

HIV Update 2011

MP Briefing



NEW ZEALAND AIDS FOUNDATION
Te Tūāpapa Mate Āraikore o Aotearoa



HIV Snapshot

- New Zealand has had one of the best records in the world for controlling the HIV epidemic. In 2011, there are significant new challenges that allow no room for complacency.
- It is likely that more gay and bisexual men were diagnosed with HIV in 2010 than ever before. This continues an upward trend in HIV diagnoses since the late 1990s that is of extreme concern.
- There has been a sharp decline in HIV diagnoses for heterosexual New Zealanders mainly due to immigration policy changes in 2005. Most heterosexual people living with HIV in New Zealand are immigrants who contracted HIV in their country of origin.
- The HIV epidemic has changed and this has caused a surge in HIV among gay and bisexual men. Effective treatment has led to a larger pool of people living with HIV which increases the number who can pass on the virus.
- Rates of Sexually Transmitted Infections (STIs) are increasing for all communities in New Zealand which in turn increases the risk of HIV, particularly for gay and bisexual men.
- The cost of HIV to New Zealand is high (\$22.5 million per annum*) and will increase as the epidemic grows.
- Only higher rates of condom use will reduce HIV diagnoses in the communities most affected by HIV.

*based on 2010 data provided by PHARMAC

New Zealand's response to HIV

The New Zealand AIDS Foundation (NZAF) considers that New Zealand's response must include:

- An increased focus on safe sexual behaviour, particularly for the population groups most at risk of HIV; gay and bisexual men and people from New Zealand-based African communities.
- The development of national HIV testing protocols to ensure the best possible services for people at risk of, and living with, HIV. A focus on safe sex education should be included in testing services.
- The prioritisation of the Public Health Bill which will, among other things, make HIV notifiable. This is crucial for monitoring and responding to trends in the HIV epidemic in New Zealand.
- Greater recognition of sexual health on the political agenda and the prioritisation of an updated Sexual and Reproductive Health Strategy for New Zealand.
- Increased HIV and sexual health research to ensure that New Zealand can effectively combat the HIV epidemic in the future.





HIV 101

Human Immunodeficiency Virus (HIV) not only negatively impacts on the lives of those living with it, but also the lives of their friends, whānau and communities. HIV is transmitted through blood, semen, rectal mucous, vaginal fluid and breast milk. Once HIV is in the blood stream it begins to attack a person's immune system and works to kill off healthy immune system cells. The deterioration and destruction of immune function can lead to Acquired Immune Deficiency Syndrome (AIDS), the final stage of HIV infection.

Several factors have significantly altered the landscape in which the New Zealand AIDS Foundation (NZAF) works. One of these was the advent of antiretroviral drugs (ARVs). These drugs for the treatment of HIV have been funded in New Zealand since 1996 and the number of people whose HIV infection has progressed to AIDS has decreased dramatically as a result. ARVs are the reason that the number of people living with HIV in New Zealand has increased over time and are also the reason that the number of AIDS-related deaths has dramatically decreased.

While ARVs are an effective treatment, there is still no cure for HIV. It is true that people living with HIV today are healthier and live longer than before. However, resistance to ARVs can develop and there are side effects such as kidney or liver failure for some people.

In 2010, 149 people were diagnosed with HIV in New Zealand and the best estimate of the number of people living with HIV is 1800.¹



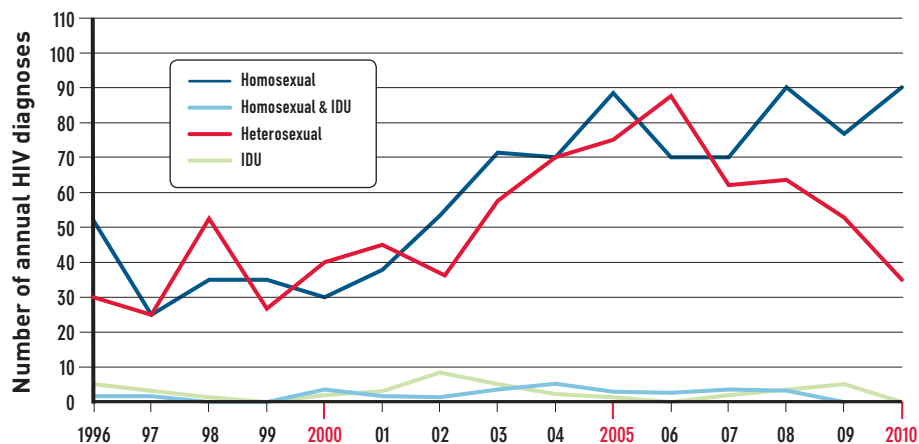
HIV in New Zealand

New Zealand continues to have one of the lowest HIV prevalence rates in the world. A legislative environment which has decriminalised homosexuality, sex work and injecting drug behaviours and adopted strong human rights principles is a key reason for this success.

A low level of injecting drug users (IDU) and the successful operation of an effective needle exchange programme since the late 1980s, has meant that injecting drug use accounts for very few HIV infections in New Zealand. Similarly, decriminalisation and the widespread adoption of condoms have meant that HIV transmission has not been significant in the context of sex work in New Zealand either. These are considered remarkable successes worldwide.

Sexual transmission accounts for the vast majority of new HIV diagnoses in New Zealand. Gay and bisexual men are the group most at risk by a large margin, followed by heterosexuals from African communities living in New Zealand. In 2010, HIV diagnoses for gay and bisexual men continued to steadily increase while heterosexually acquired diagnoses decreased sharply.

Exposure category: Annual HIV diagnoses by Western blot antibody testing, 1996-2010 (Note: Does not distinguish between infections acquired in NZ and overseas)



Source: Data provided by AIDS Epidemiology Group, Department of Preventive and Social Medicine, University of Otago. Graph produced by Research, Analysis and Information Unit, New Zealand AIDS Foundation 2011.

Gay and bisexual men most at risk

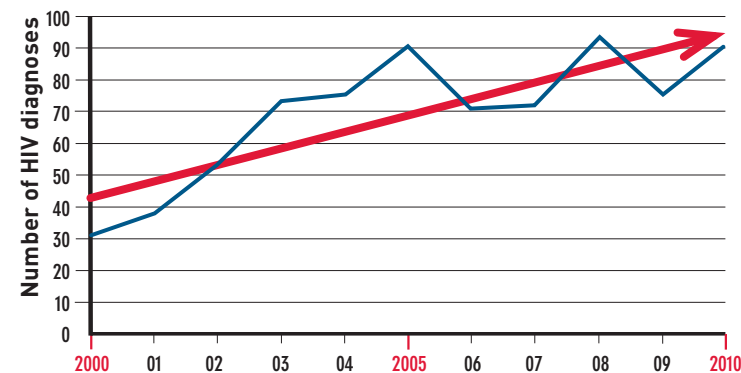
New Zealand had the best record in the world for controlling the HIV epidemic among gay and bisexual men between 1997 and 2000. Since then, new diagnoses have dramatically increased.

Gay and bisexual men are most at risk of HIV in New Zealand because:

1. They have anal sex at much higher rates than any other group
2. Anorectal cells are highly susceptible to HIV infection
3. They are engaging in internet-based sexual networking at unprecedented rates
4. Semen and rectal mucous carry more HIV than vaginal fluid
5. The prevalence of HIV is already far higher among gay and bisexual men than in the rest of the population.

Of the 149 people diagnosed with HIV in New Zealand in 2010, 90 were men who were infected through sex with other men.² This compares with 73 in 2009. At the time of publication, there were a further 15 men for whom the mode of transmission was unknown. It is inevitable that at least a portion of them will also have been infected through sex with other men. This means that gay and bisexual men are likely to have accounted for more of the total HIV infection in 2010 than ever before.

Annual HIV diagnoses in homosexual and bisexual men* by Western blot antibody testing, 2000-2010



* Includes both homosexual/bisexual and homosexual/bisexual/IDU, and does not distinguish between infections acquired in New Zealand, overseas and unknown place of infection.

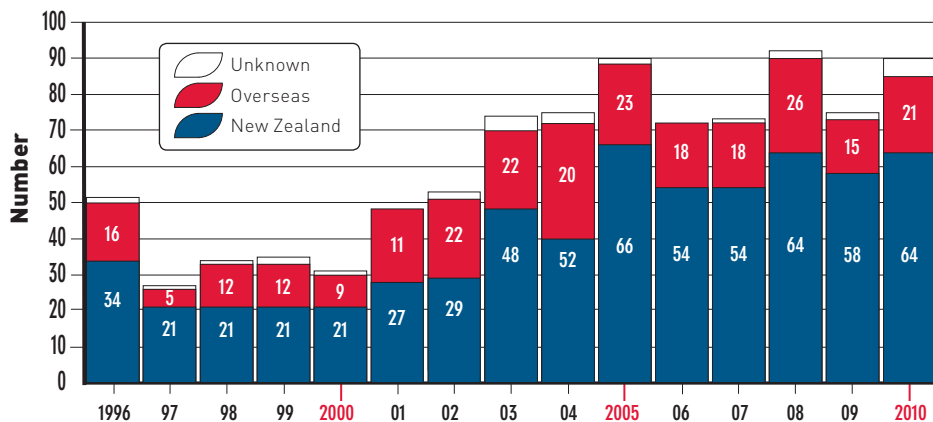
Source: Data provided by AIDS Epidemiology Group, Department of Preventive and Social Medicine, University of Otago. Graph produced by Research, Analysis and Information Unit, New Zealand AIDS Foundation 2011.

Place of infection

Whether people are infected with HIV in New Zealand or overseas is crucial for the planning and delivery of HIV prevention and services. In 2010, 64 (71%) of the 90 gay and bisexual men diagnosed with HIV were reported to have contracted HIV in New Zealand. In contrast, only ten (28%) of the 35 heterosexual people diagnosed with HIV were reported to have been infected here.³

Most heterosexual people diagnosed in New Zealand contracted HIV overseas. Heterosexual diagnoses increased from 1996 to 2006 and then began to decline from 2007. This is due to immigration policy changes in 2005 which introduced mandatory HIV testing for residency applicants and people applying for visas for longer than 12 months. Since 2006, the numbers of new heterosexual HIV diagnoses have also included people diagnosed through the mandatory immigration HIV screening in New Zealand.

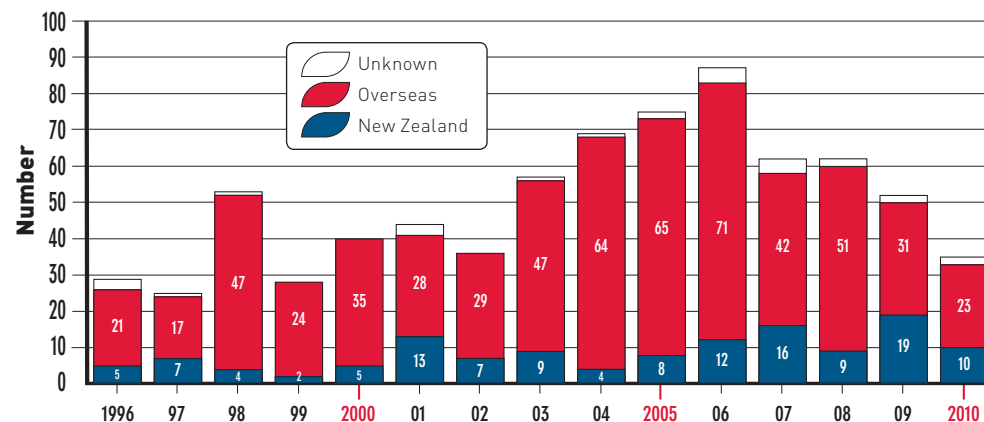
Place of infection: Annual HIV diagnoses in homosexual/bisexual males* by Western blot antibody testing 1996-2010



*Includes both homosexual/bisexual and homosexual/bisexual/IDU

Source: Data provided by AIDS Epidemiology Group, Department of Preventive and Social Medicine, University of Otago. Graph produced by Research, Analysis and Information Unit, New Zealand AIDS Foundation 2011.

Place of infection: Annual heterosexual HIV diagnoses by Western blot antibody testing 1996-2010



Source: Data provided by AIDS Epidemiology Group, Department of Preventive and Social Medicine, University of Otago. Graph produced by Research, Analysis and Information Unit, New Zealand AIDS Foundation 2011.

Over the last ten years, gay and bisexual men have accounted for 77% of the total HIV diagnoses in New Zealand where infection has occurred here.

Ethnicity

Over the past ten years, most HIV diagnoses for gay and bisexual men have been among Europeans and the distribution of ethnicities has been similar to that of adult men in New Zealand as a whole.⁴ Among people heterosexually infected with HIV, the only ethnicity that is significantly over-represented is African.

Of the 90 gay and bisexual men diagnosed with HIV in 2010:

- 64 (71%) European
- 9 (10%) Māori
- 9 (10%) Asian
- 1 (1%) Pacific
- 7 (8%) other or unknown ethnicity

Of the 35 heterosexual people diagnosed with HIV in 2010:

- 12 (34%) African
- 11 (31%) European
- 8 (23%) Asian
- 1 (3%) Māori
- 1 (3%) Pacific
- 2 (6%) other or unknown ethnicity

Age

Because HIV infection can occur months or even years before diagnosis, there is no data that shows age at the time of infection. However, age at the time of diagnosis indicates that HIV prevention initiatives need to be targeted across a wide age range in the context of gay and bisexual men.

The average age of gay and bisexual men diagnosed with HIV in 2010 was 38 years. Of those 2 (2%) were in the 15-19 year age group, 27 (30%) aged 20-29 years, 22 (24%) aged 30-39 years, 24 (27%) aged 40-49 years, and 15 (17%) aged 50 or more.

The average age of the heterosexual people diagnosed with HIV in 2010 was 42 years. Of these, 1 (3%) was in the 15-19 year age group, 4 (11%) were aged 20-29 years, 14 (38%) aged 30-39 years, 9 (24%) aged 40-49 years, and 9 (24%) aged 50 or more.

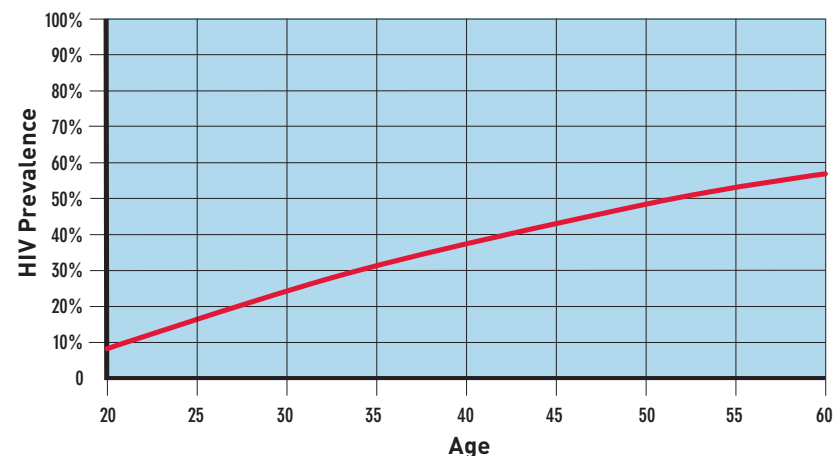
The Future : Increased Condom Use

From 1984 to 2000, the numbers of new HIV diagnoses had trended downward. However, in the years following the introduction of ARV treatment the number of people living with HIV began to rise. The growing pool of people with HIV infection means that if the annual rate of transmission remains stable, we would expect to see a higher number of new infections every year. In order to reduce the annual number of new infections, it is necessary to reduce the annual transmission rate – maintaining it is not enough. This can be achieved by increasing condom use among the most at risk population groups, and by diagnosing new infections early and treating HIV which can reduce infectiousness.

Research has shown that gay and bisexual men, the population group most at risk in New Zealand, are maintaining their current rates of condom use. While this is a considerable achievement given the impact of ARVs and internet dating, these levels must be increased if we are to control the HIV epidemic.

International research has predicted that if the rate of HIV diagnoses continues at current levels in gay and bisexual men, then the overall prevalence of HIV in this population group will continue to climb. In the New Zealand context, even a small increase in the rate of HIV diagnoses can result in dramatic increases in prevalence when stretched over time.

Age-Specific HIV Prevalence



Source: Stall, R. 2009 Running in Place: Implications of HIV Incidence Estimates among Urban Men Who have Sex with Men in the United States and Other Industrialized Countries, AIDS Behaviour, 10 February.

The cost of HIV in New Zealand

In 2010, PHARMAC data showed that 1348 people living with HIV in New Zealand received funded ARV treatment. The average cost of ARVs per person was \$16,698 per annum, making the total cost of ARVs in 2010 approximately \$22.5 million.

If we assume that the numbers of new diagnoses per year continue at current levels (149 per year), the cost of ARVs alone will increase by approximately \$2 million per annum (if 80% of people start ARVs immediately).



\$22.5 million
p/a

HIV Treatment

New Zealanders living with HIV can access a range of publicly funded clinical treatments that are similar to Australia. However, new ARVs are being developed continually. The NZAF monitors developments in HIV treatment and advocates for full funding of treatments that will improve health outcomes for people living with HIV.

Research shows that the long term prognosis for a person living with HIV is improved the earlier ARV treatment begins. The Food and Drug Administration (FDA) approval of a fourth generation rapid test for HIV which detects antigens as well as antibodies (the p24 antigen test) will allow for a much earlier diagnosis, because it is no longer necessary to wait for antibodies to develop. This means that the p24 antigen test will be able to accurately diagnose HIV within days after infection as opposed to the current time delay of four to six weeks. Access to HIV testing is crucial in enabling the early commencement of treatment. Since the introduction of rapid testing in December 2006 there has been a 600 percent increase in HIV testing in NZAF centres.

NZAF testing is carried out in regional centres and by a team of professional counsellors employed in provincial and rural New Zealand. The rapid test used by the NZAF costs \$7 per test and provides a result in twenty minutes. It is also World Health Organisation (WHO) recommended and FDA approved. In contrast, the HIV antibody test used for primary care and many sexual health services costs in excess of \$19 per unit, requires transportation of blood samples and usually requires a wait of several days for the result.

HIV testing saves lives and money. People who know they have HIV are more likely to take precautions against transmitting HIV, and once on ARV treatment their viral load is lowered which also reduces their risk of transmitting HIV. As well as HIV testing, the NZAF provides free and professional syphilis and Hepatitis C rapid testing and full sexual health checks. Pre and post test counselling or psychotherapy is standard practice within a testing appointment. Additionally, the NZAF works with health and allied health professionals to ensure accurate information is disseminated and to address stigma and discrimination.

HIV Prevention

International research has established that condoms and lubricant are the most effective prevention measure against sexual transmission of HIV. In collaboration with the University of Otago, the NZAF has conducted biannual behavioural surveillance of gay and bisexual men since 2002 (the Gay Auckland Periodic Sex Survey, [GAPSS], and Gay Online Sex Survey, [GOSS]). This research has shown that condom use is steady among gay and bisexual men in New Zealand.

While this is reassuring, it is now clear rates of consistent condom use have to be raised to higher levels to counteract the impact of higher numbers of gay and bisexual men living with HIV.

The NZAF has developed a new approach to prevention based on the most up to date evidence available. Health promotion models have been integrated with behaviour change strategies. This approach focuses on four behaviour change goals that will have the greatest impact on the HIV epidemic in New Zealand:

1. Increased rates of condom use for anal sex for gay and bisexual men
2. Increased testing rates for HIV and Sexually Transmitted Infections (STIs) for gay and bisexual men
3. Increased rates of condom use for first anal sex for gay and bisexual men
4. Increased rates of condom use within New Zealand-based African communities.

The range of health outcomes that contribute to these goals include activities and projects that recognise the effective influences of whānau, peers, community and social support for safe sex practices. The NZAF is also making significant use of online technologies to build virtual safe sex cultures and increase rates of condom use.

A critical aspect of the NZAF HIV prevention response is community-based rapid testing. All NZAF HIV and STI screening services include therapeutic interventions from professionally qualified staff to improve safe sex practices.





Policy Issues

Public Health Bill

Data about new HIV diagnoses has been voluntarily collected since 1985. This data on HIV and AIDS uses anonymous coding for the protection of the privacy of people living with HIV. However, AIDS is a notifiable disease and HIV is not. The anonymous data on HIV has been crucial in monitoring the trends and state of the HIV epidemic in New Zealand. The NZAF supports HIV and STIs becoming notifiable under the proposals within the draft Public Health Bill. This will not change any aspect of a person's current experience of the data collection but will ensure that anonymous collection of the crucial data is protected in the future.

Sexual and Reproductive Health Strategy

The NZAF continues to express concern that the Sexual and Reproductive Health Strategy has not progressed since its development in 2001. The 2001 strategy was based on data from the late 1990s. The impact on New Zealanders from the increase in STIs, including HIV, is reason enough to urgently update the strategy, with measurable milestones and appropriate government leadership. In addition to updating the strategy, it is imperative that national STI surveillance is greatly improved.

National HIV testing protocols

The development of national HIV testing protocols to ensure the best possible services for people at risk of, and living with, HIV. A focus on safe sex education should be included in testing services.

HIV and Criminal Prosecutions

In 2005, an important precedent was established that using a condom and lubricant was a reasonable precaution to discharge the duty of care in a criminal nuisance prosecution under Section 145 of the Crimes Act 1961. The NZAF considers this ruling to be an excellent match of the criminal law supporting a public health approach without persecuting people living with HIV.

Issues for the Pacific

The ongoing danger of an HIV epidemic in the South Pacific is a concern. New Zealand has shown that a human rights-based approach is essential to enable an effective HIV prevention response for the groups most at risk of HIV. In 2009, the NZAF received funding from the Pacific Islands HIV and STI Response Fund to develop a programme with its Pacific partners that combines activities and interventions such as the promotion of condoms and lubricant for men who have sex with other men.



The role of the NZAF

The New Zealand AIDS Foundation (NZAF) is Aotearoa New Zealand's national HIV prevention and healthcare organisation. The NZAF is a registered charity that grew out of gay community initiatives in the 1980s. Today, the NZAF brings history, passion, commitment, expertise and diversity to meet the emerging trends of the HIV epidemic and the changing needs of the communities it serves.

The NZAF National Office is in Auckland, and there are regional centres in Christchurch, Wellington and Auckland. The NZAF employs more than 45 staff and has hundreds of regular volunteers. There are also NZAF-trained contracted professionals providing HIV, syphilis and Hepatitis C rapid testing and counselling in many other areas in Aotearoa New Zealand.

Mission

To prevent the transmission of HIV and provide support for people living with HIV and their whānau and families.

Koromakinga

Ki te ārai i te tuku o te HIV me te tautoko i ngā tāngata e mau ana i te HIV me o ratou whānau.

^{1,2,3} AIDS Epidemiology Group. 2011. *AIDS – New Zealand – Issue 67 – February 2011*. Department of Preventive and Social Medicine, University of Otago Medical School: Dunedin.

⁴ AIDS Epidemiology Group. 2009. *AIDS – New Zealand – Issue 63 – March 2009*. Department of Preventive and Social Medicine, University of Otago Medical School: Dunedin.

www.nzaf.org.nz

New Zealand AIDS Foundation National Office

p 09 303 3124
e contact@nzaf.org.nz
31 Hargreaves Street, St Mary's Bay
Auckland, 1011

NZAF Burnett Centre

p 09 309 5560
e contact.burnett@nzaf.org.nz
35 Hargreaves Street, St Mary's Bay
Auckland, 1011

NZAF Āwhina Centre

p 04 381 6640
e contact.awhina@nzaf.org.nz
Level 1, 187 Willis Street
Wellington, 6011

NZAF South / Te Toka

p 03 379 1953
e contact.tetoka@nzaf.org.nz
54a Winton Street
Saint Albans
Christchurch, 8014

FREEPHONE 0800 80 2437

