

# AIDS - New Zealand

## INTRODUCTION

This thirteenth issue of 'AIDS - New Zealand', provides information about the occurrence of acquired immunodeficiency syndrome (AIDS) in New Zealand to 31 March 1992. These reports are produced quarterly by the AIDS Epidemiology Group, which is jointly funded by the Health Research Council of New Zealand and the Department of Health. We aim to give timely and relevant details about the problem of HIV/AIDS in New Zealand. Not all tables and figures will be updated in every edition.

## AIDS IN NEW ZEALAND

Thirteen people were notified as having AIDS in the first quarter of 1992. All were male. The total number notified since monitoring began was 323 at 31 March 1992. The cumulative incidence of AIDS in New Zealand to this time was 9.8/100,000.

Figure 1 depicts the annual and cumulative notification numbers since 1984.

The numbers relate to the year that we were notified of a person having AIDS. In Figure 2 we show the year and quarter of

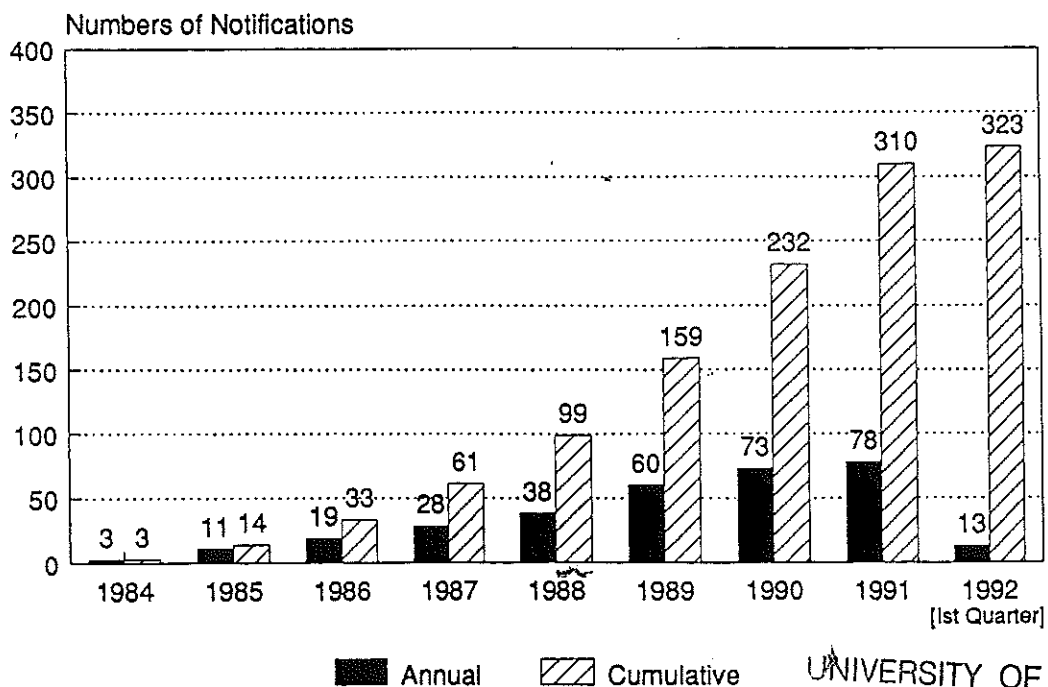


Figure 1 AIDS notifications in New Zealand

UNIVERSITY OF OTAGO  
MEDICAL LIBRARY  
GREAT KING ST.,  
P.O. BOX 913, DUNEDIN  
NEW ZEALAND

diagnosis. The date of diagnosis differs from the notification date because sometimes there is a delay in reporting to us.

Over the last two years the rate of increase in the number of people diagnosed with AIDS in New Zealand appears to have slowed. In 1991 the number was 60 (although this may increase with delayed notifications). This is towards the lower bound of the prediction for 1991 (55 to 145) which we made at the end of 1990.

A similar levelling off has been observed in other countries with a Pattern 1 epidemic. Various factors could account for this in New Zealand: (1) saturation of the groups with the highest risk behaviour; (2) movement of the epidemic into groups with less risky behaviour where the infection spreads less rapidly; (3) changes in behaviour that have resulted in a reduction of the spread of the HIV; (4) introduction of treatments which delay the progression from HIV infection to AIDS, leading to a temporary delay in the progression to AIDS; and (5) an increase in under-reporting or under-diagnosis.

All of these factors need to be considered.

In the USA an analysis of the dates of AIDS diagnosis using estimates of the distribution of the time between HIV infection and the development of AIDS, suggests that the rate of infection with HIV due to homosexual transmission peaked in early 1984, and that due to sharing of injecting drug equipment in 1985. No drop in heterosexual transmission rates was found to mid-1988, the end of the period of estimation. There is evidence that in the USA changes in behaviour have resulted in a reduction of spread of HIV among homosexual men.

Heightened awareness of HIV/AIDS among gay groups in New Zealand and promotion of safer sex practices started in 1983. It is therefore plausible that infection rates among homosexuals in this country could be following a similar pattern to that in the USA, and we could now be seeing a true plateau in the number of homosexual men newly diagnosed with AIDS, due to behaviour changes starting in the mid-1980s within the New Zealand gay community.

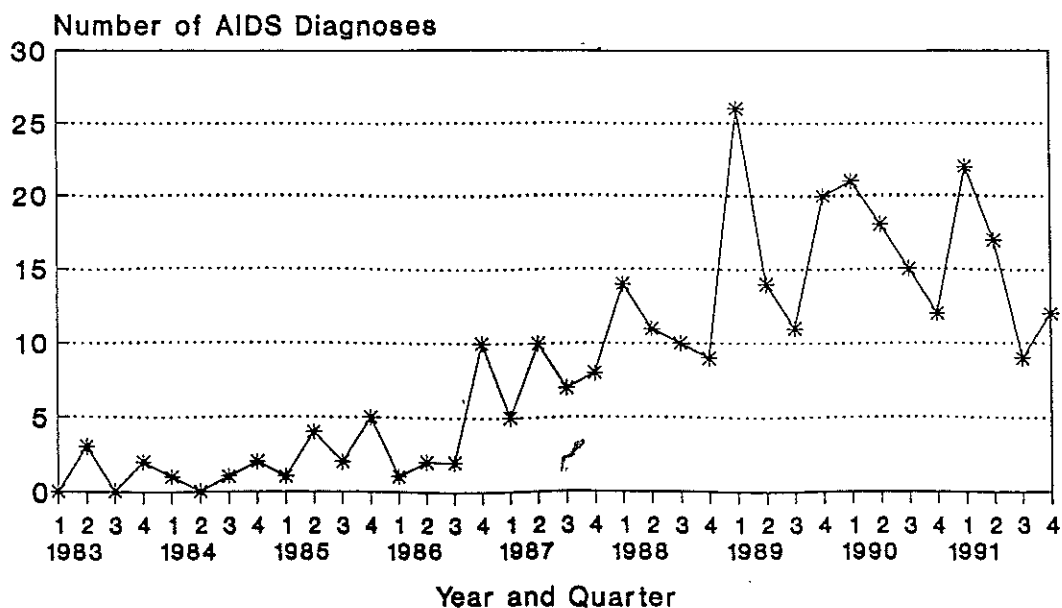


Figure 2 Numbers of diagnoses of AIDS by year and quarter

**Table 1 Category of risk behaviour by date of notification of people with AIDS, and those identified as HIV antibody positive**

	<u>AIDS</u>				<u>HIV antibody positive</u>			
	12 Months to 31.3.92		Total 31.3.92		12 Months to 31.3.92		Total 31.3.92	
	No.	%	No.	%	No.	%	No.	%
Homo/bisexual	58	85.3	275	85.1	80	72.7	425	57.3
Homosexual & IDU* IDU*	3	3.8	7	2.2	0	0	7	0.9
Male	1	1.5	5	1.5	0	0	13	1.8
Female	1	1.5	2	0.6	2	1.8	4	0.5
Haemophiliac	0	0	4	1.2	0	0	31	4.2
Transfusion Related								
Male	0	0	1	0.3	0	0	2	0.3
Female	0	0	1	0.3	0	0	5	0.6
Unknown	0	0	0	0	0	0	5	0.6
Heterosexual								
Male	2	3.0	10	3.1	1	0.9	8	1.1
Female	2	3.0	6	1.9	6	5.4	16	2.2
Perinatal								
Male	0	0	0	0	1	0.9	1	0.1
Female	0	0	1	0.3	0	0	1	0.1
Unknown								
Male	1	1.5	11	3.5	17	15.4	205	27.7
Female	0	0	0	0	3	2.7	10	1.3
Unknown	0	0	0	0	0	0	8	1.1
<b>TOTAL</b>	<b>68</b>	<b>100.0</b>	<b>323</b>	<b>100.0</b>	<b>110</b>	<b>100.0</b>	<b>741</b>	<b>100.0</b>

\*IDU - Injecting drug user

However as HIV is prevalent in this group, it is crucial that any behaviour changes are maintained.

It important to realise that the epidemic of HIV could be progressing in groups who are not presently considered to be at high risk. The fact that the infection rate may have dropped in one group does not necessarily mean that it will drop in others.

#### HIV POSITIVE TESTS

We have recently had the opportunity to review the reports of the numbers of people found to be HIV antibody positive, made by the two laboratories who perform confirmatory testing.

The review revealed a few instances where repeat testing or reporting had not been recognised. Thus we have adjusted downwards the number of people who have been found to be infected with HIV in New Zealand to the end of 1991.

The revised total as of 31 March 1992 was 741. 110 reports were made over the previous 12

months. Of these 99 (90%) were male and 11 (10%) were female.

Care must be taken in interpreting the HIV antibody data, as it is certain that not everyone at risk will have been tested.

#### RISK BEHAVIOUR CATEGORIES

The risk behaviours most likely to have resulted in HIV transmission in people notified as having AIDS, and found to be infected by HIV during the 12 months to 31 March 1992 are shown in Table 1.

The information on HIV positive results is provided to laboratories performing the confirmatory testing, and the high number of people where the risk behaviour is 'unknown' reflects the lack of such information provided with the test request.

In Table 1 we also show the gender breakdown, where appropriate, of people with AIDS, and those found to be infected with HIV. Haemophilia only affects males and so the gender of those in this group is not indicated.

## OUTCOME

The outcome of the 323 people notified as having AIDS by 31 March 1992, as known to us at the time of publication, is shown in Table 2.

**Table 2 Outcome of people with AIDS**

Alive	79
Known to have died	232
Lost to follow up	3
Overseas	9
Total	323

## SURVEILLANCE DEFINITION OF AIDS

For surveillance purposes people are considered to suffer from AIDS if they have certain clinical conditions in the presence of infection with HIV.

The United States Centers for Disease Control, whose definition is currently used internationally, planned to revise their case definition from 1 April 1992 to include all those HIV-infected persons with a CD4 lymphocyte count of less than 200 per  $\mu\text{l}$ , as well as those who meet the current

criteria. It appears unlikely, however, that the revised definition will be used by European countries or Australia. Reasons for this are: (1) that as many HIV-infected people are not tested, recognition of people meeting the criteria would be more likely to be incomplete; (2) the assessment of CD4 lymphocyte counts is not well standardised; and (3) there is concern that there may be adverse psychological and social effects of labelling asymptomatic HIV-infected persons as suffering from AIDS.

The Americans are yet to make a final decision about their proposed revised definition.

## REGIONAL DISTRIBUTION IN NEW ZEALAND

In Table 3 are shown the numbers, and rates per 100,000 population, of people notified with AIDS for six geographic regions in New Zealand.

The rates are derived using the area health board populations for 1989.

AIDS continues to be notified more frequently from the Auckland and Wellington regions.

**Table 3 Regional distribution of number and notification rate (per 100,000 total population) of people notified with AIDS to 31.3.92**

REGION	12 Months to 31.3.92	Total to 31.3.92	Cumulative Notification Rate per 100,000
Northern NI (excl Auckland)*	14	31	4.5
Auckland	32	180	19.8
Southern NI (excl Wellington)+	6	22	4.7
Wellington	13	66	17.9
Canterbury	1	17	3.9
Other South Island	2	7	1.6
Total	68	323	9.8

\* Northland, Waikato, Bay of Plenty and Tairāwhiti Area Health Boards  
+ Taranaki, Manawatu/Wanganui and Hawkes Bay Area Health Boards

For further information about the occurrence of AIDS in New Zealand, contact Dr Nigel Dickson, AIDS Epidemiology Group, Department of Preventive and Social Medicine, University of Otago Medical School, PO Box 913, Dunedin, New Zealand  
Phone: (03) 479 7211, or FAX: (03) 479 0529