs.

Seroadaptive strategies are practices often used by GBM in an attempt to reduce the risk of spreading or contracting HIV. Some of these behaviours include asking about HIV status, only having partners with the same HIV status, using condoms on a regular basis, avoiding anal sex, strategic positioning during sex, and—for HIV-negative men—only having sex with HIV-positive partners who are undetectable.

How was this study conducted?
- Participants were asked whether or not they use any of six seroadaptive strategies to prevent HIV transmission, such as consistent condom use, strategic positioning, anal sex avoidance, only having partners with the same HIV status, withdrawal and being aware of an HIV-positive partners' viral load (meaning the detectable level of HIV in the bloodstream).
- Analysis included demographic factors such as age, sexual orientation, education, race/ethnicity, annual income and relationship status.

What are the key study findings?
- Four main categories based on participants' seroadaptive behaviour are: condom users, multiple prevention users, individuals who are conscious of viral load and individuals who chose partners with the same HIV status.
- Analysis indicates gay and bisexual men may be part of several categories, as they attempt to protect themselves through a variety of combinations of seroadaptive behaviours.

FACT BOX
Research suggests that seroadaptive strategies may be effective in reducing the risk of HIV transmission.
The survey results suggest that men with more sexual partners are more likely to use seroadaptation in the hopes of offsetting their risk, and their strategies of choice are based on their needs and those of their partners.

What do these findings mean?
- There are a variety of factors that influence seroadaptation and suggest GBM use diverse risk reduction strategies to prevent HIV transmission.
- When seroadaptive strategies are considered as part of a holistic approach to reducing HIV transmission, biomedical interventions and other prevention campaigns may be more effective than single-strategy campaigns.
- Seroadaptive behaviours rely on an individual’s understanding of their own and their partner’s HIV status. Therefore, combination prevention campaigns (including references to seroadaptive behaviour) must also promote regular and appropriate HIV testing.

What is the BC-CfE Momentum Health Study?
Evidence from British Columbia and elsewhere has demonstrated the expansion of access to antiretroviral HIV treatment (ART) can result in population-level reductions in HIV incidence. This is the concept behind the made-in-BC Treatment as Prevention® strategy, or TasP®, which aims to expand early HIV testing and treatment to improve patients’ health and curb the spread of HIV. Gay, bisexual, and other men who have sex with men (GBM) represent the most affected HIV risk group, both in BC and Canada. The BC-CfE Momentum Health Study is designed to measure changes in HIV risk behaviour, attitudes toward TasP® and the proportion of HIV-positive GBM with unsuppressed viral load over time in the Vancouver region. The study uses respondent-driven sampling (RDS) to obtain a more representative sample reflecting the diversity of the GBM population in Vancouver.
