



AIDS INCIDENCE AND AIDS-RELATED MORTALITY IN BRITISH COLUMBIA, CANADA, BETWEEN 1981 AND 2013: A RETROSPECTIVE STUDY

INTRODUCTION

The time it takes for an HIV infection to progress to AIDS is around 5 to 10 years if no medical intervention is made. Anti-retroviral therapy (ART) is a medical intervention that can greatly decrease this progression and can improve the health and life expectancy of those living with HIV. In this study, we explored the trends in number of AIDS-defining illnesses and the number of AIDS-related deaths of people with HIV from 1981 to 2013 in British Columbia (BC), Canada. AIDS-defining illnesses are conditions that confirm the diagnosis of AIDS.

METHODS

Individuals in this study were at least 19 years of age and were diagnosed with HIV.

We calculated the risk of getting an AIDS-defining illness. The number of AIDS-defining illnesses indicated how bad the HIV epidemic was in each year. AIDS-defining illnesses were measured in person-years. A person-year (p-y) for the province was the number of people in BC who had HIV that year. Measuring by the person-year allows better comparisons over time, when the number of people with HIV changes.

FINDINGS

- Records showed a total of 6205 AIDS-defining illnesses in 3550 people.
- The year with the highest AIDS-defining illnesses per person years in BC was 1994, with 42 per 100 person years.
- In 1997, the first year after universal coverage for HIV care, BC had 7 AIDS-defining illnesses per 100 person years.
- In 2013, there was 1 AIDS-defining illness per 100 person years in BC.
- The most common AIDS-defining illness in 2013 was pneumonia.
- In 1996, 96% of people with HIV died of AIDS-related causes compared to 20% in 2013.

PUBLIC HEALTH IMPLICATIONS

In BC, antiretroviral treatment, HIV care, and laboratory monitoring has been subsidized by the provincial government without any co-payments or deductibles since 1992. This study demonstrated that BC's integrated, comprehensive, and free programmes aimed at testing and treatment has been effective in decreasing AIDS-related morbidity and mortality. This suggests that the control of and eventually an end to AIDS is possible.

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