2001 3302.0

Australian Bureau of Statistics

DEATHS

AUSTRALIA

EMBARGO: 11:30AM (CANBERRA TIME) TUES 10 DEC 2002

CONTENTS

■ For further information about these and related statistics, contact the National Information and Referral Service on 1300 135 070, or Jacqui Cristiano on Canberra 02 6252 5117.

NOTES

ABOUT THIS ISSUE

This publication brings together statistics and indicators for deaths in Australia.

CHANGES IN THIS ISSUE

Data for 1997–2001 cause of death is coded to ICD-10 (see Explanatory Notes 16–21).

ROUNDING

In commentary based on the statistics in this publication, it is recommended that the relevant statistics be rounded. All data are affected by errors in reporting and processing. Death registration data are also affected by delays in registration. With the exception of tables 6.20 and 6.21, small values have been randomised to protect confidentiality. No reliance should be placed on statistics with small values.

DATA IN THIS PUBLICATION

As there is undercoverage of Indigenous deaths to some extent in all states and territories, the measures of mortality presented here are likely to be conservative estimates. Fluctuations in the level of Indigenous mortality over time partly reflect changing levels of coverage of Indigenous deaths. Given the volatility in measures of Indigenous mortality caution should be exercised in assessing trends in Indigenous mortality over time.

SYMBOLS AND OTHER USAGES

ABS	Australian Bureau of Statistics
AIHW	Australian Institute of Health and Welfare
ASCCSS	Australian Standard Classification of Countries for Social Statistics
ASDR	Age-specific death rate
CDR	Crude death rate
ERP	Estimated resident population
HIC	Health Insurance Commission
HIV/AIDS	Human immuno-deficiency virus/acquired immuno-deficiency virus
ICD-9	International Classification of Diseases, Version 9
ICD-10	International Classification of Diseases, Version 10
IHD	Ischaemic heart diseases
IMR	Infant mortality rate
ISDR	Indirect standardised death rate
n.a.	not available
n.p.	not available for publication but included in totals where applicable
PBR	Population Reference Bureau
SD	Statistical Division
SDR	Standardised death rate
SEIFA	Socioeconomic indexes for areas
SIDS	Sudden Infant Death Syndrome
SLA	Statistical Local Area
SMR	Standardised mortality ratio
SSD	Statistical Subdivision
. .	not applicable
—	nil, or rounded to zero (including null cells) (see Explanatory Notes, paragraph 3)

Dennis Trewin
Australian Statistician

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CHAPTER 1 MAIN FEATURES

MORTALITY CONTINUES TO DECLINE

- The Australian death rate continued to decline in 2001. The age-standardised death rate is down by 5% since 2000 and 36% since 1981. There were 128,540 deaths registered in Australia in 2001, approximately 250 more than the number registered in 2000 (128,290).
- Over the past 20 years there has been a sustained decline in death rate for all states and territories. The highest age-standardised death rate in 2001 was in the Northern Territory and the lowest was in the Australian Capital Territory.

LIFE EXPECTANCY CONTINUES TO INCREASE

- Life expectancy at birth continued to increase, reflecting the general decrease in death rates. A boy born in 1999–2001 could expect to live 77.0 years, while a girl could expect to live 82.4 years. Since 1981 life expectancy at birth has increased by 6 years for males and 4 years for females.
- Internationally, Australia's life expectancy at birth for males ranks behind Japan (78 years), beside Switzerland, Hong Kong, and Sweden (each 77 years), and is above that of New Zealand (76 years), the United Kingdom (75 years) and the United States of America (74 years).
- Australia's life expectancy at birth for females is similar to Hong Kong and Sweden (each 82 years). It falls behind Japan (85 years), France, Spain and Switzerland (each 83 years), and is above Canada, Greece and New Zealand (each 81 years), the United Kingdom and the United States of America (each 80 years).
- Male life expectancy at birth was highest in the Australian Capital Territory (78 years), while female life expectancy at birth was highest in the Australian Capital Territory and Western Australia (both 83 years). The lowest life expectancy was in the Northern Territory where a boy born in 2001 could expect to live an average of 71 years, and a girl, 76 years.
- In 1999–2001 life expectancy at birth for males and females varied across the regions of Australia by up to 11 years. Male life expectancy at birth was highest in Canberra (79 years) followed by Outer Adelaide, Melbourne and Perth (each 78 years), while female life expectancy at birth was highest at 83 years in Moreton (Queensland), Perth, Canberra, Melbourne and South-West (Western Australia).
- Male life expectancy at birth was lowest in the balance of the Northern Territory (68 years) followed by the Kimberley (70 years), and North-West Queensland (71 years). Female life expectancy was lowest in the balance of the Northern Territory (73 years), the Kimberley (78 years), and North-West Queensland (78 years).

VARIATIONS IN MORTALITY

- The 2001 infant mortality rate was 5.3 deaths per 1,000 live births, an increase of 2% from 2000, but a decrease of 47% since 1981. In 2001, over one-third (39%) of all infant deaths occurred within one day of birth.
- Overall, the age-standardised death rate for males was 58% higher than the female rate. The greatest difference in age-specific death rates occurred in the 15–19 years age group where the male death rate was over three times higher than the female death rate.

VARIATIONS IN MORTALITY *continued*

- Males and females who had never married had age-standardised death rates of almost twice those of their married counterparts.

INDIGENOUS MORTALITY

- There were 2,100 deaths registered in 2001 where the deceased person was identified as being of Aboriginal, Torres Strait Islander or both origins (Indigenous). Overall the Indigenous population had age-standardised death rates at least twice as high as the total population.
- The 2001 infant mortality rate for Indigenous Australians (10.6 deaths per 1,000 live births) was over twice the infant mortality rate for all Australians (5.3).
- The median age at death for Indigenous people in 2001 was 54 years, around 24 years less than the median age for all deaths (79 years).
- Indigenous life expectancy at birth was about 20 years less than for the total population, 56 years for Indigenous males compared to 77 years for all Australian males and 63 years for Indigenous females compared to 82 years for all Australian females. Experimental life tables of Indigenous people is presented in Appendix 1.
- The life expectancy of Indigenous people in both New Zealand and the United States of America is higher than for Indigenous Australians, and the difference to the total population is not as great as in Australia. In 1995–1997 the New Zealand Maori population had a life expectancy at birth of 67 years for males and 72 years for females, 7 years lower than for the total male population and 8 years lower than the total female population. In 1996–1998 the American Indian and Alaska Native population of the United States of America had a life expectancy at birth of 67 years for males and 74 years for females, 6 years lower than for the total male population and 5 years lower than the total female population.

CAUSES OF DEATH

- During the last decade, IHD and cancer remained the two leading causes of death. In recent years cancer has overtaken IHD as the leading cause of death for both men and women. This has been the result of the long-term downward trend in the standardised death rate for IHD, declining by 59% for males and 53% for females from 1981 to 2001. Over the same period the standardised death rate for malignant neoplasms declined by just 13% for males and 6% for females.
- In 2001, malignant neoplasms was the leading cause of death, accounting for 36,800 deaths or 29% of all deaths. IHD was the second leading cause of death, contributing 26,200 deaths or 20% of all deaths. Cerebrovascular diseases (stroke) contributed 9% of all deaths while chronic lower respiratory diseases contributed 5% of all deaths.

CHAPTER 2 SUMMARY OF FINDINGS

DECLINING DEATH RATES

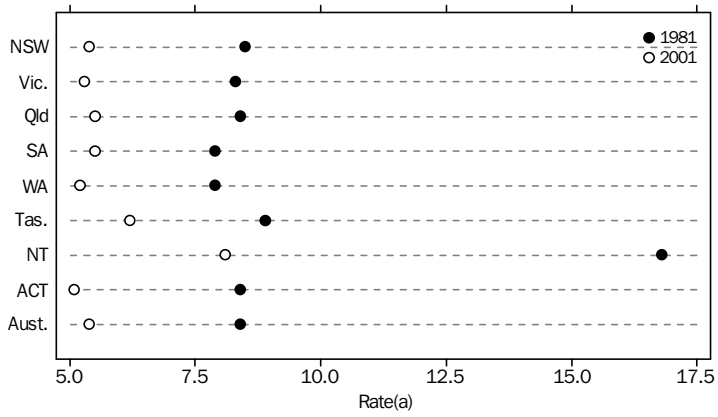
In 2001, 128,540 deaths (66,830 males and 61,710 females) were registered in Australia, approximately 250 more than were registered in 2000 (128,290). Since 1981 the number of deaths has increased by an average of 0.9% per year. The steady increase in the number of deaths over time reflects the increasing size of the population and, in particular, the increasing number of older people. With the continued ageing of the population the number of deaths will continue to rise, with deaths projected to outnumber births sometime in the 2030s (*Population Projections, Australia 1999 to 2101*, cat. no. 3222.0).

Despite the ageing of the population over the last 20 years, deaths rates have continued to decline. The crude death rate (CDR) fell from 7.3 deaths per 1,000 population in 1981 to 6.6 deaths per 1,000 in 2001. The fall in CDR, against the background of an older population, indicates the considerable decline in age-specific death rates over the period. The standardised death rate (SDR) (which eliminates the effect of the changing age structure of the population) was 5.4 deaths per 1,000 population in 2001, down by 5% since 2000 (5.7) and down by 36% since 1981 (8.4).

States and territories

The SDR for the Northern Territory remained much higher than other state and territory SDRs, with 8.1 deaths per 1,000 standard population in 2001; a decrease of 9% on the 2000 SDR (8.9) and a further decrease of 52% on the 1981 SDR (16.8). For the remaining states and territories there has been sustained decline in SDRs for the past 20 years, with SDRs decreasing by an average 34%. In 2001, Tasmania followed the Northern Territory with the second highest SDR (6.2) while the lowest SDR was recorded in the Australian Capital Territory at 5.1 deaths per 1,000 standard population. This was followed by Western Australia (5.2), Victoria (5.3) and New South Wales (5.4).

2.1 STATE AND TERRITORY DEATH RATES(a)



(a) Standardised death rates per 1,000 population. Standardised to the 1991 Australian total population.

YEAR OF OCCURRENCE

This publication uses death registration data, except where otherwise stated. An alternative method of publishing death statistics is to present the data based on year of occurrence, that is the year that the death occurred, irrespective of the year that it was registered. A new feature of the publication this year is a table which presents deaths by year of occurrence. Table 6.9 provides summary data on a year of occurrence basis for the preceding year.

INTERNATIONAL COMPARISON

Life expectancy

According to the 2002 Population Reference Bureau (PRB) world population data sheet, global life expectancy at birth in 2000–2001 was estimated to be 67 years (males and females combined), a gain of more than 20 years of life from 1950 when a newborn infant could expect to live for 45 years. Australia's 1999–2001 life expectancy of 77.0 years for males and 82.4 years for females is among the highest in the world.

In the data sheet Australia's male life expectancy at birth ranks below Japan (78 years), similar to Switzerland, Hong Kong and Sweden (each 77 years), and was above that for Canada, France, Greece, New Zealand and Spain (each 76 years), the United Kingdom and the United States of America (75 and 74 years respectively). Australia's life expectancy at birth for females was similar to Hong Kong and Sweden (each 82 years). It was behind Japan (85 years), France, Spain and Switzerland (each 83 years), and was above Canada, Greece and New Zealand (each 81 years), the United Kingdom and the United States of America (each 80 years).

The world's most populous country, China, is estimated to have a life expectancy of 69 years for males and 73 years for females, while a life expectancy of 66 years for males and 70 years for females is estimated for Indonesia (PRB, 2002).

Infant mortality rate

The 2002 PRB world population data sheet estimated the global infant mortality rate (IMR) to be 54 infant deaths per 1,000 live births. Australia's 2001 IMR of 5.3 infant deaths per 1,000 live births was among the lowest in the world, similar to Canada, Israel and New Zealand (each 5.3). PRB, 2002, showed Singapore to have one of the lowest IMRs, at 2.2 infant deaths per 1,000 live births, followed by Iceland (3.0), Hong Kong (3.1), Japan (3.2) and Sweden (3.4).

In contrast, the world's highest IMRs were projected for regions in the Sub-Saharan Africa where the estimated IMR for Middle Africa and Eastern Africa were 100 and 97 infant deaths per 1,000 live births respectively. Most infant deaths in Africa are from infectious and parasitic diseases (including Human immuno-deficiency virus/acquired immuno-deficiency virus) (HIV/AIDs) and from nutritional deficiencies.

AGE AT DEATH

The median age at death in 2001 was 76 years for males and 82 years for females, an increase of 5.8 years and 5 years respectively on the median age at death in 1981. This reflects the ageing of the population, as well as an increase in the survival of males and females over the period.

The median age at death in the Northern Territory was 20 years less than the median age nationally. This is the result of a young population, in combination with the high

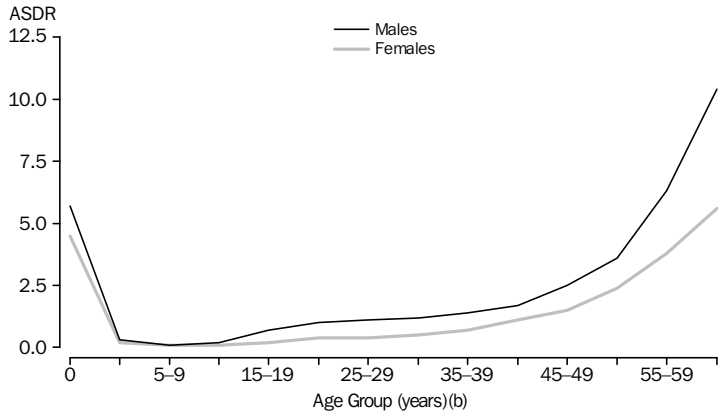
AGE AT DEATH *continued*

mortality of the Indigenous population, which comprises approximately 28% of the Territory's total population. South Australia had the highest median ages at death with 77 years for males and 82 years for females, reflecting the older population of South Australia compared to other states and territories.

From the relatively high rates of death in infancy, death rates sharply decline through childhood. The lowest age-specific death rates (ASDRs) were experienced by males aged 5–9 years and females aged 5–9 and 10–14 years, with an ASDR of 0.1 for male deaths and 0.1 female deaths respectively per 1,000 population. ASDR begin to increase after age 15 years, for both males and females.

Males aged 15–19 years had an ASDR of 0.7 deaths per 1,000 male population, while the female ASDR at age 15–19 years was 0.2 deaths per 1,000 females. The male ASDR further increased at age 20–24 years, and then leveled off somewhat until after age 40 years where it increased steadily throughout the older age groups. The ASDR for females aged 15–19, 20–24 and 25–29 years remained relatively constant. Steady increase in the female ASDR was evident after age 30 years, and continued throughout the remaining age groups.

2.2 MALE AND FEMALE AGE-SPECIFIC DEATH RATES(a), Infants to aged 64 years



(a) Per 1,000 males and females respectively.

(b) Age groups 0, 1–4, and then five year age groups to 60–64 years.

Between 1981 and 2001, the risk of dying has declined for people of all age groups except males aged 30–34 years, which, at 1.2 deaths per 1,000 male population, is the same as in 1981, having peaked at 1.5 in 1998. The largest declines in male ASDRs occurred in the 5–9 years age group (66%), for infants and those aged 1–4 years (each 50%). Female ASDRs also declined most substantially (60%) in the 1–4 years age group.

SEX

Male deaths (66,830) outnumbered female deaths (61,710) registered in 2001, giving a sex ratio of 108 male deaths for every 100 female deaths. This ratio has decreased from 126 male deaths per 100 female deaths in 1981. Since 1981, male deaths have increased by 10% while female deaths have increased by 28%, due primarily to the greater improvement in male mortality, relative to female mortality, at the older ages.

Although male mortality levels remain higher than females, in the last 20 years or so the gap has narrowed. In 1981 males had an SDR of 11.1 deaths per 1,000 standard population, 76% higher than the female SDR of 6.3 deaths per 1,000 standard population. By 2001, the male SDR was 6.8 deaths per 1,000 standard population, 58% higher than the female rate of 4.3 deaths per 1,000 standard population. Over the same period the difference in male and female life expectancy at birth has narrowed, from 7 years in 1981 (life expectancy of 71 years for males and 78 years for females) to 5 years in 2001 (life expectancy of 77 years for males and 82 years for females).

Overall in 2001, the male SDR of 6.8 deaths per 1,000 standard population was 58% higher than the female SDR (4.3 deaths per 1,000 standard population). The greatest difference in age-specific death rates occurred in the 15–19 years age group where the male death rate was over three times higher than the female death rate.

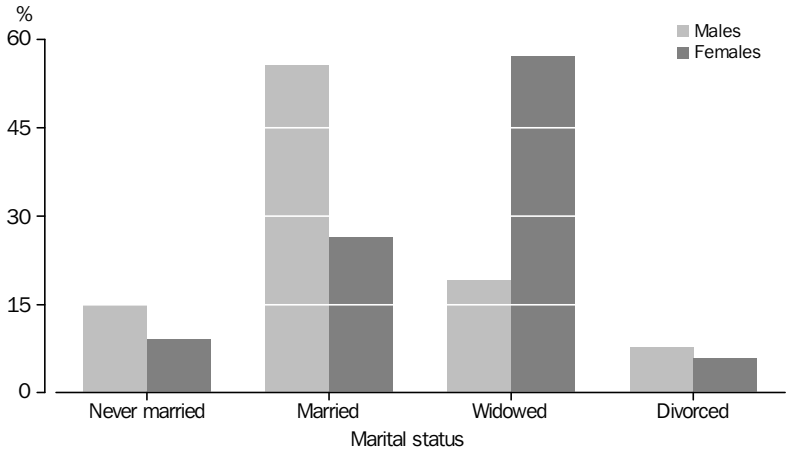
Male death rates were higher than female death rates across all the states and territories in 2001. The difference was greatest in New South Wales where the male SDR (6.8 deaths per 1,000 standard population) was 62% higher than the female SDR (4.2 deaths per 1,000 standard population). The Northern Territory recorded the highest death rates for both males and females. For males in the Northern Territory the SDR was 40% higher (9.5 deaths per 1,000 standard population) than the Australian total for males (6.8 deaths per 1,000 standard population). For Northern Territory females the SDR (6.5 deaths per 1,000 standard population) was 51% higher than the Australian total for females (4.3 deaths per 1,000 standard population). It should also be noted that the Northern Territory had a sex ratio at death of 170.8, the highest across all states and territories.

MARITAL STATUS

Of all men whose deaths were registered during 2001, 56% were in a registered marriage at the time of death, while 19% were widowed and 15% were never married. In contrast, of all women whose deaths were registered during 2001, 57% were widows at the time of death, with a further 27% being in a registered marriage and 9% never married. This difference is a consequence of the greater longevity of women.

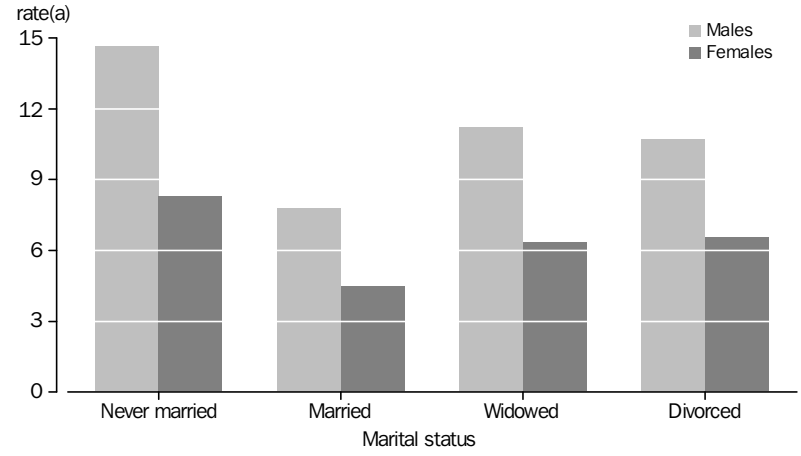
MARITAL STATUS *continued*

2.3 DEATHS BY REGISTERED MARITAL STATUS, 2001



As estimated resident population (ERP) for 2001 by marital status are not yet available, age-specific death rates and hence standardised death rates by marital status are also not yet available. However, data for 2000 showed that males and females who had never married had death rates almost twice those of their married counterparts. Both men and women who were widowed had slightly lower death rates to those who were divorced.

2.4 DEATH RATES(a) BY REGISTERED MARITAL STATUS, 2000



(a) Standardised deaths rates for persons aged 15 years and over per 1,000 population. Standardised to the 1991 Australian total population.

The fact that married people have lower mortality than unmarried people has been observed in many studies over time and in different countries (Lillard & Panis 1996). The reasons for this have been debated for over 100 years (Farr 1858). Two main explanations have been put forward. The first suggests that marriage improves a person's health status, thus reducing the risk of death. Married people are less likely to participate in risky behaviour and more likely to nurture each other's health through promoting good diet and physical care. The second states that differentials are based on selection of healthier individuals into marriage. Particularly in a country like Australia, where registered marriage is far from universal, selectivity is likely to be an important factor.

COUNTRY OF BIRTH

Australia's population born overseas accounted for 29% of deaths registered in 2001, despite making up only 24% of the resident population. The main reason for this is that the overseas-born population has an older age structure than the Australian-born population. The median age of the overseas-born population in 2000 was 45 years compared to 31 years for the Australian-born population. As ERP for 2001 by country of birth are not yet available, crude death rates and indirect standardised death rates are also not yet available.

Migrants generally have lower death rates than the Australian-born population, after adjusting for the older age structure of the overseas-born population. This is true for nearly all migrant groups. Residents born in the Philippines had the lowest indirect standardised death rate (ISDR) in 2000, just over half (51%) that of the total population. Residents born in the United States of America had the highest overall ISDR (11% more) and the highest ISDR for IHD, chronic lower respiratory diseases and accidents.

UNDERLYING CAUSE OF DEATH

Using broad ICD-10 chapter headings, Chapter IX, Diseases of the circulatory system (I00–I99), which includes the major subcategory of all heart diseases (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52) and the minor subcategories of IHD and Cerebrovascular diseases (stroke), accounted for 38% of all deaths in Australia in 2001. Chapter II, Neoplasms (C00–D48), which includes the subcategory of malignant neoplasms, attributed 29% of all deaths.

In 2001, as in previous years, malignant neoplasms (cancer) (C00–C97) dominated the subcategories of underlying cause of death, with 36,800 deaths accounting for 29% of all deaths. This was followed closely by all heart diseases (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52) with 33,600 deaths or 26% of all deaths. IHD accounted for 78% of all deaths within the all heart diseases subcategory, or approximately 26,200 deaths.

During the last decade, IHD and cancer remained the two leading causes of death. In recent years cancer has overtaken IHD as the leading cause of death for both men and women. This has been the result of the long-term downward trend in the standardised death rate for IHD, declining by 59% for males and 53% for females from 1981 to 2001. Over the same period the standardised death rate for malignant neoplasms declined by just 13% for males and 6% for females.

UNDERLYING CAUSE OF DEATH *continued*

2.5 UNDERLYING CAUSE OF DEATH, 2001

Cause of death and ICD code	*Males* no.	*Females* no.	*Males* rate(a)	*Females* rate(a)
All causes	**66 835**	**61 709**	**680.8**	**430.0**
Chapter II Neoplasms (C00–D48)	21 126	16 371	212.2	129.7
Malignant neoplasms (C00–C97)	20 753	15 997	208.3	127.1
Digestive organs (C15–C26)	5 918	4 462	59.1	34.1
Trachea, bronchus and lung (C33, C34)	4 642	2 396	46.5	19.9
Breast (C50)	. .	2 585	. .	21.3
Prostate (C61)	2 711	. .	27.8	. .
Chapter IV Endocrine, nutritional and metabolic diseases (E00–E90)	2 223	2 091	22.5	14.8
Diabetes mellitus (E10–E14)	1 639	1 439	16.5	10.2
Chapter IX Diseases of the circulatory system (I00–I99)	23 602	25 724	240.9	161.2
All heart disease (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52)	17 027	16 620	173.2	104.8
Ischaemic heart diseases (I20–I25)	13 906	12 328	141.2	78.0
Pulmonary heart disease and diseases of pulmonary circulation and other forms of heart disease (I26–I52)	2 824	3 747	29.0	23.3
Cerebrovascular diseases (I60–I69)	4 852	7 294	50.0	44.8
Chapter X Diseases of the respiratory system (J00–J99)	5 725	4 901	58.8	33.7
Chronic lower respiratory diseases (J40–J47)	3 419	2 497	35.0	18.8
Chapter XX External causes of morbidity and mortality (V01–Y98)	5 446	2 430	56.9	20.6
Accidents (V01–X59)	3 155	1 685	33.2	13.5
Transport accidents (V01–V99)	1 495	509	15.9	5.0
Intentional self-harm (X60–X84)	1 935	519	20.1	5.1

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) Standardised death rate per 100,000 of the population.

For males, malignant neoplasms accounted for 20,800 (31%) of all male deaths in 2001. Of these, cancer of the digestive organs (which includes cancer of the oesophagus, colon, stomach or pancreas) was the major cause of death for males, accounting for 9% of all male deaths, followed by cancer of the trachea, bronchus and lung (7%) and prostate cancer (4%).

For females, malignant neoplasms represented 26% of all female deaths or 16,000 deaths. Cancer of the digestive organs was also the most frequent subcategory of underlying cause of all female deaths (7%), followed by breast cancer and cancer of the trachea, bronchus and lung (both 4%).

IHD was the second leading cause of death, contributing 26,200 deaths, or 20% of all deaths in Australia in 2001. For males, IHD had an SDR of 141.2 deaths per 100,000 population and accounted for 13,900 deaths, which was 21% of all male deaths. For females, IHD had an SDR of 78.0 deaths per 100,000 population and accounted for 12,300 deaths, which was 20% of all female deaths in Australia.

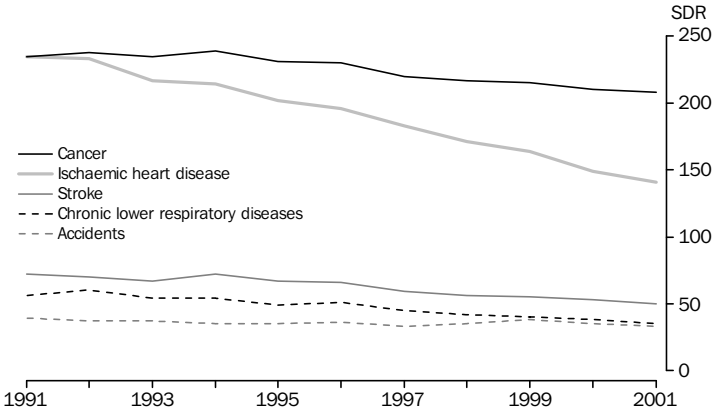
Cerebrovascular disease (stroke) was the third leading cause of death contributing 9% of all deaths. For males the death rate for stroke was 50, compared to 45 for females. Stroke deaths have undergone a decline similar to that of IHD, with the death rate declining by 31% for males and females since 1991.

While the total number of deaths registered in 2001 (128,540) was 8% higher than the number registered in 1991 (119,150), the SDR for all causes of death over the same ten year period had decreased by 23% for males and 20% for females. This decrease is

UNDERLYING CAUSE OF DEATH *continued*

consistent with the continual improvement of male and female life expectancy in Australia.

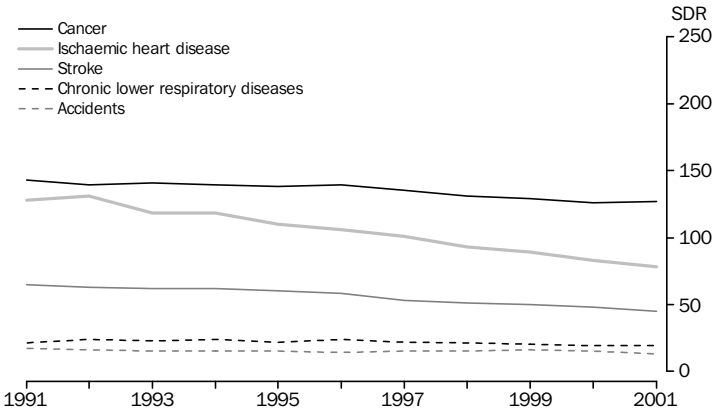
2.6 CAUSES OF DEATH, Standardised death rates(a)(b)—Males



(a) Per 100,000 population. Standardised to the 1991 Australian total population.

(b) 1997–2000 data are coded to ICD-10. Prior to 1997 data are coded to ICD-9. The SDR for chronic respiratory diseases prior to 1997 is the SDR for the group of diseases in ICD-9 under the heading of chronic obstructive pulmonary disease and conditions (including asthma, emphysema, bronchitis) (490–496).

2.7 CAUSES OF DEATH, Standardised death rates (a)(b)—Females



(a) Per 100,000 population. Standardised to the 1991 Australian total population.

(b) 1997–2000 data are coded to ICD-10. Prior to 1997 data are coded to ICD-9. The SDR for chronic respiratory diseases prior to 1997 is the SDR for the group of diseases in ICD-9 under the heading of chronic obstructive pulmonary disease and conditions (including asthma, emphysema, bronchitis) (490–496).

INFANT DEATHS

In 2001, 1,300 infant deaths (deaths of children less than one year of age) were registered in Australia. The number of infant deaths registered in 2001 was 29% lower than the number registered in 1991 (1,800), and 44% lower than in 1981 (2,300). The infant mortality rate (IMR) of 5.3 infant deaths per 1,000 live births in 2001 was a 2% increase on the IMR in 2000 (5.2). Although there was a 2% increase, the 2001 IMR remained 25% lower than the IMR in 1991 (7.1 deaths per 1,000 live births), and 47% lower than in 1981 (10.0 deaths per 1,000 live births), supporting the long-term trend of decline of infant deaths.

For further details about infant and child mortality please see the feature article on Child mortality in Chapter 4.

States and territories

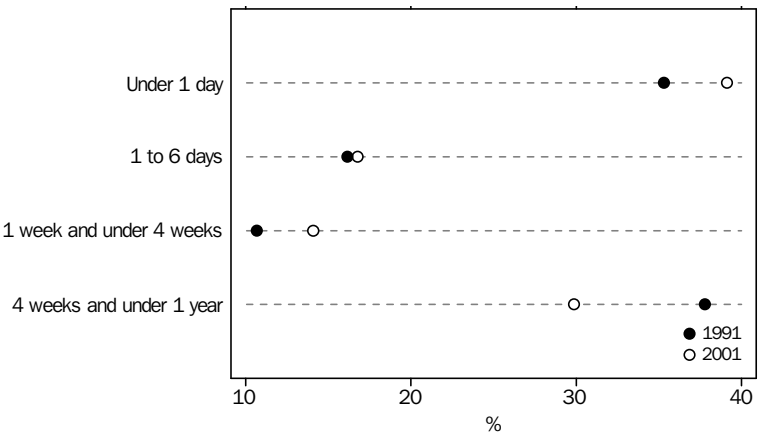
The Australian Capital Territory had the lowest IMR, 3.0 in 2001, followed by South Australia with an IMR of 4.6. The Northern Territory IMR of 10.7 was the highest of the states and territories, with Tasmania and Queensland also registering IMRs above the national level. Compared to 1991, the largest decrease in the IMR (61%, from 7.6 to 3.0) occurred in the Australian Capital Territory, while the smallest decrease occurred in South Australia (declining 16% from 5.5 to 4.6).

Infant age at death

In 2001, 39% of all infant deaths occurred within the first day of birth, with a further 31% of all infant deaths occurring in the remainder of the neonatal period (first four weeks of life). Between 1991 and 2001, declines in infant deaths have not been uniform across the different neonatal periods. Deaths that occurred between one month and one year of age (post neonatal period) experienced the greatest decline over the ten year period (44%), followed by deaths of infants aged one day to six days (early neonatal) (26% decline) and those under one day (21% decline).

A higher proportion of infant deaths occurred within the first day of life in 2001 (39%) compared with 1991 (35%). Conversely, a lower proportion of deaths occurred between one month and one year of age in 2001 (30%) compared with 1991 (38%).

2.8 PROPORTION OF INFANT DEATHS BY AGE AT DEATH



Infant age at death *continued*

Sex

Over the last twenty years male infant deaths have consistently outnumbered female infant deaths. In 2001, male infant deaths (750) outnumbered female infant deaths (560) by 35%. In the last twenty years the male IMR has been consistently higher than the female IMR (by between 18% and 31%), reflecting the greater vulnerability of male infants (Waldron, 1983).

LIFE EXPECTANCY

In 1999–2001 life expectancy at birth was 77.0 years for males and 82.4 years for females, an increase of 0.4 years respectively over the 1998–2000 life expectancies at birth. Male life expectancy at birth was highest in the Australian Capital Territory (78.5 years), while female life expectancy was highest in the Australian Capital Territory (82.9 years) and Western Australia (82.8 years). The lowest life expectancy was in the Northern Territory where a boy born in 2001 could expect to live an average of 70.8 years, and a girl, 76.5 years.

Since 1981, life expectancy at birth has increased by 6 years for males and 4 years for females. Mortality projections have calculated that by the year 2051 life expectancy at birth could be around 83 years for males and 87 years for females. This assumption is based on the average annual increase from 1970–1998 for male and female life expectancy at birth, of 0.30 years and 0.22 years respectively continuing until 2003 and then gradually declining over time. For further information on mortality projections please see *Population Projections, Australia 1999 to 2101* (cat. no. 3222.0).

Regional life expectancy

In 1999–2001 life expectancy at birth for males and females varied across the regions of Australia by up to 11 years. Male life expectancy at birth was highest in Canberra (79 years) followed by Outer Adelaide, Melbourne and Perth (each 78 years), while female life expectancy was highest at 83 years in Moreton (Queensland), Perth, Canberra, Melbourne and South-West (Western Australia). Male life expectancy was lowest in the Balance of the Northern Territory (68 years) followed by the Kimberley (70 years), and North-West Queensland (71 years). Female life expectancy was lowest in the Balance of the Northern Territory (73 years), the Kimberley (78 years), and North-West Queensland (78 years).

Australia's more rural and remote populations tend to have higher mortality rates and consequently lower life expectancy (Australian Institute of Health and Welfare (AIHW), 1998) than populations living in either a capital city or urbanised area. Where there is a higher proportion of Indigenous people living in these rural and remote areas there is an additional impact upon mortality rates and life expectancy (AIHW, 1998).

The Statistical Divisions (SD) that experienced lower life expectancy at birth are primarily located in rural and remote areas. The Kimberley, which incorporates the Statistical Local Area (SLA) of Broome, and the SD of North-West (Queensland), which includes the SLAs of Mount Isa and Cloncurry are examples of SDs with low life expectancy at birth.

Outside the capital cities the more urbanised SDs tended to have higher life expectancies at birth. Examples of these SDs are Moreton (Queensland), which

Regional life expectancy *continued*

incorporates the Gold and Sunshine Coasts Statistical Subdivisions (SSD), Richmond-Tweed SD (New South Wales), which includes the SLAs of Ballina and Lismore, and the SD of Barwon (Victoria), which includes the SSD of the Greater Geelong City Part A and the SLA of Queenscliffe.

CHAPTER 3 DEATHS OF ABORIGINAL AND TORRES STRAIT ISLANDER PEOPLE

INTRODUCTION

There were 2,100 deaths registered in Australia in 2001 where the deceased person was identified as being of Aboriginal, Torres Strait Islander or both origins (Indigenous), a decrease of around 60 deaths (3%) on the number registered in 2000. It is considered likely that most Indigenous deaths are registered but a proportion of these deaths are not registered as 'Indigenous'. Therefore, the 2,100 registered Indigenous deaths is likely to be an underestimate of the true number of such deaths. The estimated coverage of Indigenous death registrations in 2001, based on the 1996 Census-based experimental population projections for 2001, was 55% for Australia as a whole. The estimated coverage for the states and territories ranged from 22% in Tasmania to 85% in the Northern Territory. See Explanatory Notes 10–15 and table 6.34 for further information on the coverage of Indigenous deaths.

A variety of measures of mortality (death rates, median age at death, life expectancy at birth and infant mortality) indicate that the mortality level of Indigenous Australians is substantially higher than for the total Australian population. Death rates, median age at death and infant mortality indicate that in 2001 the mortality experience of Indigenous men and women in the Northern Territory was higher than in other states. International comparisons indicate that the Indigenous Australian infant mortality rate is higher, and life expectancy lower, than for Indigenous populations in New Zealand and the United States of America.

As there is undercoverage of Indigenous deaths to some extent in all states and territories, the measures of mortality presented here are likely to be conservative estimates. In addition to those deaths identified as Indigenous, a number of deaths occur each year where the Indigenous status is not stated on the death registration form, as can be seen in Table 3.1 . There were 5,730 deaths registered in Australia in 2001, representing 4.5% of total deaths, for which the Indigenous status was not stated. There is a likelihood that some Indigenous deaths would be included in this number, contributing to the undercoverage of Indigenous mortality in registered deaths data.

Fluctuations in the level of Indigenous mortality over time partly reflect changing levels of coverage of Indigenous deaths. Given the volatility in measures of Indigenous mortality caution should be exercised in assessing trends in Indigenous mortality over time. The proposed ABS information paper *Experimental Estimates and Projections of Indigenous Australians, 1991 to 2016* (cat. no. 3238.0) will include analysis of these data quality issues and their impact on the interpretation of trends in these data.

INTRODUCTION *continued*

3.1 DEATHS, Indigenous status, States and territories

	Non Indigenous	*Indigenous*	*Not stated*	*Total*
New South Wales	42 598	481	1 473	44 552
Victoria	28 893	93	3 309	32 295
Queensland	22 003	565	288	22 856
South Australia	11 444	125	322	11 891
Western Australia	10 265	336	178	10 779
Tasmania	3 693	32	151	3 876
Northern Territory	436	429	7	872
Australian Capital Territory	1 414	n.p.	n.p.	1 419
Australia(a)	**120 750**	**2 063**	**5 731**	**128 544**

(a) Includes Other Territories.

INDIGENOUS MORTALITY

In 2001, the death rate among the Indigenous population was more than twice the death rate among the total Australian population. The ISDR for the Indigenous population was 12 deaths per 1,000 population compared to 6 deaths per 1,000 for the total population. Due to the undercoverage of Indigenous deaths Australia-wide, this estimate of the disparity in mortality between Indigenous and total population is likely to be conservative. For example, the Indigenous ISDR based on South Australia, Western Australia and Northern Territory data, where the estimated coverage of deaths is higher, was 15 per 1,000 population, more than double the ISDR for the total population of these states (6 per 1,000).

While overall mortality is higher among males than females, this difference was greater among the Indigenous population. The Australian Indigenous male ISDR (16 per 1,000 population) was 73% higher than the Indigenous female ISDR (9 per 1,000). Among the total population, the male ISDR (7 per 1,000) was 40% higher than the female ISDR (5 per 1,000).

AGE AT DEATH

Deaths identified as Indigenous occurred at younger ages than deaths for the total population. In 2001 the median age at death for Indigenous people was 54 years, around 24 years less than the median age at death of total persons (79 years). Indigenous males had a median age at death of 52 years, around 6 years less than Indigenous females (58 years).

The median age at death among Indigenous males in 2001 was highest in New South Wales (56 years), and the median age at death among Indigenous females was highest in Victoria (64 years). The lowest median age at death for both Indigenous males and females was in the Northern Territory (45 years and 53 years respectively) (see tables 6.35 and 6.36).

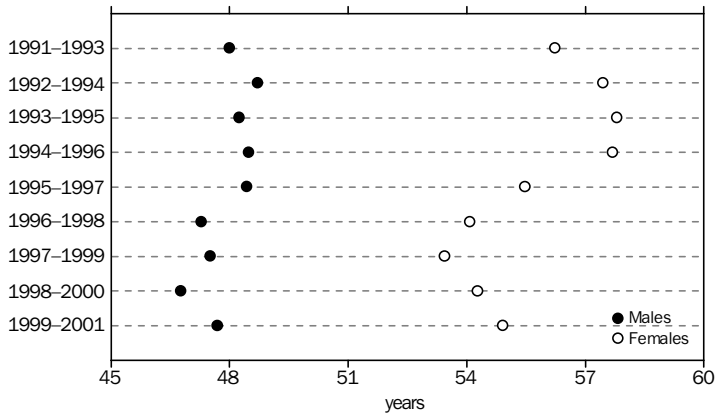
While the median age at death for total Australian males and females has shown a continual increase over the last 10 years, the median age at death for Indigenous males and females has fluctuated (see tables 6.35 and 6.36). This fluctuation reflects the

AGE AT DEATH *continued*

relatively small population, and the changing proportion of deaths registered as Indigenous.

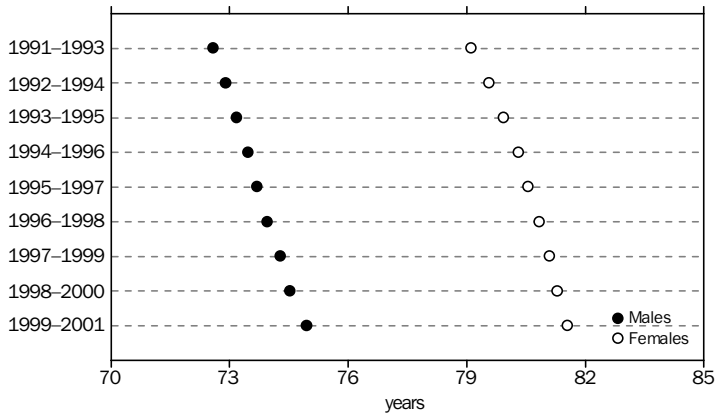
Combining data for South Australia, Western Australia and the Northern Territory only, where coverage is estimated to have been relatively high, and combining three years data, reduces some of the year to year fluctuations. However, fluctuations in Indigenous median age at death remain evident, compared to the steady increase apparent among the total population deaths.

3.2 MEDIAN AGE AT DEATH(a), Indigenous Population



(a) For South Australia, Western Australia and the Northern Territory combined.

3.3 MEDIAN AGE AT DEATH(a), Total Population

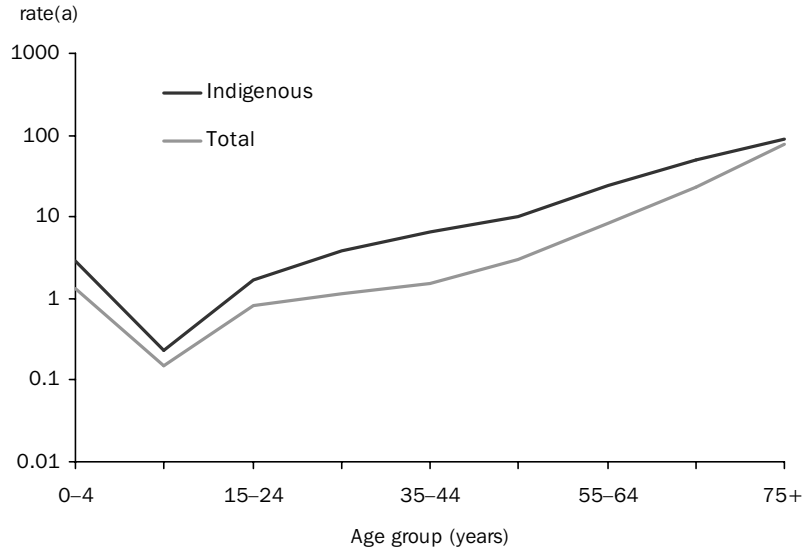


(a) For South Australia, Western Australia and the Northern Territory combined.

Age-specific death rates for the Indigenous population were higher than for the total population in all age groups in 2001. For both males and females, the greatest difference was in the 35–44 years age group, where the Indigenous age-specific death rates were over four times higher than for Australian males and females as a whole. In most other age groups, the Indigenous age-specific deaths rates for both males and females were at least double those for total males and females, with the exception of those aged 5–14 years and 75 years and over.

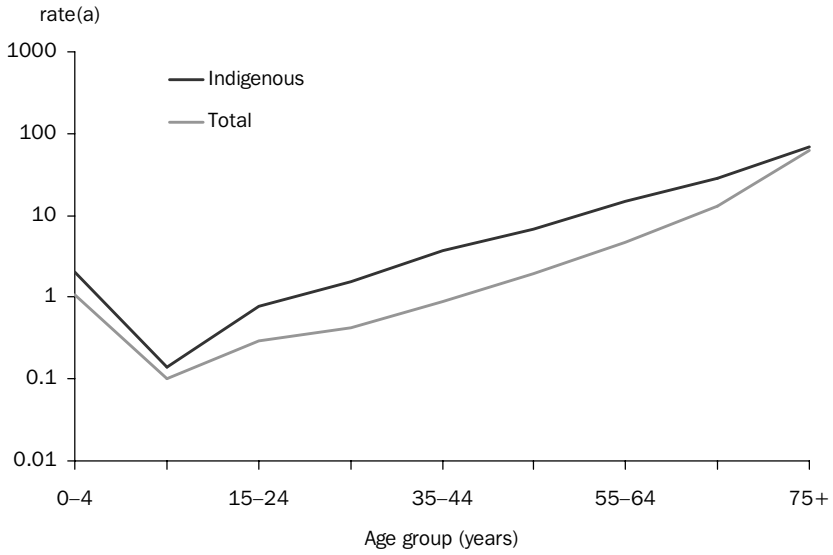
AGE AT DEATH *continued*

3.4 AGE-SPECIFIC DEATH RATES, Males



(a) Logarithmic scale.

3.5 AGE-SPECIFIC DEATH RATES, Females



(a) Logarithmic scale.

No clear trend over time is evident in Indigenous age-specific death rates. Combining data for South Australia, Western Australia and the Northern Territory, year to year fluctuations in age-specific death rates remain evident.

AGE AT DEATH *continued*

3.6 AGE-SPECIFIC DEATH RATES, Indigenous(a)

Age (years)	*1996*	*1997*	*1998*	*1999*	*2000*	*2001*
0–4	5.0	4.5	3.4	3.9	4.8	3.7
5–14	0.4	0.5	0.5	0.4	0.5	0.3
15–24	1.4	1.8	2.8	2.2	2.2	1.9
35–44	8.2	8.7	10.3	7.1	8.6	7.9
45–54	14.3	17.8	14.4	15.2	14.4	11.1
55–64	29.5	32.5	26.2	26.2	34.1	25.4
65–74	49.6	55.8	49.5	48.7	58.8	44.2
75 and over	90.5	99.6	106.7	102.7	105.1	79.9

(a) For South Australia, Western Australia and the Northern Territory combined.

INFANT DEATHS

As with other age groups, the Indigenous IMR was higher than the total infant mortality rate. The 2001 Indigenous IMR was 11 deaths per 1,000 live births, double the total Australian IMR (5). The highest Indigenous IMR was experienced in the Northern Territory (16). The coverage of Indigenous births throughout Australia has deficiencies similar to those of the deaths collection, although the level of 2001 births coverage for Australia as a whole is estimated to be around 95% on 1996 Census-based experimental projections for 2001 (*Births, Australia, 2001*, cat. no. 3301.0)). Given that the level of estimated Indigenous births coverage is higher than the deaths coverage, the Indigenous IMRs presented here are likely to be conservative estimates.

The Indigenous IMR has fluctuated over time. While some decline is apparent in the infant mortality rate for South Australia, due to the small number of infant deaths involved no reliable trend is evident.

3.7 INFANT MORTALITY RATES, Indigenous

	NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.(a)*
1993–1995	n.p.	n.p.	n.p.	13.7	18.0	n.p.	22.2	n.p.	15.0
1994–1996	n.p.	n.p.	n.p.	12.2	20.6	n.p.	18.8	n.p.	13.3
1995–1997	n.p.	n.p.	n.p.	12.3	18.7	n.p.	22.2	n.p.	12.8
1996–1998	n.p.	n.p.	11.7	8.3	18.3	n.p.	23.7	n.p.	12.7
1997–1999	n.p.	n.p.	12.6	6.9	15.8	n.p.	23.5	n.p.	13.0
1998–2000	11.8	12.2	12.5	7.8	16.9	n.p.	21.5	n.p.	13.5
1999–2001	10.9	11.4	11.7	8.0	16.6	n.p.	19.2	n.p.	12.7

(a) Includes Other Territories.

The disparity between the IMR of the Indigenous population and that of the total population is more pronounced in Australia than in the United States of America and New Zealand. In 2001 the New Zealand Maori population experienced an IMR of 7.8 compared to 5.3 for the total population, while in 1996–1998 the American Indian and Alaska Native population of the Unites States of America experienced an IMR of 8.9, compared to 7.2 for the total population. The infant mortality rates of the Indigenous

INFANT DEATHS *continued*

populations in both New Zealand (7.8) and the United States of America (8.9) are lower than in Australia (10.6) (table 6.52).

CAUSES OF DEATH

While the leading causes of death for the Indigenous population differ quite markedly from those for the total population, there were a number of similarities for deaths recorded during 2001. For example, diseases of the circulatory system were the leading cause of death for both the Indigenous population and the total Australian population, although this group of diseases accounted for proportionally fewer Indigenous deaths (29%) of all Indigenous deaths, compared to 38% of deaths overall. Within this group, IHD was the most common cause, accounting for 18% of all Indigenous deaths and 20% of total deaths. Malignant neoplasms were the second leading cause of death for both the Indigenous and total populations, although deaths due to malignant neoplasms also accounted for proportionally fewer Indigenous deaths (16%) than total deaths (29%).

Other causes of death also reflect the different health experience of Indigenous Australians. For example, external causes of death (including accidents, assault and intentional self-harm) comprised 17% of Indigenous deaths compared to 6% of total deaths. Endocrine, nutritional and metabolic diseases, predominantly diabetes mellitus, accounted for 8% of all Indigenous deaths, compared with 3% of total deaths.

3.8 UNDERLYING CAUSE OF INDIGENOUS DEATH, 2001

Cause of death and ICD-10 code	*Indigenous deaths* no.	*Total deaths* no.	*Indigenous median age at death* years	*Total median age at death* years	*Indigenous SMR(a)* rate
All causes	**2 063**	**128 544**	**54.2**	**78.5**	**2.1**
Diseases of the circulatory system(I00–I99)	595	49 326	61.8	82.4	2.1
Malignant neoplasms	329	36 750	62.7	73.7	1.3
External causes (V01–Y98)	343	7 876	31.1	44.2	2.2
Endocrine, nutritional, and metabolic diseases	173	4 314	59.5	78.0	6.0
Diseases of the respiratory system (J00–J99)	194	10 626	65.2	80.5	3.5
Diseases of the digestive system (K00–K93)	96	4 089	47.7	78.4	2.3

(a) Standardised mortality ratio. See Glossary on page 105. Standardised using the age-specific death rates of the total Australian population at June 1999, in five year age groups from 0–4 years to 75 years and over. The SMR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the SMRs presented here are likely to be conservative estimates. Further, undercoverage of Indigenous observed deaths may vary by cause of death.

In each leading cause of death category the median age at death among deaths registered as Indigenous was below the median age at death for the total population, with the greatest difference occurring among deaths due to diseases of the digestive system. In this cause category, the median age at death among Indigenous deaths (48 years) was 29 years less than that for total deaths (78 years). The highest median age at death for the Indigenous population was among deaths due to diseases of the

CAUSES OF DEATH *continued*

respiratory system (65 years), while the lowest was for deaths due to external causes (31 years).

The rate of death among the Indigenous population was higher in each leading cause category than the rate for the total population. Differences were most notable among deaths due to diseases of the respiratory system and endocrine, nutritional and metabolic diseases where death rates for the Indigenous population were respectively four times and eight times higher than for the total population.

INDIGENOUS LIFE EXPECTANCY

Differences in Indigenous and total mortality are reflected in substantially lower life expectancy for the Indigenous population. At the national level, experimental life expectancy at birth for the period 1999–2001 was estimated to be about 56 years for Indigenous males and 63 years for Indigenous females (including an adjustment for the estimated undercoverage of Indigenous deaths). This compares to life expectancy at birth of 77 years for total males, and 82 years for total females. For both Indigenous males and females life expectancy was highest in Victoria (57 and 64 years respectively) and lowest in South Australia (55 and 61 years respectively).

International comparison

The life expectancy of Indigenous people in both New Zealand and the United States of America is higher than for the Indigenous Australians. While the Indigenous life expectancy in these countries is lower than their respective total populations, the difference is not as large as in Australia (where there is a difference of 21 years for males and 20 years for females). In 1995–1997 the New Zealand Maori population had a life expectancy at birth of 67 years for males and 72 years for females. For males this was 7 years lower than for the total population (74 years), and for females 8 years lower than the total population (80 years). In 1996–1998 the American Indian and Alaska Native population of the United States of America had a life expectancy at birth of 67 years for males and 74 years for females, 6 years lower than for the total male population and 5 years lower than the total female population.

Coverage and adjustment

To produce Indigenous life expectancy data two sets of experimental Indigenous life tables were produced. One set (the observed life expectancies) was based on the number of registered deaths which were not adjusted for undercoverage. To compensate for undercoverage the other set was produced after inflating the number of registered deaths in the state or territory by an adjustment factor (table 6.443–6.50).

The observed life expectancies are higher than the adjusted life expectancies, for both sexes. The observed life expectancies are based on the actual number of deaths registered as Indigenous. As Indigenous deaths are under registered to some extent in all states and territories, the observed life expectancies are likely to be an over estimate of Indigenous life expectancy.

For more details on the experimental Indigenous life table calculation, and the method of adjustment for undercoverage see Appendix 1, Experimental life tables for Indigenous people.

Evaluation and limitations

The assessment of the life table results made in *Deaths, Australia 1999* (p. 73) that "there seems to be some improvement in life expectancy in South Australia, Western Australia and the Northern Territory" may not be correct.

The adjustment factors used in producing the 'adjusted' experimental life tables were based on experimental estimates and projections of the Indigenous population. These estimates and projections were in turn based on experimental Indigenous life tables for the period 1991–1996. In evaluating the 1997–1999 life tables it was apparent that these later life tables replicate the 1991–1996 life expectancy values, with only slight modifications due to the varying age distribution of registered deaths in different time periods. This circularity, and uncertainty concerning the 1991–1996 experimental life tables, indicates that the adjusted life expectancy estimates cannot be validly interpreted as reduction in Indigenous mortality over time. On the other hand, there is an apparent improvement in the experimental observed life expectancy estimates, although much uncertainty applies to them.

For a more detailed evaluation of the experimental Indigenous life tables see *Demography Working Paper 2001/2 — Aboriginal and Torres Strait Islander Mortality: Evaluation of Experimental Indigenous Life Tables.*

While the adjusted life expectancy estimates represent the ABS current best assessment of Indigenous life expectancy, they should not be used to draw inferences on change in life expectancy over the last 10 years.

CHAPTER 4 FEATURE ARTICLE—CHILD MORTALITY

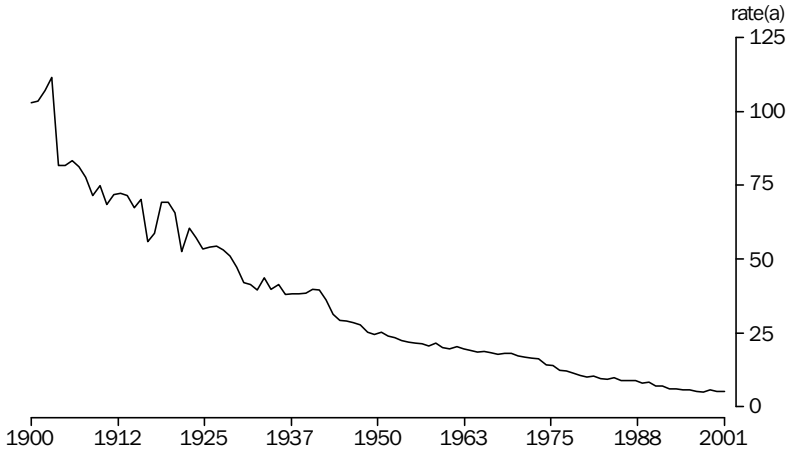
The survival of children in their first year of life is commonly viewed as an indicator of the general health and wellbeing of a population. After the first year of life the chance of survival increases. During 2001, there were 1,730 deaths registered of children aged 0–9 years, 76% of these deaths were infants, 15% were aged 1–4 years and 9% aged 5–9 years.

The following article discusses infant mortality (deaths of children under one year of age), comprising deaths during the neonatal period (those aged less than 28 days) and the postneonatal period (those aged between 28 days and less than one year), and the mortality of children aged one to nine years.

TRENDS IN INFANT MORTALITY

The improved survival of babies in Australia in the last century, as in many other developed countries, has contributed to increases in life expectancy at birth. Over the 20th century, the rate of infant deaths in Australia decreased from 103 deaths per 1,000 live births in 1900 to 5.3 deaths per 1,000 live births in 2001. The dramatic decline in the infant mortality rate during the first half of the century was linked to improvements in public sanitation and health education. In the 1940s, the development of vaccines and the ensuing programs of mass vaccination, along with effective use of antibiotics, resulted in further gains. These measures removed much of the earlier volatility in the infant mortality rate caused by outbreaks of infectious diseases. The more modest declines in the second half of the century were largely due to improved medical technology, such as neonatal intensive care units (Taylor et al. 1998), the introduction of universal health insurance (Medicare), education campaigns about the importance of immunisation (Stanley, 2001) and most recently, in the case of Sudden Infant Death Syndrome (SIDS), infant sleeping position (SIDS Australia Online).

4.1 INFANT MORTALITY RATE(a), 1900–2001



(a) Per 1,000 live births

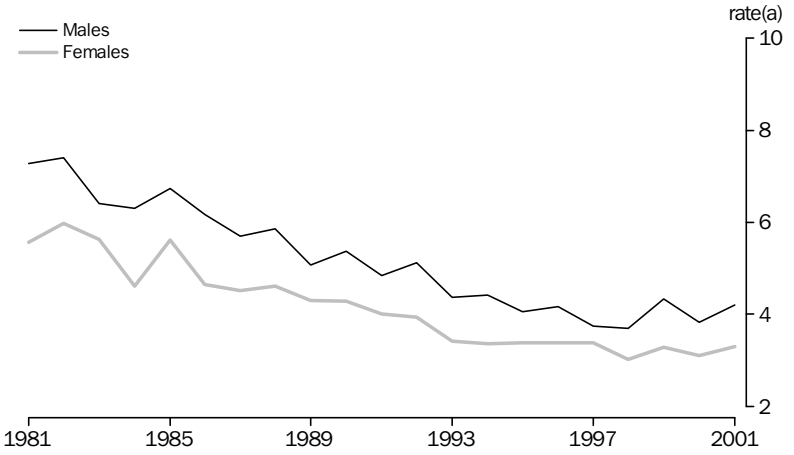
TRENDS IN INFANT MORTALITY *continued*

Infant mortality rates are higher among boys than girls for almost all leading causes of death. This difference is largely biological in origin (Waldron 1983, p. 321–333). Between 1981 and 2001, the infant mortality rate for boys was, on average, 25% higher than that for girls.

NEONATAL MORTALITY

The death rate for babies aged under 28 days continued to decline rapidly over the last two decades of the 20th century. Between 1981 and 2001, the neonatal mortality rate declined from 6.4 to 3.7 deaths per 1,000 live births. The rate of decline was similar for boys and girls.

4.2 NEONATAL DEATHS, 1981–2001



(a) Rate per 1,000 live births.

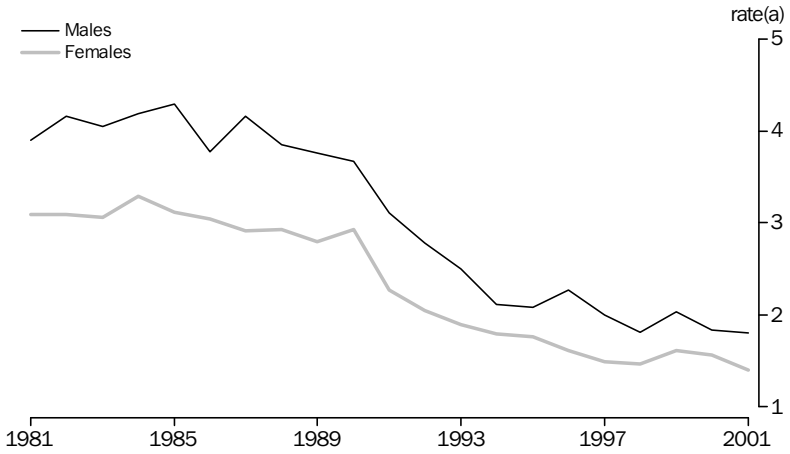
Deaths are classified according to the International Classification of Diseases (ICD). There have been a number of revisions of the ICD, the most recent being the ICD-10, applied to Australian deaths statistics since 1999. In 2001, two groups of causes of death accounted for the majority of neonatal deaths. These were conditions originating in the perinatal period (pregnancy and the first 28 days of life) (68%), and congenital malformations (26%). Conditions which originate in the perinatal period include causes that relate to pregnancy, foetal growth, labour and delivery. Congenital malformations are conditions present at birth that are either hereditary or originating from pregnancy, including deformities and chromosomal abnormalities.

POSTNEONATAL MORTALITY

Between 1981 and 2001, the mortality rate for infants aged between 28 days and under one year declined by 54% from 3.5 to 1.6 deaths per 1,000 live births. The rate of decline was similar for boys and girls. Babies who die after the first 28 days of life were likely to die from a greater range of causes of death than those who die in their first four weeks of life.

POSTNEONATAL MORTALITY *continued*

4.3 POSTNEONATAL DEATHS, 1981–2001



(a) Per 1,000 live births.

Congenital malformations and conditions originating in the perinatal period have been among the main causes of postneonatal deaths. However, the most commonly cited group of causes were symptoms, signs and abnormal clinical and laboratory findings not elsewhere classified. This group of causes accounted for one third of postneonatal deaths in 1997–2001, the bulk of them (30% of all postneonatal deaths) caused by SIDS.

CHILDREN AGED 1–9 YEARS

Where infant mortality rate is measured as the number of deaths in a year per 1,000 live births in that year, deaths of children aged one to nine years are measured per 1,000 population of the same age (known as age-specific death rates).

The incidence of child mortality declines after the first year of life. During 2001, there were 5.3 deaths per 1,000 infant population. In comparison, for children aged 1–4 years there were only 0.3 deaths per 1,000 population and for those aged 5–9 years there were 0.1 deaths per 1,000. There are no significant differences in the death rates of boys and girls in these younger age groups. In all other groups (including adults) there is a higher rate of deaths for males than females.

There were 420 deaths in 2001 to children aged 1–9 years, 260 deaths for children aged 1–4 years and 160 deaths for children aged 5–9 years. External causes were the most common cause of death for children aged 1–9 years in 2001 (37%), comprising mainly of deaths due to transport accident (13%) and accidental drowning and submersion (9%). The number of deaths from these causes have declined since 1997 (based on ICD–10) from 42% for all external causes; 16% for transport accident and 13% due to accidental drowning and submersion. In 2001 there were 160 deaths of children aged 1–9 years from external causes, which is a decrease of 28% from 1997 when there were 220 deaths.

The major cause of death for children aged 1–9 years, that of death from an external cause, raises the important public health issue of these deaths being potentially avoidable. Decreases in the number of accidental deaths due to traffic accidents and drownings in the 1980s and 1990s followed legislation to restrain young children in cars and to make swimming pool fencing compulsory (Stanley, 2001).

CHILDREN AGED 1–9 YEARS *continued*

Other causes of childhood deaths include congenital abnormalities and cancers. Medical science has made significant contributions to falls in all causes of death by more accurate diagnosis, improved surgical techniques and chemotherapy (Stanley, 2001).

INDIGENOUS

In May 2000, the House of Representatives Standing Committee on Family and Community Affairs released a report acknowledging the continuing poor health of Aboriginal and Torres Strait Islander people. This is reflected in the high infant mortality rate for the Indigenous population, much higher than for the total Australian population. During 2001, there were 10.6 Indigenous infant deaths per 1,000 live births, compared to 5.3 for the total population. As there is undercoverage of Indigenous deaths to some extent in all states and territories, the measures of mortality presented here are likely to be conservative estimates. Fluctuations in the level of Indigenous mortality over time partly reflect changing levels of coverage of Indigenous deaths. Given the volatility in measures of Indigenous mortality caution should be exercised in assessing trends in Indigenous mortality over time.

Neonatal

There were 70 neonatal Indigenous deaths registered during 2001 in Australia, 8% of all neonatal deaths. The death rate for Indigenous infants aged under 28 days was 68% higher than for all neonatal deaths, 6.2 per 1,000 live births compared to 3.7. Since 1981, the Indigenous neonatal mortality rate has declined from 27.5 to 6.2 deaths per 1,000 live births. The rate of decline was marginally higher for males and females.

The main cause of Indigenous neonatal deaths during 2001 was from certain conditions originating in the perinatal period (75%) such as foetal and newborns affected by maternal factors and by complications of pregnancy, labour and delivery (39%), disorders related to short gestation and low birth weight, not elsewhere classified (14%) and respiratory and cardiovascular disorders specific to the perinatal period (14%).

Postneonatal

There were 50 postneonatal Indigenous deaths registered during 2001 in Australia. The postneonatal mortality rate for Indigenous infants was 4.4 deaths per 1,000 Indigenous live births, compared to 1.6 for all postneonatal deaths.

The main cause of Indigenous postneonatal deaths during 2001 was from SIDS (26%), followed by congenital malformations, deformations and chromosomal abnormalities and certain conditions originating in the perinatal period (each 12%).

Children aged 1–9 years

There were 30 deaths of Indigenous children aged 1–9 years registered during 2001. The age-specific death rate for Indigenous children aged 1–4 years was 0.6 deaths per 1,000 Indigenous population and 0.3 per 1,000 in the 5–9 years age group. In comparison, for all children aged 1–4 years there were only 0.3 deaths per 1,000 population and 0.1 deaths per 1,000 for those aged 5–9 years.

External causes were the most common cause of death for Indigenous children age 1–9 years (44%), comprising mainly transport accidents (26%) and accidental drowning and submersions (9%).

INTERNATIONAL COMPARISON

According to the United Nations, the projected average world infant mortality rate for 2000–2005 is 55 infant deaths per 1,000 live births, Australia stands at 5 infant deaths per 1,000 live births, Australia's infant mortality rate has been among the lowest in the world. Despite a continued decline in the infant mortality rate, there continues to be a wide variation in the rate experienced in different countries over the past 50 years. Of the selected countries, the lowest infant mortality rates are in the developed countries such as Japan and Sweden, each experienced 3 infant deaths per 1,000 live births averaged over 2000–2005. The highest rates occur in African countries such as Niger (126) and Somalia (113).

Overall the most developed regions have an IMR (8 per 1,000 live births) much lower than the less developed regions (59) and the least Developed countries (92).

4.4 INTERNATIONAL INFANT MORTALITY RATES, Selected years

	1950–1955	*1960–1965*	*1970–1975*	*1980–1985*	*1990–1995*	*1995–2000*	*2000–2005(a)*
Australia	24	20	17	10	7	5	5
Canada	36	26	16	9	6	6	5
China	195	121	61	52	47	41	37
France	45	25	16	9	7	6	5
Germany	51	29	21	11	6	5	5
Greece	60	50	34	15	9	7	6
Hong Kong	79	33	17	10	5	4	4
India	190	157	132	107	79	73	65
Indonesia	201	166	126	89	59	48	40
Italy	60	40	26	13	7	6	5
Japan	51	25	12	7	4	4	3
Korea, Republic of	115	70	38	23	12	8	7
Malaysia	99	63	42	28	15	12	10
New Zealand	26	21	16	12	7	7	6
Niger	213	191	171	156	144	136	126
Papua New Guinea	158	134	112	91	76	69	62
Singapore	66	30	19	8	6	5	5
Somalia	207	179	155	143	165	122	113
Spain	62	42	21	11	7	6	5
Sweden	20	15	10	7	5	4	3
United Kingdom	29	22	17	11	7	6	5
United States of America	28	25	18	11	9	8	7
Viet Nam	158	130	107	70	47	40	34
Yemen	241	219	184	126	92	74	62
Developed regions (b)	59	33	21	15	10	8	8
Less developed regions(c)	180	137	105	88	71	65	59
Least developed regions (d)	197	171	149	127	110	102	92
World	**157**	**119**	**94**	**79**	**64**	**60**	**55**

Source: Population Division, United Nations Secretariat, United Nations, *World Population Prospects, 2000 Revisions*.

(a) The projected 2000–2005 infant mortality rate uses the medium variant.

(b) Comprising Europe, Northern America, Australia, New Zealand and Japan.

(c) Comprising Africa, Asia (excluding Japan), Latin America and the Caribbean, Melanesia, Micronesia and Polynesia.

(d) Comprising 48 countries, as defined by the United Nations General Assembly in 1998, 33 in Africa, 9 in Asia, 1 in Latin America and the Caribbean, and 5 in Oceania.

CHAPTER 5 FEATURE ARTICLE—SEPARATION FACTORS

A life table is a statistical model that is constructed from the death rates of a population at different ages. It is frequently used to express death in terms of the probability of dying. It is also used as a population model that covers a cohort born at the same moment, closed to migration influences, and followed through successive ages until death. In its simplest form, a life table is generated from age-specific death rates and the resulting values are used to measure mortality, survivorship and life expectancy.

The assumption made when constructing a life table is that deaths (at most ages) occur evenly throughout the time period and the age interval which are utilised. This assumption does not apply at the beginning of the life table, for those who die under one year of age. This is where a separation factor is used. The separation factor is defined as the fraction of infant deaths (deaths under one year of age) which are to births that occurred in the previous year. That is some infant deaths in a year occur to births of the same year and some occur to births of the previous year.

The separation factor can be applied to the calculation of infant mortality rates when detailed data on deaths by year of birth is absent. The infant mortality rate is then used in the construction of a life table.

INFANT MORTALITY RATES

The infant mortality rate for a population can be calculated in several ways depending on the availability of data and the purpose of its calculation. In its simplest form, this rate is the ratio of infant deaths to births, both occurring in a given year (or time period). In this calculation, it is apparent that the infant deaths and births do not precisely represent the same group of children (birth cohort).

The refined infant mortality rate is obtained by splitting infant deaths into two parts: one belonging to births of the previous year, and the other belonging to births of the current year. The infant mortality rate can then be calculated by selecting appropriate infant deaths and births. Two such rates are calculated. In the *cross-sectional* infant mortality rate, infant deaths in a year are split into infant deaths which occurred to births of the previous year and to births of the same year. Two 'part year' infant mortality rates are calculated and then added to provide an infant mortality rate for the year. In the *cohort* infant mortality rate, the infant deaths occurring in two years are split, so that they can be related to births of each year.

CALCULATING A SEPARATION FACTOR

The direct method of calculating a separation factor is by tabulating infant deaths in a year by the year of birth of the deceased child. The separation of deaths by birth cohort is possible if death data is available by year of birth. Currently data on the date of birth of the deceased infant is not available on the death registration forms of Victoria and Tasmania.

Given the lack of complete national data, the separation factor is calculated by an indirect method from a tabulation of infant deaths by age at death classified as under 1 day, 1–2 days, ... , 6–7 days, 1–2 weeks,..., 3–4 weeks, 1–2 months,..., 11–12 months. As this distribution of deaths varies by sex of the child and from year to year, the

CALCULATING A SEPARATION FACTOR, *continued*

separation factor is calculated either yearly or as an average of infant deaths during a three year period, to complement a life table which is calculated for a three-year period.

The total number of infant deaths in a year need to be tabulated by age at death, with details of age at death as specific as possible. On the basis of the assumption of uniform distribution of deaths within each age category, weights are calculated to allocate infants deaths into each age category, and to those belonging to births of the same year or to births in the previous year. Table 5.1 illustrates how the method of allocating proportions is applied to infant deaths. Finally, the allocated deaths for each time period and for each age category are added, and the separation factor is calculated using the following equation:

$$\frac{\text{Deaths attributed to infants born in 1999}}{\text{(Deaths attributed to infants born in 1999 + Deaths attributed to infants born in 2000)}}$$

When this equation is applied to the example provided in table 3.1 the result is:

$$155.12/(155.12+991.88) = 0.1352$$

This can then be interpreted as 13.52% of infant deaths (persons) that occurred in 2000 belonged to births occurring in 1999.

SEPARATION FACTOR METHODOLOGY

5.1 SEPARATION FACTOR CALCULATIONS, Persons, 2000

		INFANT DEATHS		
Age at death	*Assumed proportion of deaths occurring in current year*	*Total infant deaths 2000* no.	*Infant deaths to births in 1999* no.	*Infant deaths to births in 2000* no.
11 to 12 months	(12–11.5)/12=0.0417	16	15.33	0.67
10 to 11 months	(12–10.5)/12=0.1250	12	10.50	1.50
9 to 10 months	(12–9.5)/12=0.2083	18	14.25	3.75
8 to 9 months	(12–8.5)/12=0.2917	13	9.21	3.79
7 to 8 months	(12–7.5)/12=0.3750	23	14.38	8.63
6 to 7 months	(12–6.5)/12=0.4583	23	12.46	10.54
5 to 6 months	(12–5.5)/12=0.5417	31	14.21	16.79
4 to 5 months	(12–4.5)/12=0.6250	38	14.25	23.75
3 to 4 months	(12–3.5)/12=0.7083	58	16.92	41.08
2 to 3 months	(12–2.5)/12=0.7917	72	15.00	57.00
1 to 2 month	(12–1.5)/12=0.8750	81	10.13	70.88
3 to 4 weeks	(52–1.5)/52=0.9327	30	2.02	27.98
2 to 3 weeks	(52–1.5)/52=0.9519	46	2.21	43.79
1 to 2 weeks	(52–1.5)/52=0.9712	77	2.22	74.78
6 to 7 days	(365–6.5)/365=0.9822	7	0.12	6.88
5 to 6 days	(365–5.5)/365=0.9849	23	0.35	22.65
4 to 5 days	(365–4.5)/365=0.9877	17	0.21	16.79
3 to 4 days	(365–3.5)/365=0.9904	31	0.30	30.70
2 to 3 days	(365–2.5)/365=0.9932	32	0.22	31.78
1 to 2 day	(365–1.5)/365=0.9959	59	0.24	58.76
under 1 day	(365–0.5)/365=0.9986	440	0.60	439.40
Total		(a)**1 148**	**155.12**	**991.88**

(a) Total includes not stated

CURRENT SEPARATION FACTORS

A decline in infant mortality over time has seen the separation factor for infant deaths generally narrow to below 0.15 for the total population and closer to 0.18 for the Indigenous population of Australia.

5.2 SEPARATION FACTORS, 1997–2000

	1997	*1998*	*1999*	*2000*
Males	0.1355	0.1358	0.1272	0.1340
Females	0.1089	0.1315	0.1278	0.1363
Persons	0.1235	0.1340	0.1275	0.1350

5.3 SEPARATION FACTORS, Indigenous, 1997–2000

	1997	*1998*	*1999*	*2000*
Males	0.1849	0.1764	0.1234	0.1814
Females	0.1173	0.0988	0.1543	0.1163
Persons	0.1532	0.1451	0.1375	0.1509

LIFE TABLE APPLICATION

Continuing on from the application of the separation factor in infant mortality rate calculations a further use of a separation factor is in the construction of a life table. Specifically, the calculation of the stationary population at each age (Lx), which is also known as the person-years lived in an age interval x to x+1 in a life table, and is derived from the following formula:

$$L(x) = f(x) \cdot l(x) + (1-f(x)) \cdot l(x+1)$$

where f(x) represents the separation factor at age x and l(x) is the number of persons alive at exact age x in the life table. For age 0, f(0) is the separation factor as defined previously. For other ages, f(x), is assumed to be 0.5 on the assumption of a uniform distribution of deaths occurring over age and time.

6.1 DEATHS(a), Selected years

		1981	1991	1996	1997	1998	1999	2000	2001
		DEATHS							
Total deaths	no.	**109 003**	**119 146**	**128 719**	**129 350**	**127 202**	**128 102**	**128 291**	**128 544**
Males	no.	60 696	64 067	68 206	67 752	67 073	67 227	66 817	66 835
Females	no.	48 307	55 079	60 513	61 598	60 129	60 875	61 474	61 709
Sex ratio		125.6	116.3	112.7	110.0	111.5	110.4	108.7	108.3
Standardised death rates	rate	*8.4*	*6.9*	*6.4*	*6.3*	*6.0*	*5.9*	*5.7*	*5.4*
Males	rate	11.1	8.9	8.2	7.9	7.6	7.4	7.1	6.8
Females	rate	6.3	5.4	5.0	4.9	4.7	4.6	4.5	4.3
Crude death rates	rate	*7.3*	*6.9*	*7.0*	*7.0*	*6.8*	*6.8*	*6.7*	*6.6*
Males	rate	8.1	7.4	7.5	7.4	7.2	7.1	7.0	6.9
Females	rate	6.5	6.4	6.6	6.6	6.4	6.4	6.4	6.3
Median age at death	years	*72.6*	*75.4*	*77.0*	*77.2*	*77.4*	*77.8*	*78.2*	*78.5*
Males	years	69.7	72.2	74.0	74.2	74.5	74.8	75.3	75.5
Females	years	76.8	78.8	80.7	81.0	81.0	81.4	81.7	81.8
Age-specific death rates									
Age group (years)									
Males									
0	rate	11.5	7.9	6.4	5.7	5.5	6.4	5.7	5.7
1–4	rate	0.6	0.4	0.4	0.4	0.4	0.3	0.3	0.3
5–14	rate	0.3	0.2	0.2	0.2	0.2	0.2	0.2	0.2
15–24	rate	1.4	1.1	1.0	1.1	1.0	1.0	0.9	0.8
25–34	rate	1.3	1.3	1.3	1.3	1.4	1.4	1.3	1.1
35–44	rate	2.1	1.8	1.7	1.7	1.7	1.6	1.7	1.5
45–54	rate	6.3	4.1	3.4	3.4	3.2	3.2	3.1	3.0
55–64	rate	16.0	12.1	9.9	9.6	9.1	8.6	8.1	8.1
65–74	rate	40.4	30.9	28.3	27.4	26.2	25.5	24.1	22.8
75–84	rate	93.7	79.4	74.1	70.6	67.5	64.8	63.4	59.9
85 and over	rate	208.2	175.7	181.3	174.0	167.2	166.1	165.3	160.3
Females									
0	rate	8.8	6.2	5.0	4.9	4.5	4.9	4.7	4.5
1–4	rate	0.5	0.3	0.3	0.2	0.3	0.3	0.2	0.2
5–14	rate	0.2	0.1	0.1	0.1	0.1	0.1	0.1	0.1
15–24	rate	0.5	0.4	0.3	0.4	0.4	0.4	0.3	0.3
25–34	rate	0.5	0.5	0.5	0.5	0.5	0.5	0.5	0.4
35–44	rate	1.1	0.9	0.9	0.9	0.9	0.9	0.9	0.9
45–54	rate	3.2	2.4	2.1	2.1	2.1	2.0	2.0	1.9
55–64	rate	7.8	6.4	5.7	5.5	5.2	4.9	4.8	4.6
65–74	rate	20.0	17.0	15.1	15.1	14.2	13.8	13.4	13.1
75–84	rate	56.9	48.5	46.4	44.8	42.9	41.5	39.6	38.3
85 and over	rate	160.4	143.5	145.7	144.6	136.1	136.1	137.9	129.8

(a) See Glossary for definitions of terms used.

6.1 DEATHS, Selected years *continued*

		1981	*1991*	*1996*	*1997*	*1998*	*1999*	*2000*	*2001*
DEATHS									
Expectation of life(a)									
Males									
Age 0	years	71.4	74.4	75.2	75.6	75.9	76.2	76.6	77.0
Age 1	years	71.2	74.0	74.7	75.0	75.3	75.7	76.0	76.5
Age 25	years	48.3	50.8	51.5	51.8	52.1	52.5	52.8	53.2
Age 45	years	29.6	32.1	32.8	33.1	33.4	33.8	34.1	34.5
Age 65	years	13.9	15.5	15.8	16.1	16.3	16.6	16.8	17.2
Age 85	years	4.7	5.2	5.1	5.3	5.4	5.5	5.5	5.6
Females									
Age 0	years	78.4	80.4	81.1	81.3	81.5	81.8	82.0	82.4
Age 1	years	78.1	79.9	80.5	80.7	80.9	81.2	81.4	81.8
Age 25	years	54.7	56.4	56.9	57.1	57.3	57.6	57.8	58.2
Age 45	years	35.4	37.0	37.5	37.7	38.0	38.2	38.5	38.8
Age 65	years	18.1	19.3	19.6	19.8	20.0	20.2	20.4	20.7
Age 85	years	5.7	6.3	6.4	6.4	6.5	6.6	6.6	6.8
Leading causes of death (SDR per 100,000 population)(b)									
Males									
Malignant neoplasms (C00–C97)	rate	240	235	230	220	217	215	210	208
Ischaemic heart diseases (I20–I25)	rate	343	235	196	183	171	164	149	141
Cerebrovascular diseases (I60–I69)	rate	117	72	66	59	56	55	53	50
Chronic lower respiratory diseases (J40–J47)	rate	70	56	51	45	42	40	38	35
Accidents (V01–X59)	rate	59	39	36	33	35	38	35	33
Females									
Malignant neoplasms (C00–C97)	rate	135	143	139	135	131	129	126	127
Ischaemic heart diseases (I20–I25)	rate	167	128	106	101	93	89	83	78
Cerebrovascular diseases (I60–I69)	rate	105	65	58	53	51	50	48	45
Chronic lower respiratory diseases (J40–J47)	rate	17	21	24	22	21	20	19	19
Accidents (V01–X59)	rate	23	17	14	15	15	16	15	13
INFANT DEATHS									
Total Infant deaths	no.	**2 347**	**1 836**	**1 460**	**1 341**	**1 252**	**1 408**	**1 290**	**1 309**
Males	no.	1 354	1 049	843	744	706	812	725	751
Females	no.	993	787	617	597	546	596	565	558
Infant mortality rates	rate	*10.0*	*7.1*	*5.8*	*5.3*	*5.0*	*5.7*	*5.2*	*5.3*
Males	rate	11.2	7.9	6.5	5.8	5.5	6.4	5.7	5.9
Females	rate	8.7	6.3	5.0	4.9	4.5	4.9	4.7	4.6
Age at death									
Males									
Under 1 day	no.	510	370	313	262	228	293	282	272
1 day and under 1 week	no.	223	159	133	132	132	148	104	139
1 week and under 4 weeks	no.	149	110	100	91	114	112	104	115
4 weeks and under 1 year	no.	472	410	297	259	232	259	235	225
Females									
Under 1 day	no.	348	279	244	239	198	233	227	240
1 day and under 1 week	no.	180	138	92	94	83	77	84	81
1 week and under 4 weeks	no.	111	86	82	81	87	90	65	70
4 weeks and under 1 year	no.	354	284	199	183	178	196	189	167

(a) From 1995 onwards, expectation of life has been calculated using data for the three years ending in the year in the table heading.

(b) Data prior to 1997 is on ICD-9 refer to Explanatory Notes 16–21.

6.2 DEATHS, States and territories

		NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(a)
					DEATHS					
Total deaths	no.	**44 552**	**32 295**	**22 856**	**11 891**	**10 779**	**3 876**	**872**	**1 419**	**128 544**
Males	no.	23 192	16 437	12 252	6 023	5 697	1 952	550	729	66 835
Females	no.	21 360	15 858	10 604	5 868	5 082	1 924	322	690	61 709
Sex ratio	ratio	108.6	103.7	115.5	102.6	112.1	101.5	170.8	105.7	108.3
Indigenous deaths(b)	no.	*481*	*93*	*565*	*125*	*336*	*32*	*429*	n.p.	*2 063*
Males	no.	276	54	326	74	210	17	259	n.p.	1 218
Females	no.	205	39	239	51	126	15	170	n.p.	845
Estimated coverage of Indigenous deaths(c)	%	45	41	56	59	62	22	85	n.p.	55
Standardised death rates	rate	*5.4*	*5.3*	*5.5*	*5.5*	*5.2*	*6.2*	*8.1*	*5.1*	*5.4*
Males	rate	6.8	6.6	6.9	7.0	6.6	7.6	9.5	6.2	6.8
Females	rate	4.2	4.2	4.3	4.4	4.1	5.1	6.5	4.1	4.3
Crude death rates	rate	*6.7*	*6.7*	*6.3*	*7.8*	*5.7*	*8.2*	*4.4*	*4.4*	6.6
Males	rate	7.1	6.9	6.8	8.0	6.0	8.4	5.3	4.6	6.9
Females	rate	6.4	6.5	5.8	7.7	5.3	8.0	3.4	4.2	6.3
Median age at death	years	*78.5*	*79.0*	*77.8*	*79.6*	*77.9*	*78.7*	*58.2*	*77.2*	*78.5*
Males	years	75.6	76.1	74.7	76.7	74.8	76.0	55.6	72.1	75.5
Females	years	81.8	82.1	81.4	82.4	81.5	81.2	61.4	81.3	81.8
Age-specific death rates										
Age group (years)										
Males										
0	rate	5.5	5.3	6.4	3.9	5.7	6.5	16.2	4.2	5.7
1–4	rate	0.2	0.2	0.4	0.2	0.5	0.2	0.6	0.1	0.3
5–14	rate	0.1	0.1	0.2	0.1	0.2	0.2	0.1	0.2	0.2
15–24	rate	0.8	0.7	1.0	0.7	1.0	0.9	2.0	0.6	0.8
25–34	rate	1.1	1.0	1.2	1.2	1.2	1.5	3.1	1.3	1.1
35–44	rate	1.5	1.4	1.7	1.7	1.6	1.5	4.2	1.1	1.5
45–54	rate	3.1	2.8	3.4	3.0	2.6	3.5	5.0	2.9	3.0
55–64	rate	8.3	7.7	8.5	8.2	7.4	9.2	12.8	7.3	8.1
65–74	rate	23.1	22.4	22.9	23.2	21.2	24.9	33.0	19.5	22.8
75–84	rate	60.0	60.0	59.2	61.6	56.9	68.7	75.5	51.4	59.9
85 and over	rate	158.6	158.6	159.4	171.7	158.7	174.9	114.4	165.5	160.3
Females										
0	rate	4.6	4.0	4.9	4.9	4.0	5.7	6.3	1.4	4.5
1–4	rate	0.2	0.2	0.2	0.2	0.2	—	1.0	0.1	0.2
5–14	rate	0.1	0.1	0.1	0.1	0.1	0.1	0.2	0.1	0.1
15–24	rate	0.3	0.3	0.3	0.2	0.3	0.4	0.8	0.2	0.3
25–34	rate	0.3	0.4	0.4	0.4	0.5	0.3	0.8	0.4	0.4
35–44	rate	0.8	0.7	0.9	1.1	0.9	1.0	2.0	0.5	0.9
45–54	rate	1.8	2.0	2.0	1.8	1.8	2.6	3.6	1.9	1.9
55–64	rate	4.6	4.4	4.7	4.7	4.0	5.9	9.3	5.2	4.6
65–74	rate	13.1	12.8	13.5	13.2	12.0	16.6	20.5	10.7	13.1
75–84	rate	37.8	37.9	37.4	41.1	37.5	45.4	58.0	37.3	38.3
85 and over	rate	127.6	131.5	131.7	132.0	122.1	145.2	124.6	139.2	129.8

(a) Includes Other Territories.

(b) Does not include all Indigenous deaths—see table 6.34 and paragraph 10–15 of the Explanatory Notes.

(c) Derived using 1996 Census-based experimental Indigenous population projections. See table 6.34 and paragraph 10–15 of the Explanatory Notes.

6.2 DEATHS, States and territories *continued*

		NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.(a)*
		DEATHS								
Expectation of life(b)										
Males										
Age 0	years	76.9	77.5	76.9	77.0	77.3	76.0	70.8	78.5	77.0
Age 1	years	76.4	76.9	76.4	76.4	76.7	75.5	70.7	77.8	76.5
Age 25	years	53.1	53.6	53.1	53.1	53.5	52.3	48.2	54.5	53.2
Age 45	years	34.3	34.8	34.4	34.4	34.9	33.7	30.9	35.6	34.5
Age 65	years	17.1	17.4	17.2	17.1	17.4	16.5	15.2	17.9	17.2
Age 85	years	5.6	5.7	5.7	5.5	5.7	5.2	5.3	5.8	5.6
Females										
Age 0	years	82.4	82.7	82.3	82.5	82.8	81.2	76.5	82.9	82.4
Age 1	years	81.8	82.0	81.8	81.8	82.1	80.7	76.2	82.2	81.8
Age 25	years	58.2	58.4	58.2	58.1	58.5	57.1	53.0	58.5	58.2
Age 45	years	38.8	39.0	38.8	38.8	39.2	37.7	34.3	39.0	38.8
Age 65	years	20.7	20.8	20.7	20.8	21.0	19.8	17.8	20.8	20.7
Age 85	years	6.8	6.8	6.8	6.8	6.9	6.5	6.1	6.8	6.8
Leading causes of death (SDR per 100,000 population)										
Males										
Malignant neoplasms (C00–C97)	rate	209	208	209	211	201	218	199	194	208
Ischaemic heart diseases (I20–I25)	rate	138	134	155	154	130	153	171	116	141
Cerebrovascular diseases (I60–I69)	rate	54	48	52	45	43	56	44	37	50
Chronic lower respiratory diseases (J40–J47)	rate	34	38	35	32	28	48	89	35	35
Accidents (V01–X59)	rate	32	28	39	30	36	44	63	31	33
Females										
Malignant neoplasms (C00–C97)	rate	123	132	125	130	122	147	137	129	127
Ischaemic heart diseases (I20–I25)	rate	78	71	88	81	71	89	109	71	78
Cerebrovascular diseases (I60–I69)	rate	47	42	47	47	38	51	40	45	45
Chronic lower respiratory diseases (J40–J47)	rate	19	19	19	18	15	31	40	22	19
Accidents (V01–X59)	rate	13	12	15	13	15	19	35	9	13

(a) Includes Other Territories.

(b) Expectation of life was calculated over the three year period 1999–2001.

6.2 DEATHS, States and territories *continued*

		NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.(a)*
					INFANT DEATHS					
Total Infant deaths	no.	**449**	**284**	**282**	**79**	**122**	**40**	**41**	**12**	**1 309**
Males	no.	251	166	164	36	73	22	30	9	751
Females	no.	198	118	118	43	49	18	11	3	558
Indigenous infant deaths(b)	no.	*22*	—	*38*	*3*	*26*	*3*	*27*	n.p.	*121*
Males	no.	15	—	22	—	14	—	17	n.p.	72
Females	no.	7	—	16	—	12	—	10	n.p.	49
Infant mortality rates	rate	*5.3*	*4.8*	*5.9*	*4.6*	*5.1*	*6.2*	*10.7*	*3.0*	*5.3*
Males	rate	5.8	5.5	6.7	4.1	5.9	6.5	15.0	4.5	5.9
Females	rate	4.8	4.1	5.1	5.0	4.2	5.9	6.0	1.5	4.6
Age at death										
Males										
Under 1 day	no.	103	61	57	12	19	5	14	3	272
1 day and under 1 week	no.	61	28	26	5	11	3	3	3	139
1 week and under 4 weeks	no.	27	32	27	5	13	4	5	3	115
4 weeks and under 1 year	no.	60	45	54	14	30	10	8	4	225
Females										
Under 1 day	no.	79	57	48	28	18	6	3	3	240
1 day and under 1 week	no.	31	20	16	5	7	—	—	—	81
1 week and under 4 weeks	no.	27	16	15	4	3	3	3	—	70
4 weeks and under 1 year	no.	61	25	39	6	21	8	6	3	167

(a) Includes Other Territories.

(b) Does not include all Indigenous deaths—see table 6.34 and paragraph 10–15 of the Explanatory Notes.

6.3 DEATHS REGISTERED, States and territories, Selected years

	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(a)
					MALES				
1981	22 099	15 728	9 803	5 390	4 658	1 937	563	518	60 696
1986	22 571	16 021	10 006	5 556	5 250	1 825	425	556	62 210
1991	22 661	16 508	10 624	5 924	5 226	2 024	495	605	64 067
1996	23 765	17 009	12 151	6 061	5 978	2 052	487	698	68 206
1997	23 746	17 122	11 915	6 029	5 774	1 966	535	663	67 752
1998	23 520	16 407	12 235	6 095	5 750	1 889	527	646	67 073
1999	23 782	16 433	12 180	5 840	5 843	1 954	509	682	67 227
2000	23 445	16 368	12 023	6 121	5 718	1 926	571	642	66 817
2001	23 192	16 437	12 252	6 023	5 697	1 952	550	729	66 835
					FEMALES				
1981	18 015	13 360	7 234	4 331	3 337	1 427	269	334	48 307
1986	19 596	14 154	7 855	4 772	4 057	1 629	236	472	52 771
1991	19 806	14 708	8 551	5 252	4 302	1 662	307	491	55 079
1996	21 376	15 717	10 130	5 545	5 049	1 820	271	602	60 513
1997	21 895	16 139	10 030	5 629	5 033	1 843	356	671	61 598
1998	21 221	15 600	10 086	5 619	4 914	1 716	344	626	60 129
1999	21 433	15 485	10 669	5 451	5 034	1 829	323	649	60 875
2000	21 964	15 650	10 402	5 722	4 950	1 785	338	658	61 474
2001	21 360	15 858	10 604	5 868	5 082	1 924	322	690	61 709
					PERSONS				
1981	40 114	29 088	17 037	9 721	7 995	3 364	832	852	109 003
1986	42 167	30 175	17 861	10 328	9 307	3 454	661	1 028	114 981
1991	42 467	31 216	19 175	11 176	9 528	3 686	802	1 096	119 146
1996	45 141	32 726	22 281	11 606	11 027	3 872	758	1 300	128 719
1997	45 641	33 261	21 945	11 658	10 807	3 809	891	1 334	129 350
1998	44 741	32 007	22 321	11 714	10 664	3 605	871	1 272	127 202
1999	45 215	31 918	22 849	11 291	10 877	3 783	832	1 331	128 102
2000	45 409	32 018	22 425	11 843	10 668	3 711	909	1 300	128 291
2001	44 552	32 295	22 856	11 891	10 779	3 876	872	1 419	128 544

(a) Includes Other Territories.

6.4 STANDARDISED DEATH RATES, States and territories, Selected years

	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(a)
					MALES				
1981	11.3	10.9	11.0	10.6	10.5	12.0	21.1	12.6	11.1
1986	10.2	9.7	9.5	9.5	9.9	10.0	12.1	9.6	9.8
1991	8.9	8.8	8.6	8.9	8.3	10.0	13.4	8.1	8.9
1996	8.3	8.1	8.3	8.1	8.2	9.2	10.3	7.8	8.2
1997	8.0	7.9	7.8	7.8	7.7	8.6	11.5	7.1	7.9
1998	7.7	7.4	7.8	7.7	7.4	8.1	9.8	6.6	7.6
1999	7.6	7.1	7.5	7.2	7.3	8.2	9.6	6.5	7.4
2000	7.2	6.9	7.1	7.3	6.9	7.8	10.8	6.0	7.1
2001	6.8	6.6	6.9	7.0	6.6	7.6	9.5	6.2	6.8
					FEMALES				
1981	6.5	6.4	6.3	5.9	5.8	6.5	12.1	5.8	6.3
1986	6.1	5.8	5.7	5.6	5.7	6.5	8.2	6.2	5.9
1991	5.4	5.4	5.2	5.4	5.0	5.9	8.8	5.0	5.4
1996	5.0	4.9	5.0	4.9	4.9	5.6	6.8	4.9	5.0
1997	5.0	4.9	4.8	4.8	4.7	5.5	8.2	5.1	4.9
1998	4.7	4.6	4.7	4.7	4.5	5.0	7.8	4.6	4.7
1999	4.6	4.5	4.8	4.4	4.4	5.2	7.7	4.5	4.6
2000	4.6	4.4	4.5	4.5	4.3	4.9	7.0	4.4	4.5
2001	4.2	4.2	4.3	4.4	4.1	5.1	6.5	4.1	4.3
					PERSONS				
1981	8.5	8.3	8.4	7.9	7.9	8.9	16.8	8.4	8.4
1986	7.8	7.5	7.4	7.3	7.5	8.1	10.2	7.7	7.6
1991	7.0	6.9	6.7	6.9	6.5	7.7	11.1	6.3	6.9
1996	6.4	6.3	6.5	6.3	6.4	7.1	8.6	6.1	6.4
1997	6.3	6.2	6.2	6.1	6.0	6.8	9.9	6.0	6.3
1998	6.0	5.8	6.1	6.0	5.8	6.3	8.9	5.4	6.0
1999	5.9	5.7	6.0	5.7	5.7	6.5	8.7	5.4	5.9
2000	5.8	5.5	5.7	5.8	5.4	6.2	8.9	5.1	5.7
2001	5.4	5.3	5.5	5.5	5.2	6.2	8.1	5.1	5.4

(a) Includes Other Territories.

6.5 MORTALITY INDICATORS, Australia and selected countries

		Australia	*Canada*	*Germany*	*Greece*	*Hong Kong*	*Italy*	*Japan*	*Malaysia*	*Republic of Korea*	*New Zealand*	*United Kingdom*	*United States of America*
						MALES							
Crude death rate													
Reference year	year	2001	1995	1996	1997	1997	1994	1997	1997	1995	1996	1997	1995
Crude death rate	rate	6.9	7.6	10.2	10.2	5.5	10.3	6.5	5.1	6.1	8.1	10.4	9.1
Infant mortality rate													
Reference year	year	2001	1997	1997	n.a.	n.a.	1994	1998	1998	n.a.	n.a.	1997	1996
Infant mortality rate	rate	5.9	6.0	5.4	n.a.	n.a.	7.2	3.8	8.8	n.a.	n.a.	6.4	8.0
Expectation of life													
Reference	years	1999–2001	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)
Age 0	years	77.0	76.1	73.9	75.6	75.8	75.0	76.8	69.9	68.8	74.1	74.5	73.3
Age 1	years	76.5	75.6	73.4	75.2	75.3	74.5	76.2	69.8	68.5	73.6	74.1	72.9
Age 25	years	53.2	52.2	49.9	51.9	51.7	51.2	52.8	47.1	45.5	50.6	50.7	49.8
Age 45	years	34.5	33.4	31.1	33.1	32.6	32.1	33.7	28.7	27.2	31.9	31.6	31.7
Age 65	years	17.2	16.6	14.9	16.3	16.1	15.4	16.8	13.4	12.3	15.3	14.9	15.7
Age 85	years	5.6	5.9	4.8	5.1	5.7	4.9	5.3	4.8	3.6	5.1	5.0	5.3
Age-specific death rates(b)													
Reference year	year	2001	1995	1996	1997	1997	1994	1997	1997	1995	1996	1997	1995
0	rate	5.7	6.6	5.7	6.8	3.6	7.1	3.9	11.2	3.3	n.a.	6.3	8.4
1–4	rate	0.3	0.3	0.3	0.3	0.3	0.3	0.4	0.8	0.7	(c)1.9	0.3	0.4
5–9	rate	0.1	0.2	0.2	0.2	0.1	0.2	0.2	0.4	0.4	0.2	0.1	0.2
10–14	rate	0.2	0.2	0.2	0.2	0.2	0.2	0.1	0.5	0.4	0.3	0.2	0.3
15–19	rate	0.7	0.8	0.7	0.7	0.4	0.8	0.5	1.4	1.1	1.3	0.6	1.2
20–24	rate	1.0	1.0	1.0	1.1	0.8	0.9	0.6	1.7	1.2	1.5	0.9	1.6
25–29	rate	1.1	1.1	1.0	1.2	0.8	1.2	0.7	1.9	1.7	1.5	0.9	1.7
30–34	rate	1.2	1.3	1.2	1.2	0.8	1.7	0.8	2.3	2.1	1.4	1.0	2.3
35–39	rate	1.4	1.7	1.8	1.6	1.0	1.7	1.1	2.7	3.0	1.5	1.2	2.9
40–44	rate	1.7	2.2	2.8	2.2	1.8	2.1	1.7	3.5	4.6	1.7	2.0	3.8
45–49	rate	2.5	3.2	4.2	3.5	2.4	3.1	2.9	5.2	6.6	3.2	3.1	5.0
50–54	rate	3.6	5.1	6.8	5.6	4.3	5.5	4.7	8.6	10.2	5.4	5.1	7.3
55–59	rate	6.3	8.4	10.4	8.2	7.1	8.9	7.2	13.5	14.3	9.1	9.0	11.1
60–64	rate	10.4	14.1	17.3	12.8	12.3	15.2	12.0	23.0	20.6	15.7	14.9	17.7
65–69	rate	17.2	23.3	27.8	21.4	20.5	25.0	19.2	36.6	34.0	24.6	25.8	26.5
70–74	rate	29.0	36.8	42.8	34.9	32.9	39.1	29.1	57.9	55.3	40.2	43.4	40.3
75–79	rate	48.5	59.3	67.0	55.9	50.5	63.5	50.1	(d)119.0	92.4	64.0	67.9	60.4
80–84	rate	80.3	94.8	115.2	103.4	76.8	100.3	86.5	n.a.	(e)269.1	104.8	110.3	96.3
85 and over	rate	160.3	171.8	201.1	n.a.	123.3	183.2	n.a.	n.a.	n.a.	203.6	n.a.	179.8

Source: *United Nations Demographic Yearbook, 1999* (for all countries apart from Australia)

(a) United Nations projection data, unpublished.

(b) Number of deaths per 1,000 population.

(c) Includes age 0.

(d) Aged 75 years and over.

(e) Aged 80 years and over.

6.5 MORTALITY INDICATORS, Australia and selected countries *continued*

		Australia	*Canada*	*Germany*	*Greece*	*Hong Kong*	*Italy*	*Japan*	*Malaysia*	*Republic of Korea*	*New Zealand*	*United Kingdom*	*United States of America*
							FEMALES						
Crude death rate													
Reference year	year	2001	1995	1996	1997	1997	1994	1997	1997	1995	1996	1997	1995
Crude death rate	rate	6.3	6.6	11.3	8.9	4.2	9.2	8.1	3.8	4.7	7.5	11.0	8.5
Infant mortality rate													
Reference year	year	2001	1997	1997	n.a.	n.a.	1994	1998	1998	n.a.	n.a.	1997	1996
Infant mortality rate	rate	4.6	5.0	4.3	n.a.	n.a.	5.9	3.4	7.3	n.a.	n.a.	5.3	6.6
Expectation of life													
Reference period	year	1999–2001	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)	1995–2000(a)
Age 0	years	82.4	81.8	80.2	80.7	81.4	81.2	82.9	74.3	76.0	79.7	79.8	80.1
Age 1	years	81.8	81.3	79.6	80.3	80.8	80.8	82.3	74.0	75.8	79.3	79.3	79.6
Age 25	years	58.2	57.6	56.0	56.6	57.2	57.2	58.6	50.7	52.6	55.8	55.6	56.0
Age 45	years	38.8	38.2	36.6	37.1	37.7	37.7	39.2	31.7	33.7	36.5	36.2	36.9
Age 65	years	20.7	20.5	18.8	18.7	19.8	19.6	20.9	14.9	16.5	19.2	18.8	19.5
Age 85	years	6.8	7.3	5.8	5.3	7.2	6.2	6.7	4.9	5.0	6.6	6.6	6.8
Age-specific death rates (b)													
Reference year	year	2001	1995	1996	1997	1997	1994	1997	1997	1995	1996	1997	1995
0	rate	4.5	5.5	4.4	6.2	3.3	5.8	3.4	8.6	2.6	n.a.	5.2	6.9
1–4	rate	0.2	0.2	0.3	0.3	0.2	0.3	0.3	0.7	0.7	(c)1.7	0.2	0.4
5–9	rate	0.1	0.1	0.1	0.2	0.1	0.2	0.1	0.3	0.3	0.2	0.1	0.2
10–14	rate	0.1	0.2	0.1	0.2	0.1	0.1	0.1	0.3	0.2	0.3	0.1	0.2
15–19	rate	0.2	0.3	0.3	0.3	0.2	0.2	0.2	0.5	0.5	0.7	0.3	0.5
20–24	rate	0.4	0.3	0.3	0.3	0.2	0.3	0.3	0.5	0.6	0.5	0.3	0.5
25–29	rate	0.4	0.4	0.4	0.3	0.4	0.4	0.3	0.6	0.7	0.5	0.4	0.6
30–34	rate	0.5	0.5	0.5	0.5	0.3	0.6	0.4	0.9	0.8	0.7	0.5	0.9
35–39	rate	0.7	0.8	0.9	0.6	0.5	0.7	0.6	1.3	1.1	0.8	0.8	1.3
40–44	rate	1.1	1.2	1.4	1.1	0.9	1.0	1.0	1.8	1.6	1.1	1.3	1.8
45–49	rate	1.5	2.0	2.3	1.5	1.3	1.7	1.6	3.1	2.3	2.5	2.1	2.6
50–54	rate	2.4	3.1	3.4	2.3	2.3	2.7	2.3	4.9	3.8	3.7	3.3	4.1
55–59	rate	3.8	5.1	4.8	3.6	3.6	4.1	3.2	8.3	5.6	5.7	5.4	6.6
60–64	rate	5.6	7.7	7.8	5.7	5.9	6.6	5.1	14.5	8.7	9.9	9.0	10.4
65–69	rate	9.5	12.7	13.2	10.9	9.7	11.1	7.9	25.7	15.7	14.9	15.3	15.7
70–74	rate	16.8	20.1	22.8	20.3	17.7	19.9	13.3	42.6	29.2	23.4	26.2	24.4
75–79	rate	28.3	33.5	39.3	38.7	30.4	36.8	24.9	(d)98.8	54.9	39.2	42.2	38.2
80–84	rate	52.7	59.0	76.7	85.6	51.0	66.5	48.2	n.a.	(e)223.5	71.2	73.1	63.6
85 and over	rate	129.8	136.4	166.6	n.a.	109.9	155.6	n.a.	n.a.	n.a.	157.4	n.a.	144.9

Source: United Nations *Demographic Yearbook, 1999* (for all countries apart from Australia)

(a) United Nations projection data, unpublished.

(b) Number of deaths per 1,000 population.

(c) Includes age 0.

(d) Aged 75 years and over.

(e) Aged 80 years and over.

6.6 DEATHS, Regional patterns of mortality

Statistical Division	*Deaths 2001(a)* no.	*Estimated resident population(b)* no.	*Crude death rate(c)* rate	*Indirect standardised death rate(d)* rate	*Life expectancy at birth, male(e)* years	*Life expectancy at birth, female(e)* years	*SEIFA index of disadvantage(f)* index
New South Wales							
Sydney	25 000	4 154 722	6.2	5.5	77.8	82.8	1 028
Hunter	4 758	591 361	8.0	6.0	76.3	82.2	970
Illawarra	2 918	402 169	7.3	5.7	76.9	82.6	979
Richmond-Tweed	1 737	216 717	8.0	5.3	77.2	82.7	960
Mid-North Coast	2 535	280 987	8.9	5.8	76.3	82.2	947
Northern	1 463	180 576	8.0	6.4	75.2	81.8	978
North-Western	928	119 663	7.9	7.0	74.7	79.9	952
Central West	1 391	177 983	8.1	6.4	75.6	81.3	982
South-Eastern	1 476	194 438	7.7	6.0	76.2	81.8	1 001
Murrumbidgee	1 091	152 854	7.4	6.2	76.5	81.9	989
Murray	868	113 344	7.8	5.9	76.3	82.1	994
Far West	232	24 490	9.8	6.7	74.5	79.7	919
Total(g)	*44 552*	*6 609 304*	*6.9*	*5.7*	*76.9*	*82.4*	*1 007*
Victoria							
Melbourne	21 679	3 488 750	6.3	5.4	78.1	82.9	1 026
Barwon	1 994	255 299	7.6	5.6	77.3	82.5	996
Western District	903	100 361	8.6	6.0	75.9	81.9	1 001
Central Highlands	1 049	141 723	7.9	6.1	76.8	81.9	990
Wimmera	525	51 339	10.0	6.0	76.3	81.2	1 006
Mallee	675	90 064	7.8	5.7	76.6	82.0	982
Loddon	1 270	167 089	7.8	5.9	76.9	82.1	1 000
Goulburn	1 436	194 279	7.5	5.7	76.8	82.7	992
Ovens-Murray	669	92 962	7.4	5.9	76.6	82.2	1 007
East Gippsland	726	80 843	8.8	6.3	75.6	82.0	985
Gippsland	1 312	159 954	8.0	6.1	76.0	82.3	984
Total(g)	*32 295*	*4 822 663*	*6.7*	*5.5*	*77.5*	*82.7*	*1 016*
Queensland							
Brisbane	9 821	1 653 365	6.0	5.7	77.4	82.5	1 012
Moreton	4 753	726 382	6.7	5.2	77.9	83.3	981
Wide Bay-Burnett	1 889	236 864	7.8	5.7	76.7	81.8	926
Darling Downs	1 549	210 349	7.4	6.0	76.6	81.8	983
South-West	181	26 927	7.0	7.2	73.9	80.7	961
Fitzroy	1 050	181 582	5.9	6.2	75.9	81.4	972
Central West	83	12 489	7.0	6.9	n.p.	n.p.	968
Mackay	775	137 561	4.7	6.1	76.3	82.3	977
Northern	1 087	190 784	6.6	6.5	75.7	81.6	990
Far North	1 347	222 868	5.8	6.5	75.2	80.8	977
North-West	196	35 950	5.2	8.8	71.4	78.1	940
Total(g)	*22 856*	*3 635 121*	*6.4*	*5.8*	*76.9*	*82.3*	*988*

(a) Deaths recoded to 2001 Statistical Division (SD) boundaries.

(b) 30 June 2001 revised.

(c) Per 1,000 population. Average crude death rate 1999–2001.

(d) Per 1,000 population. Average indirect standardised death rate 1999–2001.

(e) 1999–2001, see Explanatory Notes 28–29.

(f) Socioeconomic Indexes for Areas as defined from the 1996 Census of Population and Housing. Recoded to 2001 Statistical Division boundaries for consistency.

(g) Includes not stated, no fixed abode and overseas residents. State and territory life expectancy at birth are from table 6.2. See Explanatory Notes 22–27.

6.6 DEATHS, Regional patterns of mortality *continued*

Statistical Division	Deaths 2001(a)	Estimated resident population(b)	Crude death rate(c)	Indirect standardised death rate(d)	Life expectancy at birth, male(e)	Life expectancy at birth, female(e)	SEIFA index of disadvantage(f)
	no.	no.	rate	rate	years	years	index
South Australia							
Adelaide	8 734	1 110 547	7.7	5.6	77.5	82.7	992
Outer Adelaide	757	114 257	6.7	5.2	78.4	82.8	1 001
Yorke and Lower North	474	44 499	10.7	6.4	76.3	81.4	956
Murray Lands	595	68 614	8.4	6.3	75.2	81.5	940
South-East	432	62 694	7.1	5.9	76.7	82.5	977
Eyre	261	33 989	7.7	6.1	75.8	81.1	963
Northern	617	80 254	7.4	6.6	74.9	81.1	929
Total(g)	*11 891*	*1 514 854*	*7.7*	*5.7*	*77.0*	*82.5*	*984*
Western Australia							
Perth	7 903	1 397 048	5.7	5.3	78.0	83.2	1 019
South-West	1 205	194 907	6.3	5.4	77.8	82.9	966
Lower Great Southern	341	53 426	6.4	5.3	77.3	82.5	982
Upper Great Southern	163	18 737	7.3	6.3	n.p.	n.p.	1 004
Midlands	303	53 670	5.4	5.1	77.1	82.8	979
South-Eastern	273	55 255	4.9	7.5	73.5	79.8	980
Central	303	60 695	5.4	6.1	74.5	81.5	963
Pilbara	97	39 676	2.5	7.1	n.p.	n.p.	994
Kimberley	128	32 700	4.9	10.2	69.8	77.7	906
Total(g)	*10 779*	*1 906 114*	*5.7*	*5.5*	*77.3*	*82.8*	*1 006*
Tasmania							
Greater Hobart	1 608	197 816	7.9	6.1	76.4	81.2	1 000
Southern	219	34 664	6.6	6.1	75.9	80.2	942
Northern	1 148	133 424	8.5	6.5	75.6	80.6	967
Mersey-Lyell	884	107 027	8.0	6.4	75.4	80.8	945
Total(g)	*3 876*	*472 931*	*8.0*	*6.3*	*76.0*	*81.2*	*974*
Northern Territory							
Darwin	362	108 191	3.0	7.1	74.0	79.1	1 030
Northern Territory- Balance	477	91 828	5.8	12.4	68.3	73.2	882
Total(g)	*872*	*200 019*	*4.4*	*9.7*	*70.8*	*76.5*	*962*
Australian Capital Territory							
Canberra	1 412	321 307	4.2	5.1	78.9	83.0	1 092
Total(g)	*1 419*	*321 680*	*4.3*	*5.1*	*78.5*	*82.9*	*1 091*
Australia	**128 544**	**19 485 278**	**6.7**	**5.7**	**77.0**	**82.4**	**1 000**

(a) Deaths recoded to 2001 Statistical Division boundaries.

(b) 30 June 2001 revised.

(c) Per 1,000 population. Average crude death rate 1999–2001.

(d) Per 1,000 population. Average indirect standardised death rate 1999–2001.

(e) 1999–2001, see Explanatory Notes 28–29.

(f) Socioeconomic Indexes for Areas as defined from the 1996 Census of Population and Housing. Recoded to 2001 Statistical Division boundaries for consistency.

(g) Includes not stated, no fixed abode or overseas residents. State and territory life expectancy at birth are from table 6.2. See Explanatory Notes 22–29.

6.7 STATE OR TERRITORY OF USUAL RESIDENCE, State or territory of registration

State or Territory of usual residence	STATE OR TERRITORY OF REGISTRATION								
	NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.*
New South Wales	43 727	182	371	40	8	10	5	209	44 552
Victoria	138	32 018	58	45	11	12	5	8	32 295
Queensland	207	47	22 570	6	12	—	9	4	22 856
South Australia	18	42	19	11 793	4	3	11	3	11 891
Western Australia	8	13	7	6	10 734	3	8	—	10 779
Tasmania	12	20	3	—	—	3 839	—	—	3 876
Northern Territory	3	3	10	42	5	—	808	—	872
Australian Capital Territory	50	4	5	—	—	—	—	1 360	1 419
Australia(a)	**44 162**	**32 329**	**23 043**	**11 932**	**10 779**	**3 866**	**847**	**1 586**	**128 544**

(a) Includes Other Territories.

6.8 DEATHS REGISTERED IN 2001, Year of occurrence(a), Selected years

Year of occurrence	STATE OR TERRITORY OF REGISTRATION								
	NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.*
Before 1996	5	21	—	—	3	—	—	—	32
1996	—	3	3	—	—	—	3	—	5
1997	—	—	—	—	3	—	—	—	6
1998	—	3	4	4	7	—	3	—	18
1999	9	4	11	4	7	—	6	—	41
2000	1 695	1 498	1 523	520	347	194	78	91	5 946
2001	42 447	30 801	21 502	11 402	10 413	3 672	761	1 495	122 493
Total(b)	**44 162**	**32 329**	**23 043**	**11 932**	**10 779**	**3 866**	**847**	**1 586**	**128 544**

(a) See paragraph 2 of the Explanatory Notes.

(b) Includes year of occurrence not available.

6.9 DEATHS, Year of occurrence(a), Selected years

STATE OR TERRITORY OF USUAL RESIDENCE

Year of occurrence	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.(b)*
				MALES					
1981	22 256	15 822	9 938	5 357	4 693	1 911	403	523	60 903
1986	22 278	16 192	9 902	5 592	5 187	1 822	441	548	61 962
1991	22 658	16 365	10 549	5 903	5 099	1 986	468	619	63 647
1996	23 641	17 105	12 047	6 054	5 910	2 025	519	696	68 001
1997	23 689	16 741	12 007	6 021	5 805	1 977	500	650	67 392
1998	23 521	16 516	12 155	6 127	5 776	1 924	519	641	67 183
1999	23 776	16 421	12 130	5 866	5 860	1 934	538	685	67 214
2000	23 611	16 451	12 116	6 098	5 649	1 907	565	657	67 058
				FEMALES					
1981	18 294	13 426	7 306	4 312	3 344	1 409	199	333	48 623
1986	19 298	14 158	7 818	4 815	3 963	1 621	254	464	52 391
1991	19 894	14 595	8 530	5 236	4 207	1 647	304	503	54 916
1996	21 306	15 722	10 005	5 535	5 022	1 803	301	589	60 286
1997	21 752	16 024	10 049	5 623	5 042	1 857	334	689	61 373
1998	21 253	15 549	10 140	5 643	4 929	1 775	341	608	60 240
1999	21 439	15 560	10 594	5 472	5 069	1 787	328	653	60 906
2000	22 071	15 767	10 483	5 730	4 876	1 805	324	667	61 726
				PERSONS					
1981	40 550	29 248	17 244	9 669	8 037	3 320	602	856	109 526
1986	41 576	30 350	17 720	10 407	9 150	3 443	695	1 012	114 353
1991	42 552	30 960	19 079	11 139	9 306	3 633	772	1 122	118 563
1996	44 947	32 827	22 052	11 589	10 932	3 828	820	1 285	128 287
1997	45 441	32 765	22 056	11 644	10 847	3 834	834	1 339	128 765
1998	44 774	32 065	22 295	11 770	10 705	3 699	860	1 249	127 423
1999	45 215	31 981	22 724	11 338	10 929	3 721	866	1 338	128 120
2000	45 682	32 218	22 599	11 828	10 525	3 712	889	1 324	128 784

(a) Based on deaths registered to 31 December 2001. See paragraph 2 of the Explanatory Notes for further information.

(b) Includes Other Territories.

6.10 DEATHS, Age, Selected years

Age group (years)	*1981*	*1986*	*1991*	*1996*	*1997*	*1998*	*1999*	*2000*	*2001*
					MALES				
0	1 354	1 244	1 049	843	744	706	812	725	751
1–4	283	267	195	205	206	199	164	156	147
5–9	222	151	129	115	99	102	95	100	98
10–14	194	196	138	147	133	126	112	121	114
15–19	822	730	617	541	572	506	547	501	457
20–24	1 008	1 042	907	866	857	870	841	700	665
25–29	827	893	891	876	938	992	1 027	920	759
30–34	764	840	947	1 019	950	1 067	976	932	882
35–39	834	920	1 067	1 125	1 078	1 137	1 066	1 117	1 014
40–44	1 117	1 181	1 294	1 324	1 321	1 311	1 302	1 342	1 266
45–49	1 715	1 519	1 646	1 757	1 718	1 628	1 664	1 619	1 692
50–54	3 124	2 359	2 244	2 281	2 416	2 354	2 386	2 417	2 357
55–59	4 789	4 116	3 252	3 051	3 044	3 054	3 102	3 055	3 235
60–64	5 786	6 307	5 659	4 636	4 581	4 351	4 166	4 082	4 280
65–69	8 081	7 535	7 969	7 349	7 078	6 677	6 305	5 922	5 745
70–74	9 144	9 497	8 973	9 987	9 818	9 590	9 573	9 120	8 825
75–79	8 514	9 566	10 409	10 474	10 583	10 754	11 167	11 233	11 083
80–84	6 305	7 334	8 904	10 664	10 476	10 221	9 809	10 028	10 312
85–89	3 686	4 275	5 105	7 089	7 193	7 357	7 806	8 061	8 406
90–94	1 686	1 718	2 086	3 035	3 100	3 235	3 425	3 688	3 707
95–99	371	453	487	718	735	758	786	855	921
100 and over	40	52	92	90	105	71	87	105	106
Not stated	30	15	7	14	7	7	9	18	13
Total	**60 696**	**62 210**	**64 067**	**68 206**	**67 752**	**67 073**	**67 227**	**66 817**	**66 835**
					FEMALES				
0	993	910	787	617	597	546	596	565	558
1–4	210	202	148	146	121	148	129	112	112
5–9	114	104	89	73	86	61	72	74	65
10–14	127	102	90	106	81	87	89	78	66
15–19	284	273	245	184	221	237	215	216	158
20–24	305	353	309	228	284	258	269	247	230
25–29	310	327	373	296	320	308	315	324	255
30–34	343	360	386	364	431	374	406	374	351
35–39	422	477	509	556	553	574	531	570	524
40–44	580	666	707	713	746	760	787	738	788
45–49	950	887	940	1 059	1 072	1 059	1 085	1 060	1 023
50–54	1 432	1 270	1 270	1 380	1 457	1 507	1 390	1 484	1 537
55–59	2 286	2 124	1 736	1 823	1 813	1 715	1 727	1 874	1 889
60–64	3 121	3 248	2 949	2 518	2 484	2 420	2 377	2 294	2 321
65–69	4 487	4 586	4 583	4 024	3 990	3 633	3 440	3 441	3 301
70–74	5 752	6 541	6 172	6 301	6 294	5 994	5 879	5 637	5 634
75–79	6 835	7 874	8 562	8 480	8 304	8 427	8 567	8 330	8 304
80–84	7 754	8 442	9 433	11 013	11 174	10 785	10 561	10 390	10 676
85–89	6 857	7 581	8 244	10 632	11 183	10 886	11 641	12 056	12 000
90–94	3 804	4 666	5 350	6 934	7 142	7 106	7 563	8 061	8 310
95–99	1 165	1 523	1 839	2 587	2 696	2 698	2 706	2 942	3 008
100 and over	169	253	357	476	545	545	528	605	596
Not stated	7	3	—	3	4	—	—	3	3
Total	**48 307**	**52 771**	**55 079**	**60 513**	**61 598**	**60 129**	**60 875**	**61 474**	**61 709**

6.11 AGE-SPECIFIC DEATH RATES(a), Selected years

Age group (years)	*1981*	*1986*	*1991*	*1996*	*1997*	*1998*	*1999*	*2000*	*2001*
				MALES					
0	11.5	10.2	7.9	6.4	5.7	5.5	6.4	5.7	5.7
1–4	0.6	0.5	0.4	0.4	0.4	0.4	0.3	0.3	0.3
5–9	0.3	0.2	0.2	0.2	0.1	0.2	0.1	0.1	0.1
10–14	0.3	0.3	0.2	0.2	0.2	0.2	0.2	0.2	0.2
15–19	1.2	1.1	0.9	0.8	0.9	0.8	0.8	0.7	0.7
20–24	1.5	1.5	1.3	1.2	1.2	1.3	1.2	1.0	1.0
25–29	1.3	1.3	1.3	1.2	1.3	1.3	1.4	1.2	1.1
30–34	1.2	1.3	1.3	1.4	1.3	1.5	1.4	1.3	1.2
35–39	1.7	1.4	1.6	1.5	1.5	1.5	1.4	1.5	1.4
40–44	2.6	2.3	2.0	2.0	1.9	1.9	1.8	1.9	1.7
45–49	4.5	3.5	3.1	2.7	2.6	2.5	2.5	2.4	2.5
50–54	7.9	6.3	5.2	4.4	4.3	4.0	3.9	3.8	3.6
55–59	12.9	10.7	8.9	7.3	7.0	6.8	6.7	6.3	6.3
60–64	19.8	17.9	15.4	13.1	12.7	11.8	11.0	10.4	10.4
65–69	32.3	28.3	24.9	21.8	21.0	20.0	19.0	17.9	17.2
70–74	52.0	45.4	39.3	36.2	34.9	33.5	33.0	31.0	29.0
75–79	80.2	72.1	65.5	58.3	55.7	53.6	52.6	51.6	48.5
80–84	121.2	110.6	105.5	100.8	96.6	92.9	88.3	85.0	80.3
85 and over	208.2	187.3	175.7	181.3	174.0	167.2	166.1	165.3	160.3
				FEMALES					
0	8.8	7.8	6.2	5.0	4.9	4.5	4.9	4.7	4.5
1–4	0.5	0.4	0.3	0.3	0.2	0.3	0.3	0.2	0.2
5–9	0.2	0.2	0.1	0.1	0.1	0.1	0.1	0.1	0.1
10–14	0.2	0.2	0.1	0.2	0.1	0.1	0.1	0.1	0.1
15–19	0.4	0.4	0.4	0.3	0.4	0.4	0.3	0.3	0.2
20–24	0.5	0.5	0.4	0.3	0.4	0.4	0.4	0.4	0.4
25–29	0.5	0.5	0.5	0.4	0.4	0.4	0.4	0.4	0.4
30–34	0.6	0.6	0.5	0.5	0.6	0.5	0.6	0.5	0.5
35–39	0.9	0.8	0.8	0.8	0.7	0.8	0.7	0.8	0.7
40–44	1.4	1.3	1.1	1.1	1.1	1.1	1.1	1.0	1.1
45–49	2.7	2.2	1.9	1.7	1.7	1.6	1.6	1.6	1.5
50–54	3.8	3.5	3.1	2.8	2.7	2.6	2.3	2.4	2.4
55–59	6.2	5.7	4.8	4.5	4.3	4.0	3.8	4.0	3.8
60–64	9.7	8.8	8.0	7.1	6.8	6.5	6.3	5.9	5.6
65–69	15.7	15.1	13.0	11.3	11.3	10.4	9.9	10.0	9.5
70–74	25.5	24.8	21.9	19.3	19.2	18.2	17.8	17.0	16.8
75–79	44.3	41.1	38.0	34.8	32.5	31.5	30.4	29.1	28.3
80–84	76.0	71.1	64.9	62.4	62.4	59.9	59.1	55.7	52.7
85 and over	160.4	148.3	143.5	145.7	144.6	136.1	136.1	137.9	129.8

(a) Per 1,000 population.

6.12 DEATHS, Age, States and territories

Age group (years)	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(a)
				MALES					
0	251	166	164	36	73	22	30	9	751
1–4	43	22	39	8	27	3	4	—	147
5–9	35	19	19	6	12	4	—	—	98
10–14	32	20	35	9	13	—	—	3	114
15–19	139	101	106	26	56	13	12	4	457
20–24	200	142	148	48	80	14	20	13	665
25–29	232	167	167	52	90	15	18	18	759
30–34	285	197	151	75	86	31	42	15	882
35–39	320	239	181	101	107	19	37	10	1 014
40–44	413	279	268	97	125	32	34	18	1 266
45–49	582	356	344	131	168	55	34	22	1 692
50–54	804	549	496	183	183	63	35	44	2 357
55–59	1 120	710	638	272	288	101	52	53	3 235
60–64	1 498	1 015	849	337	369	121	44	47	4 280
65–69	2 022	1 406	1 093	435	508	166	48	67	5 745
70–74	3 165	2 207	1 525	847	698	258	46	79	8 825
75–79	3 957	2 805	1 936	1 046	911	298	36	94	11 083
80–84	3 636	2 612	1 802	994	779	350	29	108	10 312
85–89	2 875	2 150	1 435	872	710	253	21	90	8 406
90–94	1 244	999	684	326	324	104	3	23	3 707
95–99	299	240	152	106	87	24	3	10	921
100 and over	34	31	20	16	3	3	—	—	106
Not stated	6	5	—	—	—	—	—	—	13
Total	**23 192**	**16 437**	**12 252**	**6 023**	**5 697**	**1 952**	**550**	**729**	**66 835**
				FEMALES					
0	198	118	118	43	49	18	11	3	558
1–4	41	26	20	8	9	—	7	—	112
5–9	17	13	16	9	5	3	—	3	65
10–14	24	18	15	3	3	—	4	—	66
15–19	62	30	30	8	15	8	3	3	158
20–24	71	52	48	13	29	4	9	4	230
25–29	71	65	44	25	36	3	5	6	255
30–34	100	100	70	21	38	7	10	5	351
35–39	164	121	102	52	61	9	11	4	524
40–44	259	157	162	74	80	27	21	8	788
45–49	292	268	220	87	87	30	22	17	1 023
50–54	507	386	278	112	148	56	22	28	1 537
55–59	620	460	372	161	151	66	29	30	1 889
60–64	830	550	420	192	188	75	24	41	2 321
65–69	1 202	791	604	283	257	104	26	34	3 301
70–74	1 958	1 463	978	509	459	194	21	52	5 634
75–79	2 929	2 201	1 329	790	672	278	28	77	8 304
80–84	3 770	2 651	1 791	1 141	835	329	31	128	10 676
85–89	4 192	3 115	1 994	1 190	971	379	21	138	12 000
90–94	2 851	2 244	1 410	815	672	233	11	74	8 310
95–99	1 021	838	480	277	270	86	6	30	3 008
100 and over	181	190	103	56	46	14	—	6	596
Not stated	—	—	—	—	—	3	—	—	3
Total	**21 360**	**15 858**	**10 604**	**5 868**	**5 082**	**1 924**	**322**	**690**	**61 709**

(a) Includes Other Territories.

6.13 AGE-SPECIFIC DEATH RATES(a), States and territories

Age group (years)	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.(b)*
				MALES					
0	5.5	5.3	6.4	3.9	5.7	6.5	16.2	4.2	5.7
1–4	0.2	0.2	0.4	0.2	0.5	0.2	0.6	0.1	0.3
5–9	0.1	0.1	0.1	0.1	0.2	0.2	0.1	0.2	0.1
10–14	0.1	0.1	0.3	0.2	0.2	0.1	0.1	0.2	0.2
15–19	0.6	0.6	0.8	0.5	0.8	0.7	1.5	0.3	0.7
20–24	0.9	0.9	1.2	1.0	1.2	1.0	2.3	1.0	1.0
25–29	1.0	1.0	1.3	1.0	1.3	1.1	1.9	1.4	1.1
30–34	1.2	1.1	1.1	1.4	1.2	2.0	4.4	1.2	1.2
35–39	1.3	1.3	1.3	1.8	1.4	1.1	4.1	0.8	1.4
40–44	1.7	1.5	2.0	1.7	1.7	1.8	4.2	1.5	1.7
45–49	2.6	2.1	2.7	2.4	2.4	3.2	4.7	1.9	2.5
50–54	3.7	3.5	4.0	3.5	2.8	3.8	5.3	3.8	3.6
55–59	6.4	5.7	6.5	6.7	5.8	7.7	11.6	6.6	6.3
60–64	10.6	10.0	10.9	10.2	9.5	11.0	14.5	8.4	10.4
65–69	17.3	16.8	18.0	15.5	16.7	18.6	28.8	16.4	17.2
70–74	29.5	28.5	28.5	31.3	26.2	32.0	38.9	23.2	29.0
75–79	49.0	48.3	48.3	49.9	47.1	48.8	58.8	36.4	48.5
80–84	79.6	81.1	78.2	81.7	75.1	105.2	116.5	80.1	80.3
85 and over	158.6	158.6	159.4	171.7	158.7	174.9	114.4	165.5	160.3
				FEMALES					
0	4.6	4.0	4.9	4.9	4.0	5.7	6.3	1.4	4.5
1–4	0.2	0.2	0.2	0.2	0.2	—	1.0	0.1	0.2
5–9	0.1	0.1	0.1	0.2	0.1	0.2	—	0.2	0.1
10–14	0.1	0.1	0.1	—	—	—	0.5	—	0.1
15–19	0.3	0.2	0.2	0.2	0.2	0.5	0.4	0.2	0.2
20–24	0.3	0.3	0.4	0.3	0.5	0.3	1.2	0.3	0.4
25–29	0.3	0.4	0.3	0.5	0.5	0.2	0.5	0.5	0.4
30–34	0.4	0.5	0.5	0.4	0.5	0.4	1.1	0.4	0.5
35–39	0.6	0.6	0.7	0.9	0.8	0.5	1.3	0.3	0.7
40–44	1.0	0.8	1.2	1.3	1.1	1.5	2.8	0.6	1.1
45–49	1.3	1.6	1.7	1.6	1.2	1.8	3.3	1.4	1.5
50–54	2.3	2.4	2.3	2.1	2.3	3.4	3.9	2.4	2.4
55–59	3.6	3.7	3.9	3.9	3.3	5.1	8.3	3.7	3.8
60–64	5.8	5.3	5.6	5.6	4.9	6.8	10.9	7.2	5.6
65–69	9.8	8.8	10.0	9.5	8.2	11.2	19.4	7.9	9.5
70–74	16.5	16.9	17.1	16.9	16.2	22.3	22.2	13.8	16.8
75–79	28.1	28.9	27.1	28.5	28.2	35.6	46.0	23.0	28.3
80–84	51.9	51.1	52.0	59.3	51.1	59.2	76.0	59.5	52.7
85 and over	127.6	131.5	131.7	132.0	122.1	145.2	124.6	139.2	129.8

(a) Per 1,000 population.

(b) Includes Other Territories.

6.14 DEATHS, Age, Marital status

	MALES						FEMALES					
Age group (years)	Never married	Married	Widowed	Divorced	Not stated(a)	Total	Never married	Married	Widowed	Divorced	Not stated(a)	Total
0	751	—	—	—	—	751	558	—	—	—	—	558
1–4	147	—	—	—	—	147	112	—	—	—	—	112
5–9	98	—	—	—	—	98	65	—	—	—	—	65
10–14	114	—	—	—	—	114	66	—	—	—	—	66
15–19	372	3	—	—	84	457	107	—	—	—	50	158
20–24	627	11	—	—	27	665	192	20	—	3	16	230
25–29	596	102	—	9	52	759	162	63	3	11	17	255
30–34	542	238	—	50	51	882	165	136	—	25	23	351
35–39	486	363	7	100	58	1 014	160	266	5	63	30	524
40–44	456	545	8	181	76	1 266	184	445	11	120	28	788
45–49	412	871	16	302	91	1 692	177	599	34	178	35	1 023
50–54	446	1 395	42	392	82	2 357	171	979	76	273	38	1 537
55–59	493	1 971	96	550	125	3 235	156	1 212	159	314	48	1 889
60–64	558	2 754	178	629	161	4 280	198	1 394	352	325	52	2 321
65–69	681	3 783	414	699	168	5 745	206	1 790	857	390	58	3 301
70–74	881	5 887	1 071	797	189	8 825	282	2 464	2 338	488	62	5 634
75–79	926	7 150	2 107	707	193	11 083	468	2 753	4 566	449	68	8 304
80–84	714	6 152	2 884	438	124	10 312	576	2 265	7 280	463	92	10 676
85–89	455	4 305	3 325	232	89	8 406	727	1 461	9 406	331	75	12 000
90–94	196	1 395	1 991	83	42	3 707	603	462	7 035	165	45	8 310
95–99	40	238	625	12	6	921	236	58	2 644	54	16	3 008
100 and over	4	18	82	—	—	106	62	3	521	8	3	596
Not stated	—	—	—	3	10	13	—	—	—	—	—	3
Total	**9 996**	**37 179**	**12 847**	**5 185**	**1 628**	**66 835**	**5 634**	**16 370**	**35 289**	**3 659**	**757**	**61 709**

(a) Includes de facto as only some states and territories include this category as an option on the death certificate.

6.15 AGE-SPECIFIC DEATH RATES(a), Marital status, 2000(b)

	MALES					*FEMALES*				
Age group (years)	*Never married*	*Married*	*Widowed*	*Divorced*	*Total*	*Never married*	*Married*	*Widowed*	*Divorced*	*Total*
0	5.7	—	—	—	5.7	4.7	—	—	—	4.7
1–4	0.3	—	—	—	0.3	0.2	—	—	—	0.2
5–9	0.1	—	—	—	0.1	0.1	—	—	—	0.1
10–14	0.2	—	—	—	0.2	0.1	—	—	—	0.1
15–19	0.7	2.9	—	—	0.7	0.3	0.7	—	—	0.3
20–24	1.0	0.7	—	—	1.0	0.4	0.2	—	—	0.4
25–29	1.5	0.5	1.9	1.3	1.2	0.6	0.2	0.8	0.3	0.4
30–34	2.2	0.6	1.0	1.4	1.3	0.9	0.4	0.7	0.7	0.5
35–39	3.3	0.8	2.3	1.8	1.5	1.5	0.6	1.1	0.8	0.8
40–44	4.5	1.2	2.2	2.6	1.9	2.2	0.8	0.9	1.4	1.0
45–49	6.2	1.7	4.3	3.4	2.4	3.1	1.4	2.8	1.7	1.6
50–54	9.4	3.0	6.3	5.4	3.8	5.3	2.0	3.0	3.4	2.4
55–59	15.0	4.9	10.8	9.8	6.3	9.5	3.4	5.3	4.5	4.0
60–64	23.4	8.7	14.9	15.0	10.4	13.1	5.0	8.0	6.6	5.9
65–69	34.3	15.6	25.1	24.3	17.9	17.5	8.3	12.3	12.9	10.0
70–74	54.3	27.3	41.1	40.0	31.0	24.5	14.7	19.1	20.6	17.1
75–79	79.3	46.1	63.4	64.0	51.4	38.3	24.1	31.9	32.6	29.1
80–84	125.2	78.0	95.2	91.5	85.2	70.9	46.2	58.3	60.9	55.9
85 and over	177.1	141.8	185.6	170.4	162.1	158.6	91.1	140.5	164.7	136.1

(a) Per 1,000 population.

(b) As ERP by marital status for 2001 are not yet available, age-specific death rates by marital status are not provided. Data for 2000 have been reproduced from the 2000 issue of this publication.

6.16 DEATHS, Selected countries of birth, Males(a)

		Australia	*China*	*Germany*	*Greece*	*India*	*Indonesia*	*Italy*
Deaths	no.	45 873	413	698	731	287	96	2 104
Population(b)	'000	7 266.4	81.0	59.1	71.7	59.7	33.0	128.4
Crude death rate(c)	rate	6.4	4.5	11.1	9.9	4.3	3.3	16.6
Median age at death	years	75.5	76.4	72.5	72.6	75.7	73.0	75.8
Age at death (years)								
0	no.	750	—	—	—	—	—	—
1–4	no.	141	—	—	—	—	—	—
5–14	no.	194	3	—	—	—	—	—
15–24	no.	972	4	—	3	3	3	3
25–34	no.	1 325	8	5	—	6	3	5
35–44	no.	1 754	19	7	6	12	6	10
45–54	no.	2 772	16	68	36	16	11	64
55–64	no.	4 917	45	110	130	30	9	204
65–74	no.	9 466	100	226	265	69	23	686
75–84	no.	14 568	125	190	172	98	30	702
85 and over	no.	9 012	95	90	117	53	10	432
Not stated	no.	—	—	—	—	—	—	—
Leading causes of death(d)								
Malignant neoplasms (C00–C97)	rate	243	141	206	170	122	198	219
Ischaemic heart diseases (I20–I25)	rate	183	84	185	128	160	179	132
Cerebrovascular diseases (I60–I69)	rate	67	41	82	55	44	80	62
Chronic lower respiratory diseases (J40–J47)	rate	48	17	23	16	13	14	23
Accidents (V01–X59)	rate	39	18	33	23	15	30	27
Total causes	*rate*	*852*	*423*	*786*	*584*	*519*	*712*	*706*

(a) See Glossary for definitions of the terms used. As ERP by country of birth for 2001 are not yet available, death rates by country of birth are not provided. Data for 2000 have been reproduced from the 2000 issue.

(b) Estimated male resident population by country of birth, June 2000 preliminary.

(c) Per 1,000 male estimated resident population by country of birth, June 2000 preliminary.

(d) ISDR per 100,000 population. Standardised using age-specific death rates for the 1999 Australian population, for comparability with *Deaths, Australia, 1999* (cat. no. 3302.0). See paragraph 16 of the Explanatory Notes.

6.16 DEATHS, Selected countries of birth, Males(a) *continued*

		Lebanon	*Netherlands*	*New Zealand*	*Philippines*	*United Kingdom*	*United States of America*	*Viet Nam*	*Total overseas-born(e)*
Deaths	no.	209	768	863	107	7 333	162	228	20 962
Population(b)	'000	41.7	47.6	192.5	45.6	588.3	36.2	86.7	2 271.4
Crude death rate(c)	rate	4.2	15.0	4.1	2.3	12.6	5.4	1.9	9.1
Median age at death	years	68.1	76.6	66.5	75.5	77.5	77.0	57.5	75.5
Age at death (years)									
0	no.	—	—	—	—	—	—	—	—
1–4	no.	—	—	3	—	—	—	—	6
5–14	no.	—	—	3	—	3	—	3	18
15–24	no.	3	—	26	—	17	4	15	150
25–34	no.	4	4	62	3	59	5	25	316
35–44	no.	8	—	72	8	155	6	29	526
45–54	no.	20	45	112	14	371	11	34	1 277
55–64	no.	59	69	139	13	769	18	33	2 598
65–74	no.	47	211	133	13	1 610	28	29	5 104
75–84	no.	49	290	194	37	2 579	67	45	6 827
85 and over	no.	19	145	123	17	1 770	23	15	4 128
Not stated	no.	—	—	—	—	—	—	—	11
Leading causes of death(d)									
Malignant neoplasms (C00–C97)	rate	143	263	195	157	241	188	105	219
Ischaemic heart diseases (I20–25)	rate	130	170	154	129	171	222	70	170
Cerebrovascular diseases (I60–I69)	rate	76	56	55	71	56	84	54	62
Chronic lower respiratory diseases (J40–J47)	rate	41	42	42	12	43	59	14	34
Accidents (V01–X59)	rate	25	33	39	22	29	59	29	32
Total causes	*rate*	*612*	*788*	*729*	*507*	*782*	*859*	*398*	*761*

(a) See Glossary for definitions of the terms used. As ERP by country of birth for 2001 are not yet available, death rates by country of birth are not provided. Data for 2000 have been reproduced from the 2000 issue.

(b) Estimated male resident population by country of birth, June 2000 preliminary.

(c) Per 1,000 male estimated resident population by country of birth, June 2000 preliminary.

(d) ISDR per 100,000 population. Standardised using age-specific death rates for the 1999 Australian population, for comparability with *Deaths, Australia, 1999* (cat. no. 3302.0). See paragraph 16 of the Explanatory Notes.

(e) Includes not stated, at sea, not elsewhere classified, not applicable and inadequately described.

6.17 DEATHS, Selected countries of birth, Females(a)

		Australia	*China*	*Germany*	*Greece*	*India*	*Indonesia*	*Italy*
Deaths	no.	45 148	373	660	479	264	69	1 339
Population(b)	'000	7 373.3	87.0	61.1	69.5	50.5	34.5	113.4
Crude death rate(c)	rate	6.1	4.6	11.2	7.0	4.8	1.9	12.2
Median age at death	years	82.1	81.9	79.0	78.9	81.1	78.8	80.3
Age at death (years)								
0	no.	554	—	—	—	—	3	—
1–4	no.	106	—	—	—	—	—	—
5–14	no.	123	—	—	—	—	—	—
15–24	no.	336	—	3	—	—	—	—
25–34	no.	485	—	3	—	6	—	—
35–44	no.	999	9	4	5	3	3	5
45–54	no.	1 817	9	32	29	8	4	40
55–64	no.	2 922	27	57	65	22	7	86
65–74	no.	6 317	66	135	96	42	9	287
75–84	no.	13 754	109	247	91	99	23	438
85 and over	no.	17 734	150	183	193	84	21	482
Not stated	no.	—	—	—	—	—	—	—
Leading causes of death(d)								
Malignant neoplasms (C00–C97)	rate	145	114	155	95	105	113	115
Ischaemic heart diseases (I20–I25)	rate	109	58	102	83	87	33	84
Cerebrovascular diseases (I60–I69)	rate	62	53	50	32	45	28	54
Chronic lower respiratory diseases (J40–J47)	rate	23	6	22	8	10	6	6
Accidents (V01–X59)	rate	18	9	24	14	11	11	19
Total causes	*rate*	*552*	*360*	*536*	*382*	*400*	*367*	*452*

(a) See Glossary for definitions of the terms used. As ERP by country of birth for 2001 are not yet available, death rates by country of birth are not provided. Data for 2000 have been reproduced from the 2000 issue.

(b) Estimated female resident population by country of birth, June 2000 preliminary.

(c) Per 1,000 female estimated resident population by country of birth, June 2000 preliminary.

(d) ISDR per 100,000 population. Standardised using age-specific death rates for the 1999 Australian population, for comparability with *Deaths, Australia, 1999* (cat. no. 3302.0). See paragraph 16 of the Explanatory Notes.

6.17 DEATHS, Selected countries of birth, Females(a) *continued*

		Lebanon	*Netherlands*	*New Zealand*	*Philippines*	*United Kingdom*	*United States of America*	*Viet Nam*	*Total overseas-born(e)*
Deaths	no.	142	516	634	124	6 910	96	150	16 561
Population(b)	'000	38.1	43.0	182.4	77.4	571.8	28.9	87.8	2 245.9
Crude death rate(c)	rate	3.7	12.5	3.6	1.3	12.0	3.4	1.8	7.3
Median age at death	years	73.8	81.0	76.1	62.4	83.3	80.2	69.7	81.8
Age at death (years)									
0	no.	—	—	—	—	—	—	—	4
1–4	no.	—	—	—	—	—	—	—	6
5–14	no.	—	—	—	—	3	—	—	8
15–24	no.	—	3	8	3	4	3	4	52
25–34	no.	—	3	23	5	23	—	8	121
35–44	no.	7	5	30	13	105	5	13	313
45–54	no.	8	29	57	25	224	8	20	743
55–64	no.	22	46	80	21	448	11	17	1 288
65–74	no.	34	81	106	13	917	10	35	2 618
75–84	no.	43	186	125	34	2 072	33	39	5 226
85 and over	no.	26	167	202	10	3 115	26	14	6 180
Not stated	no.	—	—	—	—	—	—	—	3
Leading causes of death(e)									
Malignant neoplasms (C00–C97)	rate	121	151	162	88	152	157	97	138
Ischaemic heart diseases (I20–I25)	rate	93	98	98	35	106	135	35	98
Cerebrovascular diseases (I60–I69)	rate	72	57	72	40	56	44	41	56
Chronic lower respiratory diseases (J40–J47)	rate	8	14	22	6	26	7	9	18
Accidents (V01–X59)	rate	8	27	15	9	19	19	11	17
Total causes	*rate*	*515*	*516*	*521*	*244*	*548*	*550*	*305*	*504*

(a) See Glossary for definitions of the terms used. As ERP by country of birth for 2001 are not yet available, death rates by country of birth are not provided. Data for 2000 have been reproduced from the 2000 issue.

(b) Estimated female resident population by country of birth, June 1999 preliminary.

(c) Per 1,000 female estimated resident population by country of birth, June 1999 preliminary.

(d) ISDR per 100,000 population. Standardised using age-specific death rates for the 1999 Australian population, for comparability with *Deaths, Australia, 1999* (cat. no. 3302.0). See paragraph 16 of the Explanatory Notes.

(e) Includes not stated, at sea, not elsewhere classified, not applicable and inadequately described.

6.18 SELECTED COUNTRIES OF BIRTH, Indirect standardised death rates(a), 2000(b)

	LEADING CAUSES OF DEATH						
Birthplace	*Malignant neoplasms* rate	*Ischaemic heart diseases* rate	*Cerebro-vascular diseases* rate	*Chronic lower respiratory diseases* rate	*Accidents* rate	*Total* rate	*Total deaths* no.
Australia	186	138	64	33	27	672	91 232
China	127	69	48	11	13	388	762
Germany	177	134	61	22	27	635	1 339
Greece	133	105	43	12	18	481	1 196
India	113	118	45	11	13	453	495
Indonesia	154	100	51	10	20	529	174
Italy	169	108	58	15	23	578	3 514
Lebanon	132	112	74	25	17	565	315
Netherlands	207	131	56	27	30	643	1 253
New Zealand	178	123	65	31	27	616	1 446
Philippines	110	66	51	8	13	333	201
United Kingdom	193	133	56	33	24	649	14 259
United States of America	175	183	66	37	41	725	293
Viet Nam	101	50	46	11	20	347	324
Total overseas-born(c)	177	130	58	25	24	620	37 059
Total Australia	**183**	**135**	**62**	**31**	**27**	**656**	**128 291**

(a) Per 100,000 population. Standardised using age-specific death rates for the 1999 Australian population, for comparability with *Deaths, Australia, 1999*. See paragraph 16 of the Explanatory Notes.

(b) As ERP by country of birth for 2001 are not yet available, ISDRs by country of birth are not provided. Data for 2000 have been reproduced from the 2000 issue.

(c) Includes not stated, at sea, not elsewhere classified, not applicable and inadequately described.

6.19 DEATHS, Country of birth, Duration of residence

	DURATION OF RESIDENCE (YEARS)									
	0–4	*5–9*	*10–19*	*20–29*	*30–39*	*40 and over*	*Not stated*	*Not applicable*	*Total*	*Median duration*
Country of birth	no.	no.	no.	no.	no.	no.	no.	no.	no.	years
Oceania and Antarctica										
Australia (incl. E T)	. .	. .	. .	. .	. .	3	3	91 303	91 307	52.5
Fiji	20	13	53	17	12	17	32	. .	164	13.9
New Zealand	101	134	257	225	145	385	250	. .	1 497	23.4
Papua New Guinea	—	—	4	20	8	12	21	. .	67	28.5
Other	28	22	45	22	4	20	43	. .	184	14.6
Total	*149*	*171*	*359*	*284*	*169*	*436*	*348*	*91 303*	*93 219*	*21.9*
North-West Europe										
Austria	5	3	8	10	40	233	18	. .	317	46.0
Denmark	3	—	4	6	17	53	10	. .	91	44.1
France	6	—	8	12	21	47	20	. .	116	39.5
Germany	26	9	50	53	133	981	106	. .	1 358	47.1
Ireland	18	8	33	51	103	292	73	. .	578	44.3
Netherlands	34	4	14	39	76	1 024	93	. .	1 284	47.1
Switzerland	3	3	7	4	14	39	7	. .	75	42.5
United Kingdom	385	182	886	1 288	3 179	7 232	1 091	. .	14 243	42.5
Other	8	—	6	15	47	122	21	. .	219	42.4
Total	*486*	*209*	*1 016*	*1 478*	*3 630*	*10 023*	*1 439*	. .	*18 281*	*44.2*
Southern and Eastern Europe										
Bosnia and Herzegovina	12	24	3	10	32	33	5	. .	119	31.2
Croatia	16	12	12	38	182	264	37	. .	561	40.1
Cyprus	—	4	3	25	22	100	8	. .	162	48.6
Former Yugoslav Republic of Macedonia	5	6	13	42	138	50	16	. .	270	32.0
Greece	9	11	24	64	426	633	43	. .	1 210	41.2
Hungary	4	4	10	14	38	416	30	. .	516	45.4
Italy	55	11	33	105	550	2 565	124	. .	3 443	46.5
Malta	—	—	5	20	99	364	20	. .	508	46.6
Poland	23	15	55	39	103	982	94	. .	1 311	51.3
Portugal	3	3	13	11	27	—	5	. .	62	28.8
Romania	3	—	21	5	13	76	12	. .	129	45.8
Russian Federation	14	7	7	15	16	185	27	. .	271	51.1
Spain	3	3	4	12	48	28	14	. .	109	37.8
Yugoslavia, Federal Republic of	11	12	20	35	136	203	35	. .	452	38.8
Other	23	57	41	61	98	1 049	91	. .	1 420	51.5
Total	*179*	*167*	*264*	*496*	*1 928*	*6 948*	*561*	. .	*10 543*	*46.4*
North Africa and the Middle East										
Egypt	6	6	33	31	128	216	26	. .	446	40.7
Iran	10	10	18	8	10	3	—	. .	61	14.8
Israel	—	—	3	3	6	11	8	. .	33	n.p.
Lebanon	9	10	52	75	93	78	34	. .	351	30.6
Syria	—	—	4	12	—	4	—	. .	25	n.p.
Turkey	7	6	22	41	69	31	6	. .	182	31.1
Other	12	19	18	19	32	28	11	. .	139	28.5
Total	*46*	*53*	*150*	*189*	*340*	*371*	*88*	. .	*1 237*	*32.6*

6.19 DEATHS, Country of birth, Duration of residence *continued*

	DURATION OF RESIDENCE (YEARS)									
Country of birth	*0–4* no.	*5–9* no.	*10–19* no.	*20–29* no.	*30–39* no.	*40 and over* no.	*Not stated* no.	*Not applicable* no.	*Total* no.	*Median duration* years
South-East Asia										
Cambodia	3	5	34	13	—	—	—	. .	56	16.1
Indonesia	19	11	27	24	13	56	15	. .	165	27.3
Laos	—	—	17	16	—	—	—	. .	34	n.p.
Malaysia	20	23	61	40	20	18	8	. .	190	16.6
Philippines	18	24	118	39	11	5	16	. .	231	15.2
Singapore	8	—	15	25	14	18	9	. .	89	27.2
Thailand	3	4	11	3	—	—	6	. .	30	n.p.
Viet Nam	16	44	195	105	—	3	16	. .	378	15.8
Other	11	7	21	28	37	20	3	. .	127	27.2
Total	*98*	*119*	*499*	*293*	*98*	*119*	*74*	. .	*1 300*	*17.6*
North-East Asia										
China (exc. SARs & Taiwan Province)	64	86	202	132	61	158	83	. .	786	20.0
Hong Kong (SAR of China)	—	9	20	20	10	13	10	. .	84	23.3
Japan	5	3	5	3	3	8	20	. .	46	17.3
Korea, Republic of (South)	16	11	20	19	—	—	9	. .	76	11.8
Other	4	3	11	4	—	—	4	. .	26	n.p.
Total	*91*	*111*	*258*	*178*	*74*	*180*	*126*	. .	*1 018*	*18.9*
Southern and Central Asia										
India	36	37	78	82	140	136	42	. .	551	31.1
Pakistan	8	4	9	6	3	8	3	. .	41	n.p.
Sri Lanka	15	20	72	44	53	36	7	. .	247	26.6
Other	9	11	5	5	3	4	—	. .	37	n.p.
Total	*68*	*72*	*164*	*137*	*198*	*184*	*53*	. .	*876*	*28.6*
Americas										
Argentina	3	4	6	26	12	11	—	. .	64	26.5
Canada	6	7	6	9	26	70	21	. .	145	43.8
Caribbean	—	—	—	4	9	4	3	. .	21	n.p.
Central America	—	—	9	3	3	3	—	. .	19	n.p.
Chile	—	4	25	24	8	6	4	. .	72	23.5
United States of America	19	6	23	31	52	91	36	. .	258	35.1
Uruguay	—	—	9	35	3	3	3	. .	51	25.9
Other	6	3	12	10	13	14	4	. .	62	28.5
Total	*38*	*27*	*92*	*141*	*124*	*199*	*71*	. .	*692*	*30.5*
Sub-Saharan Africa										
Kenya	—	3	—	3	6	4	4	. .	21	n.p.
Mauritius	5	3	22	14	41	—	4	. .	90	30.1
South Africa	38	21	68	58	39	83	26	. .	333	22.8
Zimbabwe	—	—	9	4	3	5	3	. .	22	n.p.
Other	6	12	7	7	14	14	5	. .	65	28.3
Total	*50*	*38*	*108*	*86*	*101*	*108*	*40*	. .	*531*	*25.1*
Other and not stated	13	3	4	4	9	41	775	. .	847	45.5
Total	**1 218**	**968**	**2 914**	**3 286**	**6 671**	**18 609**	**3 575**	**91 303**	**128 544**	**42.5**

6.20 UNDERLYING CAUSE OF DEATH, Males, Selected years

Cause of death and ICD code	*1997*	*1998*	*1999*	*2000*	*2001*
All causes	**67 752**	**67 073**	**67 227**	**66 817**	**66 835**
Chapter I Certain infectious and parasitic diseases (A00–B99)	868	790	842	867	887
Septicaemia (A40, A41)	311	342	401	454	442
Human immunodeficiency virus (HIV) disease (B20–B24)(a)	245	166	156	162	134
Chapter II Neoplasms (C00–D48)	19 865	20 168	20 283	20 545	21 126
Malignant neoplasms (C00–C97)	19 489	19 816	19 866	20 153	20 753
Digestive organs (C15–C26)	5 482	5 432	5 600	5 676	5 918
Oesophagus (C15)	657	648	641	667	711
Stomach (C16)	782	754	754	775	750
Colon (C18)	1 855	1 736	1 771	1 753	1 760
Rectosigmoid junction, rectum, anus and anal canal (C19–C21)	666	741	734	780	855
Liver and intrahepatic bile ducts (C22)	440	428	449	510	538
Pancreas (C25)	773	809	868	864	950
Trachea, bronchus and lung (C33, C34)	4 536	4 714	4 655	4 587	4 642
Melanoma of skin (C43)	579	623	631	624	686
Breast (C50)	19	19	22	19	27
Female genital organs (C51–C58)	..	..	..	..	..
Ovary (C56)	..	..	..	..	..
Male genital organs (C60–C63)	2 480	2 593	2 546	2 700	2 753
Prostate (C61)	2 446	2 556	2 499	2 663	2 711
Urinary tract (C64–C68)	1 019	1 045	1 112	1 076	1 162
Kidney, except renal pelvis (C64)	440	448	482	469	496
Bladder (C67)	553	561	587	574	629
Brain (C71)	593	563	588	622	631
Lymphoid, haematopoietic and related tissue (C81–C96)	1 903	1 906	1 962	2 062	1 997
Leukaemia (C91–C95)	693	767	768	772	803
In situ and benign neoplasms and neoplasms of uncertain or unknown behaviour (D00–D48)	376	352	417	392	373
Chapter III Diseases of the blood and blood-forming organs and certain disorders involving the immune mechanism (D50–D89)	161	199	195	190	183
Chapter IV Endocrine, nutritional and metabolic diseases (E00–E90)	2 008	2 003	2 001	2 141	2 223
Diabetes mellitus (E10–E14)	1 515	1 481	1 485	1 594	1 639
Chapter V Mental and behavioural disorders (F00–F99)	1 373	1 409	1 256	1 358	1 073
Organic, including symptomatic, mental disorders (F00–F09)	592	619	648	668	683
Chapter VI Diseases of the nervous system (G00–G99)	1 637	1 735	1 818	1 839	1 894
Alzheimer's disease (G30)	479	485	493	455	497
Chapter VII Diseases of the eye and adnexa (H00–H59)	1	2	—	—	2
Chapter VIII Diseases of the ear and mastoid process (H60–H95)	3	5	—	4	3
Chapter IX Diseases of the circulatory system (I00–I99)	26 121	25 159	24 824	23 756	23 602
All heart diseases (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52)	19 316	18 523	18 116	17 172	17 027
Acute rheumatic fever and chronic rheumatic heart diseases (I00–I09)	109	67	84	101	82
Hypertensive diseases (I10–I15)	478	432	432	449	443
Ischaemic heart diseases (I20–I25)	15 791	15 256	14 865	14 052	13 906
Acute myocardial infarction (I21)	8 778	8 525	8 028	7 586	7 484
Pulmonary heart disease and diseases of pulmonary circulation and other forms of heart disease (I26–I52)	3 153	2 977	2 955	2 795	2 824
Heart failure (I50)	1 133	1 068	989	982	982
Cerebrovascular diseases (I60–I69)	4 978	4 910	4 894	4 913	4 852
Diseases of arteries, arterioles and capillaries (I70–I79)	1 523	1 408	1 476	1 321	1 381
Atherosclerosis (I70)	236	204	229	187	175
Aortic aneurysm and dissection (I71)	919	865	882	798	793

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) See paragraphs 20–21 of Explanatory Notes for further information.

6.20 UNDERLYING CAUSE OF DEATH, Males, Selected years *continued*

Cause of death and ICD code	*1997*	*1998*	*1999*	*2000*	*2001*
Chapter X Diseases of the respiratory system (J00–J99)	5 662	5 304	5 296	5 923	5 725
Influenza and pneumonia (J10–J18)	924	845	765	1 312	1 184
Chronic lower respiratory diseases (J40–J47)	3 877	3 649	3 609	3 514	3 419
Emphysema (J43)	522	541	575	490	408
Asthma and status asthmaticus (J45, J46)	207	187	160	169	175
Chapter XI Diseases of the digestive system (K00–K93)	2 092	2 013	2 111	2 063	2 036
Diseases of oesophagus, stomach and duodenum (K20–K31)	287	313	313	331	301
Gastric and duodenal ulcer (K25–K27)	203	214	215	232	203
Diseases of liver (K70–K77)	926	867	863	805	822
Chapter XII Diseases of the skin and subcutaneous tissue (L00–L99)	101	96	108	99	106
Chapter XIII Diseases of the musculoskeletal system and connective tissue (M00–M99)	248	227	300	279	285
Arthropathies and systemic connective tissue disorders (M00–M36)	172	157	208	187	186
Chapter XIV Diseases of the genitourinary system (N00–N99)	1 186	1 197	1 232	1 186	1 242
Renal failure (N17–N19)	776	795	842	802	813
Chapter XV Pregnancy, childbirth and the puerperium (O00–O99)	..	..	..	..	..
Chapter XVI Certain conditions originating in the perinatal period (P00–P96)	347	333	377	360	395
Fetus and newborn affected by maternal factors and by complications of pregnancy, labour and delivery (P00-P04)	169	160	214	177	197
Chapter XVII Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	408	335	392	326	335
Congenital malformations of the circulatory system (Q20–Q28)	138	113	133	115	117
Chapter XVIII Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified (R00–R99)	245	351	324	364	272
Chapter XX External causes of morbidity and mortality (V01–Y98)	5 426	5 747	5 868	5 517	5 446
Accidents (V01–X59)	2 866	3 163	3 486	3 299	3 155
Transport accidents (V01–V99)	1 447	1 435	1 441	1 459	1 495
Falls (W00–W19)	259	270	309	308	354
Accidental drowning and submersion (W65–W74)	218	191	203	179	210
Intentional self-harm (X60–X84)	2 143	2 150	2 002	1 860	1 935
Hanging, strangulation and suffocation (X70)	812	1 035	868	807	855
Assault (X85–Y09)	215	203	204	197	192

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

6.21 UNDERLYING CAUSE OF DEATH, Females, Selected years

Cause of death and ICD code	*1997*	*1998*	*1999*	*2000*	*2001*
All causes	**61 598**	**60 129**	**60 875**	**61 474**	**61 709**
Chapter I Certain infectious and parasitic diseases (A00–B99)	654	664	761	779	788
Septicaemia (A40, A41)	379	410	460	486	531
Human immunodeficiency virus (HIV) disease (B20–B24)(a)	19	10	10	11	14
Chapter II Neoplasms (C00–D48)	15 498	15 441	15 573	15 829	16 371
Malignant neoplasms (C00–C97)	15 173	15 137	15 187	15 475	15 997
Digestive organs (C15–C26)	4 349	4 310	4 312	4 379	4 462
Oesophagus (C15)	294	322	299	287	333
Stomach (C16)	463	441	447	414	461
Colon (C18)	1 678	1 659	1 557	1 665	1 582
Rectosigmoid junction, rectum, anus and anal canal (C19–C21)	477	504	514	514	548
Liver and intrahepatic bile ducts (C22)	205	213	234	227	240
Pancreas (C25)	816	801	850	873	859
Trachea, bronchus and lung (C33, C34)	2 052	2 028	2 148	2 291	2 396
Melanoma of skin (C43)	329	343	359	356	383
Breast (C50)	2 609	2 557	2 505	2 511	2 585
Female genital organs (C51–C58)	1 391	1 374	1 300	1 402	1 506
Ovary (C56)	734	736	737	774	833
Male genital organs (C60–C63)	..	..	..	..	..
Prostate (C61)	..	..	..	..	..
Urinary tract (C64–C68)	593	599	605	579	662
Kidney, except renal pelvis (C64)	309	319	320	295	346
Bladder (C67)	251	249	252	247	275
Brain (C71)	435	439	430	435	448
Lymphoid, haematopoietic and related tissue (C81–C96)	1 581	1 621	1 596	1 682	1 663
Leukaemia (C91–C95)	540	564	578	582	582
In situ and benign neoplasms and neoplasms of uncertain or unknown behaviour (D00–D48)	325	304	386	354	374
Chapter III Diseases of the blood and blood-forming organs and certain disorders involving the immune mechanism (D50–D89)	211	237	255	223	225
Chapter IV Endocrine, nutritional and metabolic diseases (E00–E90)	2 088	1 962	2 099	2 016	2 091
Diabetes mellitus (E10–E14)	1 516	1 396	1 462	1 412	1 439
Chapter V Mental and behavioural disorders (F00–F99)	1 512	1 463	1 552	1 716	1 631
Organic, including symptomatic, mental disorders (F00–F09)	1 209	1 179	1 296	1 439	1 454
Chapter VI Diseases of the nervous system (G00–G99)	2 069	1 982	2 072	2 200	2 310
Alzheimer's disease (G30)	1 031	982	1 023	1 104	1 110
Chapter VII Diseases of the eye and adnexa (H00–H59)	1	3	5	1	1
Chapter VIII Diseases of the ear and mastoid process (H60–H95)	4	5	6	5	4
Chapter IX Diseases of the circulatory system (I00–I99)	27 515	26 628	26 479	25 931	25 724
All heart diseases (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52)	18 256	17 457	17 229	16 747	16 620
Acute rheumatic fever and chronic rheumatic heart diseases (I00–I09)	216	149	177	164	160
Hypertensive diseases (I10–I15)	745	777	745	753	780
Ischaemic heart diseases (I20–I25)	13 666	13 043	12 744	12 469	12 328
Acute myocardial infarction (I21)	7 744	7 352	7 124	7 030	6 959
Pulmonary heart disease and diseases of pulmonary circulation and other forms of heart disease (I26–I52)	3 943	3 822	3 896	3 713	3 747
Heart failure (I50)	1 849	1 727	1 725	1 662	1 630
Cerebrovascular diseases (I60–I69)	7 425	7 361	7 372	7 387	7 294
Diseases of arteries, arterioles and capillaries (I70–I79)	1 397	1 312	1 388	1 296	1 244
Atherosclerosis (I70)	426	373	423	324	282
Aortic aneurysm and dissection (I71)	576	536	568	539	545

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) See paragraphs 20–21 of Explanatory Notes for further information.

6.21 UNDERLYING CAUSE OF DEATH, Females, Selected years *continued*

Cause of death and ICD code	*1997*	*1998*	*1999*	*2000*	*2001*
Chapter X Diseases of the respiratory system (J00–J99)	4 687	4 310	4 317	4 984	4 901
Influenza and pneumonia (J10–J18)	1 320	1 178	1 133	1 625	1 518
Chronic lower respiratory diseases (J40–J47)	2 668	2 485	2 487	2 448	2 497
Emphysema (J43)	287	264	312	231	270
Asthma and status asthmaticus (J45, J46)	292	294	264	285	247
Chapter XI Diseases of the digestive system (K00–K93)	1 966	1 954	2 110	2 078	2 053
Diseases of oesophagus, stomach and duodenum (K20–K31)	370	340	335	360	333
Gastric and duodenal ulcer (K25–K27)	266	241	231	245	237
Diseases of liver (K70–K77)	394	378	380	357	374
Chapter XII Diseases of the skin and subcutaneous tissue (L00–L99)	139	164	181	153	159
Chapter XIII Diseases of the musculoskeletal system and connective tissue (M00–M99)	544	524	562	573	611
Arthropathies and systemic connective tissue disorders (M00–M36)	360	371	360	388	375
Chapter XIV Diseases of the genitourinary system (N00–N99)	1 402	1 500	1 536	1 506	1 570
Renal failure (N17–N19)	815	877	919	913	891
Chapter XV Pregnancy, childbirth and the puerperium (O00–O99)	12	7	11	15	12
Chapter XVI Certain conditions originating in the perinatal period (P00–P96)	292	256	264	282	286
Fetus and newborn affected by maternal factors and by complications of pregnancy, labour and delivery (P00-P04)	174	125	147	137	189
Chapter XVII Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	337	277	323	284	279
Congenital malformations of the circulatory system (Q20–Q28)	116	99	118	97	98
Chapter XVIII Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified (R00–R99)	229	284	276	318	263
Chapter XX External causes of morbidity and mortality (V01–Y98)	2 438	2 468	2 493	2 581	2 430
Accidents (V01–X59)	1 631	1 679	1 801	1 839	1 685
Transport accidents (V01–V99)	591	551	570	556	509
Falls (W00–W19)	189	195	211	257	280
Accidental drowning and submersion (W65–W74)	61	58	75	50	51
Intentional self-harm (X60–X84)	577	533	490	503	519
Hanging, strangulation and suffocation (X70)	175	182	160	182	195
Assault (X85–Y09)	115	104	96	116	108

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

6.22 UNDERLYING CAUSE OF DEATH, Standardised death rates(a), Males

Cause of death and ICD code	*1991*	*1996*	*2000*	*2001*
All causes	**885.1**	**820.0**	**707.9**	**680.8**
Chapter I Certain infectious and parasitic diseases (A00–B99)	6.2	12.2	9.2	9.0
Septicaemia (A40, A41)	2.7	3.5	4.9	4.6
Human immunodeficiency virus (HIV) disease (B20–B24)(b)	6.4	5.8	1.6	1.3
Chapter II Neoplasms (C00–D48)	237.1	234.0	213.7	212.2
Malignant neoplasms (C00–C97)	234.8	230.2	209.5	208.3
Digestive organs (C15–C26)	64.5	62.3	58.7	59.1
Oesophagus (C15)	6.7	7.2	6.9	7.0
Stomach (C16)	10.6	8.8	8.0	7.5
Colon (C18)	21.1	21.7	18.2	17.7
Rectosigmoid junction, rectum, anus and anal canal (C19–C21)	8.6	7.5	8.1	8.5
Liver and intrahepatic bile ducts (C22)	3.8	4.7	5.3	5.3
Pancreas (C25)	9.6	9.0	8.9	9.5
Trachea, bronchus and lung (C33, C34)	59.6	55.4	47.5	46.5
Melanoma of skin (C43)	6.5	6.7	6.4	6.8
Breast (C50)	0.2	0.2	0.2	0.3
Female genital organs (C51–C58)	. .	. .	. .	. .
Ovary (C56)	. .	. .	. .	. .
Male genital organs (C60–C63)	31.7	33.7	29.0	28.3
Prostate (C61)	31.1	33.1	28.6	27.8
Urinary tract (C64–C68)	12.3	12.0	11.2	11.7
Kidney, except renal pelvis (C64)	5.1	5.0	4.8	4.9
Bladder (C67)	6.9	6.7	6.1	6.4
Brain (C71)	6.3	6.7	6.2	6.2
Lymphoid, haematopoietic and related tissue (C81–C96)	21.4	21.6	21.4	20.1
Leukaemia (C91–C95)	8.4	9.0	8.0	8.1
In situ and benign neoplasms and neoplasms of uncertain or unknown behaviour (D00–D48)	2.3	3.8	4.2	3.8
Chapter III Diseases of the blood and blood-forming organs and certain disorders involving the immune mechanism (D50–D89)	7.8	2.6	2.0	1.9
Chapter IV Endocrine, nutritional and metabolic diseases (E00–E90)	19.9	23.4	22.4	22.5
Diabetes mellitus (E10–E14)	15.8	18.3	16.8	16.5
Chapter V Mental and behavioural disorders (F00–F99)	12.8	18.7	14.8	11.2
Organic, including symptomatic, mental disorders (F00–F09)	8.0	11.9	7.4	7.2
Chapter VI Diseases of the nervous system (G00–G99)	16.1	18.5	19.6	19.4
Alzheimer's disease (G30)	4.7	4.8	5.0	5.2
Chapter VII Diseases of the eye and adnexa (H00–H59)	—	—	—	—
Chapter VIII Diseases of the ear and mastoid process (H60–H95)	—	0.1	—	—
Chapter IX Diseases of the circulatory system (I00–I99)	381.1	326.3	253.7	240.9
All heart diseases (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52)	280.4	238.1	182.6	173.2
Acute rheumatic fever and chronic rheumatic heart diseases (I00–I09)	1.8	1.5	1.1	0.8
Hypertensive diseases (I10–I15)	5.9	5.4	4.8	4.5
Ischaemic heart diseases (I20–I25)	235.4	195.5	149.0	141.2
Acute myocardial infarction (I21)	155.4	117.2	80.7	76.2
Pulmonary heart disease and diseases of pulmonary circulation and other forms of heart disease (I26–I52)	40.4	38.3	30.1	29.0
Heart failure (I50)	17.2	14.6	10.9	10.3
Cerebrovascular diseases (I60–I69)	72.3	65.5	53.2	50.0
Diseases of arteries, arterioles and capillaries (I70–I79)	23.7	18.6	14.2	14.2
Atherosclerosis (I70)	5.0	3.8	2.1	1.8
Aortic aneurysm and dissection (I71)	13.3	11.0	8.5	8.1

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) Standardised death rate per 100,000 of the mid-year population. See Glossary for further explanation.

(b) See paragraphs 20–21 of Explanatory Notes for further information.

6.22 UNDERLYING CAUSE OF DEATH, Standardised death rates(a), Males *continued*

Cause of death and ICD code	*1991*	*1996*	*2000*	*2001*
Chapter X Diseases of the respiratory system (J00–J99)	78.2	71.1	63.8	58.8
Influenza and pneumonia (J10–J18)	12.7	10.0	14.4	12.3
Chronic lower respiratory diseases (J40–J47)	56.3	51.0	37.6	35.0
Emphysema (J43)	7.7	7.4	5.2	4.2
Asthma and status asthmaticus (J45, J46)	4.4	3.5	1.8	1.8
Chapter XI Diseases of the digestive system (K00–K93)	28.9	23.9	21.4	20.4
Diseases of oesophagus, stomach and duodenum (K20–K31)	6.4	3.9	3.5	3.1
Gastric and duodenal ulcer (K25–K27)	5.1	2.9	2.5	2.1
Diseases of liver (K70–K77)	10.5	9.3	8.0	7.9
Chapter XII Diseases of the skin and subcutaneous tissue (L00–L99)	0.6	0.8	1.1	1.1
Chapter XIII Diseases of the musculoskeletal system and connective tissue (M00–M99)	2.9	2.9	3.0	2.9
Arthropathies and systemic connective tissue disorders (M00–M36)	1.8	1.8	2.0	1.9
Chapter XIV Diseases of the genitourinary system (N00–N99)	13.9	12.9	13.0	12.9
Renal failure (N17–N19)	7.5	9.0	8.8	8.4
Chapter XV Pregnancy, childbirth and the puerperium (O00–O99)	..	..	..	..
Chapter XVI Certain conditions originating in the perinatal period (P00–P96)	5.0	4.3	4.0	4.4
Chapter XVII Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	4.8	3.9	3.6	3.6
Congenital malformations of the circulatory system (Q20–Q28)	1.7	1.5	1.3	1.3
Chapter XVIII Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified (R00–R99)	4.7	3.2	3.8	2.8
Chapter XX External causes of morbidity and mortality (V01–Y98)	64.8	61.2	58.8	56.9
Accidents (V01–X59)	39.2	36.2	35.5	33.2
Transport accidents (V01–V99)	21.3	18.2	15.7	15.9
Falls (W00–W19)	3.6	3.4	3.3	3.6
Accidental drowning and submersion (W65–W74)	2.4	2.1	1.9	2.2
Intentional self-harm (X60–X84)	21.7	21.3	19.6	20.1
Hanging, strangulation and suffocation (X70)	5.7	7.5	8.7	9.1
Assault (X85–Y09)	2.4	2.5	2.1	2.0

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) Standardised death rate per 100,000 of the mid-year population. See Glossary for further explanation.

6.23 UNDERLYING CAUSE OF DEATH, Standardised death rates(a), Females

Cause of death and ICD code	*1991*	*1996*	*2000*	*2001*
All causes	**537.3**	**500.9**	**444.9**	**430.0**
Chapter I Certain infectious and parasitic diseases (A00–B99)	3.7	4.8	5.7	5.5
Septicaemia (A40, A41)	1.8	2.4	3.3	3.5
Human immunodeficiency virus (HIV) disease (B20–B24)(b)	0.3	0.2	0.1	0.1
Chapter II Neoplasms (C00–D48)	144.3	140.9	129.0	129.7
Malignant neoplasms (C00–C97)	142.7	138.6	126.4	127.1
Digestive organs (C15–C26)	39.7	38.3	34.5	34.1
Oesophagus (C15)	2.8	2.8	2.1	2.5
Stomach (C16)	5.0	4.2	3.2	3.5
Colon (C18)	15.5	15.1	13.2	12.2
Rectosigmoid junction, rectum, anus and anal canal (C19–C21)	4.8	3.8	4.1	4.3
Liver and intrahepatic bile ducts (C22)	1.4	1.7	1.9	1.9
Pancreas (C25)	6.7	7.3	6.9	6.5
Trachea, bronchus and lung (C33, C34)	18.3	19.4	19.4	19.9
Melanoma of skin (C43)	3.2	3.0	3.0	3.1
Breast (C50)	27.0	25.0	21.2	21.3
Female genital organs (C51–C58)	14.7	13.8	11.8	12.2
Ovary (C56)	7.6	7.6	6.5	6.8
Male genital organs (C60–C63)	..	..	..	..
Prostate (C61)	..	..	..	..
Urinary tract (C64–C68)	5.7	5.1	4.5	5.0
Kidney, except renal pelvis (C64)	3.1	2.8	2.4	2.7
Bladder (C67)	2.2	2.0	1.8	1.9
Brain (C71)	4.2	4.0	3.9	3.9
Lymphoid, haematopoietic and related tissue (C81–C96)	13.9	13.9	13.6	13.0
Leukaemia (C91–C95)	5.2	4.8	4.8	4.6
In situ and benign neoplasms and neoplasms of uncertain or unknown behaviour (D00–D48)	1.6	2.3	2.6	2.6
Chapter III Diseases of the blood and blood-forming organs and certain disorders involving the immune mechanism (D50–D89)	2.3	1.8	1.6	1.6
Chapter IV Endocrine, nutritional and metabolic diseases (E00–E90)	15.0	16.3	15.2	14.8
Diabetes mellitus (E10–E14)	11.5	12.3	10.6	10.2
Chapter V Mental and behavioural disorders (F00–F99)	9.2	15.0	11.0	9.5
Organic, including symptomatic, mental disorders (F00–F09)	7.4	13.0	8.5	8.1
Chapter VI Diseases of the nervous system (G00–G99)	11.8	12.7	15.5	15.8
Alzheimer's disease (G30)	4.3	4.9	6.7	6.4
Chapter VII Diseases of the eye and adnexa (H00–H59)	—	—	—	—
Chapter VIII Diseases of the ear and mastoid process (H60–H95)	—	0.1	—	—
Chapter IX Diseases of the circulatory system (I00–I99)	246.1	211.2	170.2	161.2
All heart diseases (I05–I09, I11, I13, I20–I25, I26, I27, I30–I52)	164.9	139.2	110.6	104.8
Acute rheumatic fever and chronic rheumatic heart diseases (I00–I09)	2.6	2.0	1.3	1.2
Hypertensive diseases (I10–I15)	5.8	5.1	4.9	4.8
Ischaemic heart diseases (I20–I25)	127.9	105.5	82.8	78.0
Acute myocardial infarction (I21)	84.7	64.1	47.1	44.3
Pulmonary heart disease and diseases of pulmonary circulation and other forms of heart disease (I26–I52)	31.3	28.7	23.9	23.3
Heart failure (I50)	15.0	12.7	9.9	9.3
Cerebrovascular diseases (I60–I69)	64.9	57.7	47.6	44.8
Diseases of arteries, arterioles and capillaries (I70–I79)	12.4	10.9	8.5	7.9
Atherosclerosis (I70)	4.9	3.7	1.9	1.5
Aortic aneurysm and dissection (I71)	4.4	4.3	3.9	3.8

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) Standardised death rate per 100,000 of the mid-year population. See Glossary for further explanation.

(b) See paragraphs 20–21 of Explanatory Notes for further information.

6.23 UNDERLYING CAUSE OF DEATH, Standardised death rates(a), Females *continued*

Cause of death and ICD code	*1991*	*1996*	*2000*	*2001*
Chapter X Diseases of the respiratory system (J00–J99)	34.2	37.5	35.0	33.7
Influenza and pneumonia (J10–J18)	9.0	7.8	10.0	9.1
Chronic lower respiratory diseases (J40–J47)	20.9	24.3	18.8	18.8
Emphysema (J43)	2.4	2.9	1.9	2.1
Asthma and status asthmaticus (J45, J46)	4.3	3.8	2.4	1.9
Chapter XI Diseases of the digestive system (K00–K93)	18.9	15.2	14.6	13.9
Diseases of oesophagus, stomach and duodenum (K20–K31)	4.5	2.9	2.4	2.1
Gastric and duodenal ulcer (K25–K27)	3.8	2.2	1.7	1.5
Diseases of liver (K70–K77)	3.8	3.5	3.1	3.1
Chapter XII Diseases of the skin and subcutaneous tissue (L00–L99)	0.7	0.9	1.0	1.0
Chapter XIII Diseases of the musculoskeletal system and connective tissue (M00–M99)	4.5	4.6	4.2	4.2
Arthropathies and systemic connective tissue disorders (M00–M36)	3.5	3.2	3.0	2.8
Chapter XIV Diseases of the genitourinary system (N00–N99)	10.2	9.7	10.0	9.8
Renal failure (N17–N19)	5.1	6.0	5.9	5.4
Chapter XV Pregnancy, childbirth and the puerperium (O00–O99)	0.2	0.1	0.2	0.1
Chapter XVI Certain conditions originating in the perinatal period (P00–P96)	4.2	3.6	3.3	3.3
Chapter XVII Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	4.2	3.4	3.1	3.0
Congenital malformations of the circulatory system (Q20–Q28)	1.4	1.3	1.1	1.0
Chapter XVIII Symptoms, signs and abnormal clinical and laboratory findings, not elsewhere classified (R00–R99)	2.9	2.4	2.5	2.0
Chapter XX External causes of morbidity and mortality (V01–Y98)	24.9	20.6	22.8	20.6
Accidents (V01–X59)	16.6	14.1	15.4	13.5
Transport accidents (V01–V99)	8.0	6.2	5.7	5.0
Falls (W00–W19)	1.8	1.4	1.8	1.9
Accidental drowning and submersion (W65–W74)	0.7	0.6	0.5	0.5
Intentional self-harm (X60–X84)	5.9	4.9	5.1	5.1
Hanging, strangulation and suffocation (X70)	1.2	1.3	1.9	2.0
Assault (X85–Y09)	1.7	1.1	1.2	1.1

Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0)

(a) Standardised death rate per 100,000 of the mid-year population. See Glossary for further explanation.

6.24 INFANT DEATHS, Age, Selected years

	NEONATAL					POST NEONATAL	TOTAL
	Early neonatal			*Late neonatal*	*Total neonatal*		
Selected years	*Under one day*	*One day to six days*	*Total under one week*	*One week and under four weeks*	*Under four weeks*	*Four weeks and under one year*	*Under one year*
			MALES				
1981	510	223	733	149	882	472	1 354
1986	432	194	626	146	772	472	1 244
1991	370	159	529	110	639	410	1 049
1996	313	133	446	100	546	297	843
1997	262	132	394	91	485	259	744
1998	228	132	360	114	474	232	706
1999	293	148	441	112	553	259	812
2000	282	104	386	104	490	235	725
2001	272	139	411	115	526	225	751
			FEMALES				
1981	348	180	528	111	639	354	993
1986	296	145	441	109	550	360	910
1991	279	138	417	86	503	284	787
1996	244	92	336	82	418	199	617
1997	239	94	333	81	414	183	597
1998	198	83	281	87	368	178	546
1999	233	77	310	90	400	196	596
2000	227	84	311	65	376	189	565
2001	240	81	321	70	391	167	558
			PERSONS				
1981	858	403	1 261	260	1 521	826	2 347
1986	728	339	1 067	255	1 322	832	2 154
1991	649	297	946	196	1 142	694	1 836
1996	557	225	782	182	964	496	1 460
1997	501	226	727	172	899	442	1 341
1998	426	215	641	201	842	410	1 252
1999	526	225	751	202	953	455	1 408
2000	509	188	697	169	866	424	1 290
2001	512	220	732	185	917	392	1 309

6.25 INFANT MORTALITY RATES(a), Age, Selected years

	NEONATAL					POST NEONATAL	TOTAL
	Early neonatal			Late neonatal	Total neonatal		
Selected years	Under one day	One day to six days	Total under one week	One week and under four weeks	Under four weeks	Four weeks and under one year	Under one year
	MALES						
1981	4.2	1.8	6.0	1.2	7.3	3.9	11.2
1986	3.5	1.6	5.0	1.2	6.2	3.8	10.0
1991	2.8	1.2	4.0	0.8	4.8	3.1	7.9
1996	2.4	1.0	3.4	0.8	4.2	2.3	6.5
1997	2.0	1.0	3.1	0.7	3.8	2.0	5.8
1998	1.8	1.0	2.8	0.9	3.7	1.8	5.5
1999	2.3	1.2	3.5	0.9	4.3	2.0	6.4
2000	2.2	0.8	3.0	0.8	3.8	1.8	5.7
2001	2.2	1.1	3.3	0.9	4.2	1.8	5.9
	FEMALES						
1981	3.0	1.6	4.6	1.0	5.6	3.1	8.7
1986	2.5	1.2	3.7	0.9	4.6	3.0	7.7
1991	2.2	1.1	3.3	0.7	4.0	2.3	6.3
1996	2.0	0.7	2.7	0.7	3.4	1.6	5.0
1997	1.9	0.8	2.7	0.7	3.4	1.5	4.9
1998	1.6	0.7	2.3	0.7	3.0	1.5	4.5
1999	1.9	0.6	2.6	0.7	3.3	1.6	4.9
2000	1.9	0.7	2.6	0.5	3.1	1.6	4.7
2001	2.0	0.7	2.7	0.6	3.3	1.4	4.6
	PERSONS						
1981	3.6	1.7	5.3	1.1	6.4	3.5	10.0
1986	3.0	1.4	4.4	1.0	5.4	3.4	8.8
1991	2.5	1.2	3.7	0.8	4.4	2.7	7.1
1996	2.2	0.9	3.1	0.7	3.8	2.0	5.8
1997	2.0	0.9	2.9	0.7	3.6	1.8	5.3
1998	1.7	0.9	2.6	0.8	3.4	1.6	5.0
1999	2.1	0.9	3.0	0.8	3.8	1.8	5.7
2000	2.0	0.8	2.8	0.7	3.5	1.7	5.2
2001	2.1	0.9	3.0	0.8	3.7	1.6	5.3

(a) Per 1,000 live births.

6.26 INFANT DEATHS, States and territories, Selected years

Selected years	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(a)
1981	840	554	406	154	194	89	73	37	2 347
1986	759	517	351	146	214	79	53	35	2 154
1991	632	428	335	109	183	62	51	36	1 836
1996	499	308	304	94	160	29	41	25	1 460
1997	451	300	272	87	131	39	45	16	1 341
1998	371	283	299	73	123	34	45	24	1 252
1999	504	331	266	78	117	46	42	24	1 408
2000	447	268	291	82	109	33	43	17	1 290
2001	449	284	282	79	122	40	41	12	1 309

(a) Includes Other Territories.

6.27 INFANT MORTALITY RATES(a), States and territories, Selected years

Selected years	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(b)
1981	10.2	9.3	10.4	8.0	8.9	12.3	23.5	8.9	10.0
1986	9.0	8.6	8.7	7.4	8.8	11.4	16.0	8.5	8.8
1991	7.2	6.5	7.6	5.5	7.2	9.0	14.2	7.6	7.1
1996	5.8	5.0	6.4	4.9	6.5	4.5	11.5	5.7	5.8
1997	5.2	4.9	5.8	4.7	5.3	6.5	12.5	3.8	5.3
1998	4.3	4.7	6.4	4.0	5.0	5.7	12.4	6.0	5.0
1999	5.8	5.6	5.7	4.3	4.7	7.6	11.7	5.6	5.7
2000	5.2	4.5	6.2	4.6	4.3	5.8	11.7	4.2	5.2
2001	5.3	4.8	5.9	4.6	5.1	6.2	10.7	3.0	5.3

(a) Per 1,000 live births.

(b) Includes Other Territories.

6.28 INFANT DEATHS, Age, States and territories

	NEONATAL					POST NEONATAL	TOTAL
	Early neonatal			*Late neonatal*	*Total neonatal*		
	Under one day	*One day to six days*	*Total under one week*	*One week and under four weeks*	*Under four weeks*	*Four weeks and under one year*	*Under one year*
MALES							
New South Wales	103	61	164	27	191	60	251
Victoria	61	28	89	32	121	45	166
Queensland	57	26	83	27	110	54	164
South Australia	12	5	17	5	22	14	36
Western Australia	19	11	30	13	43	30	73
Tasmania	5	3	8	4	12	10	22
Northern Territory	14	3	17	5	22	8	30
Australian Capital Territory	3	3	3	3	5	4	9
Australia(a)	**272**	**139**	**411**	**115**	**526**	**225**	**751**
FEMALES							
New South Wales	79	31	110	27	137	61	198
Victoria	57	20	77	16	93	25	118
Queensland	48	16	64	15	79	39	118
South Australia	28	5	33	4	37	6	43
Western Australia	18	7	25	3	28	21	49
Tasmania	6	—	7	3	10	8	18
Northern Territory	3	—	3	3	5	6	11
Australian Capital Territory	3	—	—	—	3	3	3
Australia(a)	**240**	**81**	**321**	**70**	**391**	**167**	**558**
PERSONS							
New South Wales	182	92	274	54	328	121	449
Victoria	118	48	166	48	214	70	284
Queensland	105	42	147	42	189	93	282
South Australia	40	10	50	9	59	20	79
Western Australia	37	18	55	16	71	51	122
Tasmania	11	4	15	7	22	18	40
Northern Territory	17	3	20	7	27	14	41
Australian Capital Territory	3	3	5	—	7	5	12
Australia(a)	**512**	**220**	**732**	**185**	**917**	**392**	**1 309**

(a) Includes Other Territories.

6.29 INFANT MORTALITY RATES(a), Age, States and territories

	NEONATAL					POST NEONATAL	TOTAL
	Early neonatal			*Late neonatal*	*Total neonatal*		
	Under one day	*One day to six days*	*Total under one week*	*One week and under four weeks*	*Under four weeks*	*Four weeks and under one year*	*Under one year*
New South Wales	2.2	1.1	3.2	0.6	3.9	1.4	5.3
Victoria	2.0	0.8	2.8	0.8	3.7	1.2	4.8
Queensland	2.2	0.9	3.1	0.9	4.0	2.0	5.9
South Australia	2.3	0.6	2.9	0.5	3.4	1.2	4.6
Western Australia	1.5	0.7	2.3	0.7	3.0	2.1	5.1
Tasmania	1.7	0.6	2.3	1.1	3.4	2.8	6.2
Northern Territory	4.4	0.8	5.2	1.8	7.1	3.7	10.7
Australian Capital Territory	0.8	0.8	1.3	—	1.8	1.3	3.0
Australia(b)	**2.1**	**0.9**	**3.0**	**0.8**	**3.7**	**1.6**	**5.3**

(a) Per 1,000 live births.

(b) Includes Other Territories.

6.30 AUSTRALIAN LIFE TABLE, Males, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
0	100 000	0.00601	99 474	77.03	50	94 180	0.00315	94 034	29.88
1	99 399	0.00046	99 376	76.49	51	93 884	0.00347	93 723	28.97
2	99 354	0.00033	99 337	75.53	52	93 558	0.00383	93 382	28.07
3	99 321	0.00023	99 309	74.55	53	93 199	0.00425	93 005	27.18
4	99 298	0.00018	99 289	73.57	54	92 803	0.00473	92 587	26.29
5	99 280	0.00016	99 272	72.58	55	92 364	0.00525	92 126	25.41
6	99 265	0.00015	99 258	71.59	56	91 879	0.00584	91 616	24.55
7	99 250	0.00014	99 243	70.60	57	91 343	0.00647	91 052	23.69
8	99 236	0.00013	99 230	69.61	58	90 752	0.00717	90 431	22.84
9	99 223	0.00013	99 217	68.62	59	90 101	0.00793	89 749	22.00
10	99 210	0.00013	99 204	67.63	60	89 386	0.00875	89 001	21.17
11	99 197	0.00013	99 191	66.64	61	88 604	0.00965	88 183	20.35
12	99 184	0.00015	99 177	65.65	62	87 749	0.01065	87 288	19.55
13	99 169	0.00018	99 161	64.66	63	86 814	0.01178	86 310	18.75
14	99 151	0.00026	99 139	63.67	64	85 792	0.01304	85 241	17.97
15	99 126	0.00038	99 108	62.69	65	84 673	0.01446	84 070	17.20
16	99 088	0.00055	99 062	61.71	66	83 448	0.01607	82 788	16.44
17	99 033	0.00073	98 999	60.74	67	82 107	0.01787	81 384	15.70
18	98 961	0.00094	98 916	59.79	68	80 640	0.01989	79 850	14.98
19	98 868	0.00103	98 818	58.84	69	79 036	0.02215	78 173	14.28
20	98 766	0.00108	98 713	57.90	70	77 286	0.02466	76 346	13.59
21	98 660	0.00112	98 605	56.96	71	75 380	0.02744	74 360	12.92
22	98 550	0.00115	98 493	56.03	72	73 312	0.03051	72 207	12.27
23	98 436	0.00117	98 379	55.09	73	71 075	0.03388	69 885	11.64
24	98 321	0.00119	98 262	54.16	74	68 667	0.03750	67 393	11.03
25	98 203	0.00121	98 144	53.22	75	66 092	0.04134	64 738	10.44
26	98 084	0.00123	98 024	52.28	76	63 359	0.04549	61 930	9.87
27	97 964	0.00124	97 903	51.35	77	60 477	0.05005	58 975	9.31
28	97 842	0.00125	97 781	50.41	78	57 450	0.05513	55 878	8.78
29	97 720	0.00127	97 658	49.47	79	54 283	0.06084	52 643	8.26
30	97 596	0.00128	97 533	48.54	80	50 980	0.06727	49 276	7.76
31	97 470	0.00130	97 407	47.60	81	47 551	0.07451	45 788	7.29
32	97 344	0.00131	97 280	46.66	82	44 008	0.08267	42 196	6.83
33	97 216	0.00133	97 152	45.72	83	40 370	0.09181	38 521	6.40
34	97 087	0.00134	97 022	44.78	84	36 664	0.10202	34 794	6.00
35	96 957	0.00136	96 891	43.84	85	32 923	0.11337	31 054	5.62
36	96 825	0.00138	96 758	42.90	86	29 190	0.12583	27 346	5.28
37	96 691	0.00142	96 623	41.96	87	25 517	0.13908	23 730	4.97
38	96 554	0.00146	96 484	41.02	88	21 968	0.15272	20 272	4.69
39	96 413	0.00153	96 340	40.07	89	18 613	0.16639	17 041	4.45
40	96 266	0.00160	96 189	39.14	90	15 516	0.17975	14 094	4.23
41	96 111	0.00171	96 030	38.20	91	12 727	0.19246	11 474	4.06
42	95 947	0.00183	95 860	37.26	92	10 278	0.20446	9 198	3.91
43	95 771	0.00198	95 678	36.33	93	8 176	0.21449	7 271	3.78
44	95 582	0.00212	95 481	35.40	94	6 423	0.22152	5 685	3.69
45	95 379	0.00224	95 273	34.47	95	5 000	0.22623	4 412	3.60
46	95 165	0.00236	95 054	33.55	96	3 869	0.23118	3 404	3.51
47	94 941	0.00249	94 824	32.63	97	2 974	0.23743	2 607	3.42
48	94 704	0.00266	94 580	31.71	98	2 268	0.24339	1 981	3.33
49	94 452	0.00288	94 318	30.79	99	1 716	0.24936	1 493	3.25
					100	1 288	0.25533	(a)4 087	3.17

(a) At age 100, L100+ is shown.

x number of persons at exact age *x*

q*x* proportion dying between exact age *x* and exact age *x* + 1

L*x* number of person years lived within the age interval x to x + 1

e°*x* expectation of life at exact age *x*

6.31 AUSTRALIAN LIFE TABLE, Females, 1999–2001

Age	lx	qx	Lx	$e^{o}x$	Age	lx	qx	Lx	$e^{o}x$
0	100 000	0.00476	99 584	82.41	50	96 850	0.00200	96 755	34.11
1	99 524	0.00046	99 498	81.81	51	96 657	0.00218	96 553	33.18
2	99 478	0.00020	99 467	80.84	52	96 446	0.00239	96 332	32.25
3	99 458	0.00017	99 450	79.86	53	96 215	0.00263	96 091	31.32
4	99 441	0.00016	99 433	78.87	54	95 962	0.00290	95 825	30.40
5	99 426	0.00014	99 418	77.89	55	95 684	0.00320	95 534	29.49
6	99 412	0.00012	99 405	76.90	56	95 378	0.00352	95 213	28.58
7	99 400	0.00010	99 394	75.91	57	95 043	0.00387	94 862	27.68
8	99 390	0.00009	99 385	74.91	58	94 675	0.00425	94 477	26.79
9	99 381	0.00008	99 377	73.92	59	94 273	0.00465	94 057	25.90
10	99 373	0.00008	99 369	72.93	60	93 835	0.00508	93 600	25.02
11	99 365	0.00009	99 360	71.93	61	93 358	0.00553	93 103	24.14
12	99 356	0.00011	99 350	70.94	62	92 842	0.00601	92 567	23.28
13	99 345	0.00013	99 339	69.95	63	92 284	0.00651	91 988	22.41
14	99 332	0.00016	99 324	68.96	64	91 683	0.00711	91 362	21.56
15	99 316	0.00021	99 306	67.97	65	91 032	0.00783	90 681	20.71
16	99 296	0.00026	99 283	66.98	66	90 319	0.00869	89 933	19.87
17	99 270	0.00031	99 255	66.00	67	89 534	0.00971	89 107	19.04
18	99 239	0.00035	99 222	65.02	68	88 665	0.01087	88 191	18.22
19	99 205	0.00038	99 186	64.04	69	87 701	0.01218	87 176	17.41
20	99 167	0.00039	99 148	63.06	70	86 633	0.01365	86 052	16.62
21	99 129	0.00039	99 110	62.09	71	85 451	0.01528	84 809	15.84
22	99 090	0.00039	99 071	61.11	72	84 145	0.01706	83 439	15.08
23	99 052	0.00039	99 033	60.14	73	82 709	0.01901	81 935	14.34
24	99 014	0.00039	98 995	59.16	74	81 137	0.02113	80 291	13.60
25	98 975	0.00040	98 956	58.18	75	79 422	0.02344	78 504	12.89
26	98 936	0.00041	98 916	57.21	76	77 561	0.02602	76 565	12.18
27	98 895	0.00042	98 874	56.23	77	75 542	0.02901	74 462	11.50
28	98 854	0.00043	98 832	55.25	78	73 351	0.03251	72 176	10.82
29	98 811	0.00045	98 789	54.28	79	70 966	0.03663	69 685	10.17
30	98 766	0.00047	98 744	53.30	80	68 366	0.04148	66 969	9.54
31	98 720	0.00049	98 697	52.32	81	65 530	0.04717	64 007	8.93
32	98 672	0.00051	98 647	51.35	82	62 439	0.05379	60 782	8.35
33	98 622	0.00054	98 595	50.38	83	59 081	0.06141	57 289	7.79
34	98 568	0.00058	98 540	49.40	84	55 452	0.07001	53 531	7.27
35	98 511	0.00062	98 481	48.43	85	51 570	0.07952	49 536	6.78
36	98 450	0.00067	98 417	47.46	86	47 469	0.08990	45 347	6.32
37	98 384	0.00072	98 349	46.49	87	43 202	0.10107	41 024	5.89
38	98 313	0.00078	98 275	45.53	88	38 835	0.11299	36 640	5.50
39	98 237	0.00084	98 196	44.56	89	34 447	0.12559	32 276	5.14
40	98 154	0.00091	98 110	43.60	90	30 121	0.13882	28 015	4.80
41	98 064	0.00099	98 017	42.64	91	25 940	0.15260	23 939	4.50
42	97 967	0.00107	97 916	41.68	92	21 981	0.16703	20 119	4.22
43	97 863	0.00116	97 806	40.72	93	18 310	0.18185	16 614	3.97
44	97 749	0.00126	97 688	39.77	94	14 980	0.19656	13 475	3.74
45	97 626	0.00136	97 561	38.82	95	12 036	0.21078	10 733	3.53
46	97 493	0.00147	97 423	37.87	96	9 499	0.22439	8 400	3.35
47	97 350	0.00159	97 274	36.93	97	7 367	0.23723	6 463	3.18
48	97 195	0.00171	97 113	35.98	98	5 620	0.25004	4 891	3.01
49	97 029	0.00185	96 941	35.04	99	4 214	0.26449	3 635	2.86
					100	3 100	0.27880	(a)8 417	2.72

(a) At age 100, L100+ is shown.

lx number of persons at exact age x

qx proportion dying between exact age x and exact age x + 1

Lx number of person years lived within the age interval x to x + 1

$e^{o}x$ expectation of life at exact age x

6.32 EXPECTATION OF LIFE, Australia(a)

Selected years(b)	*AGE (YEARS) 0*	*1*	*10*	*20*	*30*	*40*	*50*	*60*	*70*	*80*
					MALES					
1981	71.38	71.19	62.47	52.89	43.59	34.14	25.19	17.32	10.87	6.32
1986	72.77	72.50	63.74	54.13	44.84	35.39	26.27	18.10	11.46	6.56
1991	74.35	73.94	65.12	55.44	46.09	36.68	27.50	19.07	12.10	6.84
1994–1996	75.22	74.70	65.86	56.15	46.79	37.41	28.18	19.62	12.45	7.04
1995–1997	75.57	75.04	66.20	56.50	47.15	37.77	28.53	19.93	12.69	7.20
1996–1998	75.86	75.31	66.48	56.77	47.43	38.05	28.80	20.18	12.86	7.32
1997–1999	76.22	75.68	66.84	57.12	47.79	38.41	29.16	20.50	13.10	7.50
1998–2000	76.56	76.01	67.16	57.44	48.10	38.73	29.47	20.78	13.30	7.59
1999–2001	77.03	76.49	67.63	57.90	48.54	39.14	29.88	21.17	13.59	7.76
					FEMALES					
1981	78.42	78.11	69.33	59.52	49.79	40.11	30.81	22.09	14.33	8.05
1986	79.13	78.74	69.94	60.13	50.41	40.71	31.33	22.54	14.69	8.30
1991	80.29	79.79	70.94	61.10	51.37	41.68	32.22	23.30	15.26	8.68
1994–1996	81.05	80.46	71.60	61.76	51.98	42.28	32.80	23.83	15.67	8.92
1995–1997	81.27	80.68	71.81	61.97	52.20	42.50	33.01	24.03	15.84	9.02
1996–1998	81.52	80.91	72.04	62.20	52.43	42.73	33.25	24.25	16.01	9.13
1997–1999	81.77	81.17	72.30	62.46	52.70	43.01	33.53	24.49	16.20	9.26
1998–2000	82.04	81.43	72.56	62.71	52.96	43.26	33.78	24.72	16.38	9.36
1999–2001	82.41	81.81	72.93	63.06	53.30	43.60	34.11	25.02	16.62	9.54

(a) Based on annual life tables calculated by the Australian Bureau of Statistics until 1994 and from 1999. From 1995 to 1998 the life tables were produced as a joint venture between the Australian Bureau of Statistics and the Australian Government Actuary. See paragraph 27 of the Explanatory Notes for more information.

(b) From 1995 onwards expectation of life has been calculated using three years of data.

6.33 PROBABILITY OF SURVIVAL FROM BIRTH TO SPECIFIC AGES, Australia(a)

	AGE (YEARS)								
	1	*10*	*20*	*30*	*40*	*50*	*60*	*70*	*80*
Selected years(b)	%	%	%	%	%	%	%	%	%
				MALES					
1981	98.9	98.5	97.7	96.3	95.0	91.6	82.5	63.4	32.4
1986	99.0	98.7	98.0	96.6	95.3	92.5	84.9	67.0	36.7
1991	99.2	99.0	98.4	97.2	95.8	93.3	87.0	71.0	41.5
1993–1995	99.3	99.1	98.6	97.4	95.9	93.6	87.8	72.5	43.5
1994–1996	99.4	99.1	98.7	97.4	96.0	93.7	88.1	73.2	44.3
1995–1997	99.4	99.2	98.7	97.4	96.0	93.8	88.3	74.0	45.7
1996–1998	99.4	99.2	98.7	97.4	96.0	93.9	88.6	74.7	46.7
1997–1999	99.4	99.2	98.7	97.5	96.1	93.9	88.8	75.5	48.0
1998–2000	99.4	99.2	98.8	97.5	96.1	94.0	89.1	76.3	49.3
1999–2001	99.4	99.2	98.8	97.6	96.3	94.2	89.4	77.3	51.0
				FEMALES					
1981	99.1	98.8	98.5	98.1	97.3	95.4	90.8	79.9	56.0
1986	99.2	99.0	98.7	98.2	97.5	95.8	91.5	81.1	58.1
1991	99.4	99.2	98.9	98.5	97.8	96.3	92.6	83.3	61.4
1993–1995	99.5	99.3	99.0	98.6	98.0	96.6	93.0	84.2	63.1
1994–1996	99.5	99.3	99.1	98.7	98.1	96.7	93.1	84.5	63.7
1995–1997	99.5	99.3	99.1	98.7	98.1	96.7	93.2	84.9	64.5
1996–1998	99.5	99.4	99.1	98.7	98.1	96.7	93.3	85.2	65.4
1997–1999	99.5	99.4	99.1	98.7	98.1	96.7	93.5	85.7	66.3
1998–2000	99.5	99.4	99.1	98.7	98.1	96.7	93.6	86.1	67.3
1999–2001	99.5	99.4	99.2	98.8	98.2	96.9	93.8	86.6	68.4

(a) Based on annual life tables calculated by the Australian Bureau of Statistics until 1994 and from 1999. From 1995 to 1998 the life tables were produced as a joint venture between the Australian Bureau of Statistics and the Australian Government Actuary. See paragraph 27 of the Explanatory Notes for more information.

(b) From 1995 onwards, expectation of life has been calculated using three years of data.

6.34 DEATHS, Indigenous people

	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(a)
DEATHS REGISTERED AS INDIGENOUS									
1991	206	50	—	135	401	3	412	—	1 208
1992	165	53	—	107	346	5	397	—	1 074
1993	194	50	—	111	386	6	376	9	1 134
1994	207	50	—	123	377	3	380	10	1 153
1995	224	50	—	121	384	3	387	9	1 182
1996	177	49	258	118	370	—	328	5	1 306
1997	88	93	531	132	351	5	458	4	1 662
1998	462	123	593	127	378	13	415	3	2 114
1999	435	130	529	116	350	11	399	6	1 976
2000	473	108	535	144	407	8	450	—	2 127
2001	481	93	565	125	336	32	429	—	2 063
PROJECTED INDIGENOUS DEATHS (1991 Census-based experimental projections)(b)									
1996	528	114	613	128	390	56	379	10	2 220
1997	537	116	623	131	394	57	386	11	2 257
1998	547	118	634	133	400	59	391	11	2 295
1999	556	121	644	135	406	61	397	12	2 334
2000	567	123	655	137	411	62	404	13	2 374
2001	578	125	667	140	418	63	411	13	2 417
PROJECTED INDIGENOUS DEATHS (1996 Census-based experimental estimates and projections)									
1996(c)	950	211	900	189	494	124	452	18	3 341
1997(d)	966	215	915	193	499	126	460	20	3 397
1998(d)	984	219	936	199	509	130	471	21	3 472
1999(d)	1 010	222	960	202	518	133	482	22	3 552
2000(d)	1 035	225	983	208	529	139	491	22	3 634
2001(d)	1 060	228	1 007	212	540	144	502	24	3 719
ESTIMATED COVERAGE OF INDIGENOUS DEATHS (1991 Census-based) (%)									
1996	34	43	42	92	95	—	87	50	59
1997	16	80	85	101	89	9	119	36	74
1998	84	104	94	95	95	22	106	27	92
1999	78	107	82	86	86	18	101	50	85
2000	83	88	82	105	99	13	111	—	90
2001	83	74	85	89	80	51	104	—	85
ESTIMATED COVERAGE OF INDIGENOUS DEATHS (1996 Census-based) (%)									
1996	19	23	29	62	75	—	73	28	39
1997	9	43	58	68	70	4	100	20	49
1998	47	56	63	64	74	10	88	14	61
1999	43	59	55	57	68	8	83	27	56
2000	46	48	54	69	77	6	92	—	59
2001	45	41	56	59	62	22	85	—	55

(a) Includes Other Territories.

(b) *Source: Experimental Projections of the Aboriginal and Torres Strait Islander Population, 1991–2001* (cat. no. 3231.0), medium series.

(c) *Source*: *Experimental Estimates of the Aboriginal and Torres Strait Islander Population, 1991–1996,* ABS data available on request.

(d) *Source: Experimental Projections of the Aboriginal and Torres Strait Islander Population, 1996–2006* (cat. no. 3231.0), low series.

6.35 MEDIAN AGE AT DEATH(a), Males, Selected years

	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(b)
INDIGENOUS(c)									
1991	n.p.	n.p.	n.p.	41.8	49.3	n.p.	46.8	n.p.	46.2
1992	n.p.	n.p.	n.p.	37.5	51.8	n.p.	49.3	n.p.	49.7
1993	n.p.	n.p.	n.p.	40.5	48.5	n.p.	47.0	n.p.	47.7
1994	n.p.	n.p.	n.p.	51.3	51.8	n.p.	46.6	n.p.	48.3
1995	n.p.	n.p.	n.p.	45.3	49.3	n.p.	50.1	n.p.	48.6
1996	n.p.	n.p.	49.3	47.3	48.5	n.p.	47.0	n.p.	47.9
1997	n.p.	n.p.	50.6	50.3	48.6	n.p.	48.7	n.p.	49.8
1998	50.3	56.5	46.9	44.0	45.0	n.p.	45.5	n.p.	47.7
1999	51.3	51.0	48.9	46.5	49.3	n.p.	47.5	n.p.	48.9
2000	53.9	51.5	53.9	49.5	46.6	n.p.	46.2	n.p.	50.8
2001	56.3	53.0	52.5	51.0	52.0	n.p.	45.1	n.p.	52.0
NON-INDIGENOUS									
1991	n.p.	n.p.	n.p.	73.7	72.8	n.p.	58.1	n.p.	72.3
1992	n.p.	n.p.	n.p.	73.5	72.9	n.p.	59.2	n.p.	72.7
1993	n.p.	n.p.	n.p.	73.8	73.1	n.p.	57.4	n.p.	73.0
1994	n.p.	n.p.	n.p.	74.4	73.6	n.p.	59.9	n.p.	73.6
1995	n.p.	n.p.	n.p.	74.4	73.6	n.p.	58.1	n.p.	73.6
1996	n.p.	n.p.	73.4	74.7	74.2	n.p.	57.4	n.p.	74.2
1997	n.p.	n.p.	73.6	75.4	74.2	n.p.	61.7	n.p.	74.4
1998	74.7	75.1	74.4	75.6	74.1	n.p.	56.3	n.p.	74.7
1999	75.0	75.3	74.5	76.0	74.8	n.p.	60.4	n.p.	75.0
2000	75.5	75.9	75.3	76.3	75.1	n.p.	61.1	n.p.	75.5
2001	75.7	76.1	75.1	76.9	75.4	n.p.	63.2	n.p.	75.8
TOTAL									
1991	72.0	72.6	71.9	73.5	72.2	73.1	53.3	67.3	72.2
1992	72.5	73.2	72.1	73.4	72.5	74.1	54.2	69.1	72.6
1993	72.8	73.5	72.6	73.7	72.6	73.1	53.5	69.8	72.9
1994	73.5	74.0	73.2	74.3	73.1	74.0	53.8	69.3	73.5
1995	73.7	73.9	73.0	74.3	73.3	73.8	54.0	70.5	73.5
1996	74.1	74.7	73.2	74.5	73.7	74.2	54.1	71.4	74.0
1997	74.3	74.7	73.3	75.2	73.6	75.2	56.3	72.5	74.2
1998	74.5	75.0	74.0	75.4	73.7	75.0	52.2	72.7	74.5
1999	74.8	75.2	74.2	75.8	74.3	75.4	55.5	72.3	74.8
2000	75.3	75.8	75.0	76.1	74.4	75.1	55.7	73.5	75.3
2001	75.6	76.1	74.7	76.7	74.8	76.0	55.6	72.1	75.5

(a) Median age at death does not adjust for the age structure of the populations involved.

(b) Includes Other Territories.

(c) See table 6.34 and Explanatory Notes 10–15 for the estimated coverage of Indigenous deaths.

6.36 MEDIAN AGE AT DEATH(a), Females, Selected years

	NSW	Vic.	Qld	SA	WA	Tas.	NT	ACT	Aust.(b)
INDIGENOUS(c)									
1991	n.p.	n.p.	n.p.	49.0	59.4	n.p.	52.8	n.p.	55.5
1992	n.p.	n.p.	n.p.	56.0	58.1	n.p.	55.6	n.p.	56.8
1993	n.p.	n.p.	n.p.	56.0	61.5	n.p.	52.0	n.p.	57.4
1994	n.p.	n.p.	n.p.	49.5	62.7	n.p.	60.2	n.p.	59.7
1995	n.p.	n.p.	n.p.	52.0	59.3	n.p.	56.6	n.p.	57.6
1996	n.p.	n.p.	59.0	55.0	58.0	n.p.	54.0	n.p.	57.7
1997	n.p.	n.p.	57.7	52.5	57.8	n.p.	52.3	n.p.	56.8
1998	58.0	63.3	59.3	50.5	57.0	n.p.	49.7	n.p.	57.0
1999	60.8	65.0	60.3	50.5	55.3	n.p.	56.3	n.p.	58.8
2000	59.4	55.5	61.3	56.3	56.0	n.p.	54.0	n.p.	57.4
2001	62.9	63.8	54.1	55.5	54.0	n.p.	52.8	n.p.	57.6
NON-INDIGENOUS									
1991	n.p.	n.p.	n.p.	79.7	78.9	n.p.	57.0	n.p.	78.9
1992	n.p.	n.p.	n.p.	79.9	79.4	n.p.	68.2	n.p.	79.4
1993	n.p.	n.p.	n.p.	80.0	80.1	n.p.	66.0	n.p.	79.6
1994	n.p.	n.p.	n.p.	81.0	80.1	n.p.	69.6	n.p.	80.2
1995	n.p.	n.p.	n.p.	80.8	80.6	n.p.	66.0	n.p.	80.4
1996	n.p.	n.p.	80.2	81.2	81.2	n.p.	65.3	n.p.	80.8
1997	n.p.	n.p.	80.7	81.6	81.2	n.p.	66.0	n.p.	81.1
1998	81.0	81.8	80.6	82.1	81.1	n.p.	68.0	n.p.	81.2
1999	81.4	81.8	81.4	82.2	81.8	n.p.	71.3	n.p.	81.6
2000	82.1	82.0	81.7	82.3	81.6	n.p.	63.0	n.p.	81.9
2001	81.9	82.1	81.7	82.4	81.9	n.p.	71.5	n.p.	81.9
TOTAL									
1991	78.8	79.1	78.4	79.5	78.4	78.9	54.1	74.7	78.8
1992	79.3	80.1	78.7	79.8	79.0	79.4	59.4	75.3	79.3
1993	79.5	80.1	79.0	79.9	79.8	79.0	56.7	77.3	79.5
1994	80.1	80.6	79.7	80.9	79.7	79.3	63.9	78.3	80.2
1995	80.2	80.9	79.7	80.7	80.3	79.7	60.3	75.9	80.3
1996	80.6	81.3	80.1	81.1	80.8	79.8	60.8	77.5	80.7
1997	81.1	81.4	80.4	81.5	80.8	80.2	57.5	78.8	81.0
1998	80.9	81.7	80.3	82.0	80.8	80.9	58.0	78.8	81.0
1999	81.3	81.8	81.2	82.2	81.5	80.5	61.7	79.5	81.4
2000	81.9	82.0	81.4	82.2	81.1	81.0	57.8	79.9	81.7
2001	81.8	82.1	81.4	82.4	81.5	81.2	61.4	81.3	81.8

(a) Median age at death does not adjust for the age structure of the populations involved.

(b) Includes Other Territories.

(c) See table 6.34 and Explanatory Notes 10–15 for estimated coverage of Indigenous deaths.

6.37 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, Australia(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**1 218**	**845**	**2 063**	**120 750**	**128 544**
Age at death (years)						
0	no.	72	49	121	1 120	1 309
1–14	no.	30	20	50	517	602
15–24	no.	71	32	103	1 325	1 510
25–34	no.	132	58	190	1 937	2 247
35–44	no.	173	109	282	3 130	3 592
45–54	no.	181	125	306	6 053	6 609
55–64	no.	207	141	348	10 910	11 725
65 and over	no.	352	311	663	95 747	100 934
Not stated	no.	—	—	—	11	16
Median age at death	years	52.0	57.6	54.2	78.7	78.5
Indirect standardised death rate (ISDR)(c)	rate	16.1	9.3	12.4	5.3	5.6
Infant mortality rate(d)	rate	12.2	8.9	10.6	4.9	5.3
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	163	166	329	34 946	36 750
Digestive organs (C15–C26)	no.	47	25	72	9 872	10 380
Trachea, bronchus and lung (C33,C34)	no.	49	33	82	6 671	7 038
Diabetes mellitus (E10–E14)	no.	65	84	149	2 802	3 078
Mental and behavioural disorders (F00–F99)	no.	37	15	52	2 512	2 704
Diseases of the circulatory system (I00–I99)	no.	364	231	595	46 541	49 326
Ischaemic heart diseases (I20–I25)	no.	238	124	362	24 700	26 234
Cerebrovascular diseases (I60–I69)	no.	55	36	91	11 517	12 146
Diseases of the respiratory system (J00–J99)	no.	117	77	194	9 927	10 626
Chronic lower respiratory diseases (J40–J47)	no.	75	45	120	5 507	5 916
Diseases of the digestive system (K00–K93)	no.	53	43	96	3 776	4 089
Diseases of the liver (K70–K77)	no.	34	28	62	1 072	1 196
Certain conditions originating in the perinatal period (P00–P96)	no.	35	24	59	592	681
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	22	7	29	542	614
All other medical conditions (remainder of (A00–R99)	no.	118	99	217	11 952	12 800
External causes of morbidity and mortality (V01–Y98)	no.	244	99	343	7 160	7 876
Transport accidents (V01–V99)	no.	58	23	81	1 809	2 004
Intentional self-harm (X60–X84)	no.	83	22	105	2 253	2 454
Assault (X85–Y09)	no.	25	21	46	234	300
Other external causes (remainder of (V01–Y98)	no.	78	33	111	2 864	3 118

(a) 2001 coverage of Indigenous deaths Australia-wide has been estimated at 85% on 1991 Census-based projections and 55% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the 2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.38 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, New South Wales(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**276**	**205**	**481**	**42 598**	**44 552**
Age at death (years)						
0	no.	15	7	22	408	449
1–14	no.	3	3	6	171	192
15–24	no.	7	5	12	440	472
25–34	no.	29	14	43	622	688
35–44	no.	36	18	54	1 059	1 156
45–54	no.	40	23	63	2 054	2 185
55–64	no.	47	44	91	3 859	4 068
65 and over	no.	99	91	190	33 980	35 336
Not stated	no.	—	—	—	5	6
Median age at death	years	56.3	62.9	59.6	78.7	78.5
Indirect standardised death rate (ISDR)(c)	rate	12.5	7.7	9.9	5.4	5.6
Infant mortality rate(d)	rate	9.2	4.7	7.1	5.0	5.3
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	45	50	95	12 207	12 665
Digestive organs (C15–C26)	no.	11	6	17	3 300	3 427
Trachea, bronchus and lung (C33,C34)	no.	17	11	28	2 355	2 453
Diabetes mellitus (E10–E14)	no.	9	9	18	800	836
Mental and behavioural disorders (F00–F99)	no.	10	5	15	865	908
Diseases of the circulatory system (I00–I99)	no.	100	77	177	16 892	17 660
Ischaemic heart diseases (I20–I25)	no.	74	44	118	8 635	9 093
Cerebrovascular diseases (I60–I69)	no.	9	10	19	4 339	4 498
Diseases of the respiratory system (J00–J99)	no.	26	20	46	3 475	3 654
Chronic lower respiratory diseases (J40–J47)	no.	18	15	33	1 943	2 049
Diseases of the digestive system (K00–K93)	no.	11	7	18	1 331	1 410
Diseases of the liver (K70–K77)	no.	10	6	16	403	443
Certain conditions originating in the perinatal period (P00–P96)	no.	8	5	13	223	245
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	6	—	6	189	206
All other medical conditions (remainder of (A00–R99)	no.	17	11	28	4 203	4 412
External causes of morbidity and mortality (V01–Y98)	no.	44	21	65	2 413	2 556
Transport accidents (V01–V99)	no.	10	4	14	557	596
Intentional self-harm (X60–X84)	no.	13	5	18	750	785
Assault (X85–Y09)	no.	5	3	8	99	109
Other external causes (remainder of (V01–Y98)	no.	16	9	25	1 007	1 066

(a) 2001 coverage of Indigenous deaths in New South Wales has been estimated at 83% on 1991 Census-based projections and 45% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.39 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, Victoria(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**54**	**39**	**93**	**28 893**	**32 295**
Age at death (years)						
0	no.	—	—	—	250	284
1–14	no.	n.p.	n.p.	4	100	118
15–24	no.	—	—	—	280	325
25–34	no.	8	6	14	455	529
35–44	no.	5	3	8	698	796
45–54	no.	11	4	15	1 412	1 559
55–64	no.	6	4	10	2 475	2 735
65 and over	no.	19	19	38	23 221	25 943
Not stated	no.	—	—	—	—	6
Median age at death	years	53.0	63.8	55.5	79.0	79.0
Indirect standardised death rate (ISDR)(c)	rate	10.9	6.6	8.6	5.0	5.6
Infant mortality rate(d)	rate	n.p.	n.p.	n.p.	4.4	4.8
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	7	10	17	8 589	9 508
Digestive organs (C15–C26)	no.	n.p.	n.p.	n.p.	2 547	2 811
Trachea, bronchus and lung (C33,C34)	no.	n.p.	n.p.	5	1 618	1 792
Diabetes mellitus (E10–E14)	no.	n.p.	n.p.	6	872	969
Mental and behavioural disorders (F00–F99)	no.	n.p.	n.p.	n.p.	719	809
Diseases of the circulatory system (I00–I99)	no.	18	11	29	10 745	12 027
Ischaemic heart diseases (I20–I25)	no.	13	6	19	5 632	6 295
Cerebrovascular diseases (I60–I69)	no.	4	3	7	2 624	2 949
Diseases of the respiratory system (J00–J99)	no.	n.p.	n.p.	7	2 342	2 634
Chronic lower respiratory diseases (J40–J47)	no.	n.p.	n.p.	7	1 406	1 590
Diseases of the digestive system (K00–K93)	no.	n.p.	n.p.	n.p.	907	1 022
Diseases of the liver (K70–K77)	no.	n.p.	n.p.	n.p.	238	261
Certain conditions originating in the perinatal period (P00–P96)	no.	n.p.	n.p.	n.p.	140	159
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	n.p.	n.p.	n.p.	112	134
All other medical conditions (remainder of (A00–R99)	no.	5	4	9	2 944	3 306
External causes of morbidity and mortality (V01–Y98)	no.	13	5	18	1 523	1 727
Transport accidents (V01–V99)	no.	n.p.	n.p.	4	427	492
Intentional self-harm (X60–X84)	no.	n.p.	n.p.	7	485	541
Assault (X85–Y09)	no.	—	—	—	45	55
Other external causes (remainder of (V01–Y98)	no.	4	3	7	566	639

(a) 2001 coverage of Indigenous deaths in Victoria has been estimated at 74% on 1991 Census-based projections and 41% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the 2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.40 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, Queensland(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**326**	**239**	**565**	**22 003**	**22 856**
Age at death (years)						
0	no.	22	16	38	238	282
1–14	no.	9	8	17	125	144
15–24	no.	23	13	36	291	332
25–34	no.	27	11	38	386	432
35–44	no.	41	33	74	632	713
45–54	no.	53	43	96	1 230	1 338
55–64	no.	59	34	93	2 157	2 279
65 and over	no.	92	81	173	16 944	17 336
Not stated	no.	—	—	—	—	—
Median age at death	years	52.5	54.1	53.2	78.1	77.8
Indirect standardised death rate (ISDR)(c)	rate	16.1	9.8	12.6	5.6	5.7
Infant mortality rate(d)	rate	12.9	9.8	11.4	5.5	5.9
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	47	57	104	6 297	6 477
Digestive organs (C15–C26)	no.	13	6	19	1 778	1 819
Trachea, bronchus and lung (C33,C34)	no.	17	11	28	1 216	1 261
Diabetes mellitus (E10–E14)	no.	18	23	41	459	509
Mental and behavioural disorders (F00–F99)	no.	n.p.	n.p.	9	370	388
Diseases of the circulatory system (I00–I99)	no.	96	62	158	8 654	8 919
Ischaemic heart diseases (I20–I25)	no.	68	35	103	4 877	5 040
Cerebrovascular diseases (I60–I69)	no.	12	8	20	2 137	2 184
Diseases of the respiratory system (J00–J99)	no.	33	23	56	1 722	1 803
Chronic lower respiratory diseases (J40–J47)	no.	25	10	35	983	1 028
Diseases of the digestive system (K00–K93)	no.	10	11	21	682	715
Diseases of the liver (K70–K77)	no.	6	5	11	189	204
Certain conditions originating in the perinatal period (P00–P96)	no.	10	10	20	124	146
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	n.p.	n.p.	9	122	136
All other medical conditions (remainder of (A00–R99)	no.	32	26	58	2 037	2 117
External causes of morbidity and mortality (V01–Y98)	no.	66	23	89	1 536	1 646
Transport accidents (V01–V99)	no.	n.p.	n.p.	10	413	429
Intentional self-harm (X60–X84)	no.	34	8	42	453	499
Assault (X85–Y09)	no.	n.p.	n.p.	8	52	61
Other external causes (remainder of (V01–Y98)	no.	22	7	29	618	657

(a) 2001 coverage of Indigenous deaths in Queensland has been estimated at 85% on 1991 Census-based projections and 56% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the 2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.41 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, South Australia(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**74**	**51**	**125**	**11 444**	**11 891**
Age at death (years)						
0	no.	n.p.	n.p.	n.p.	75	79
1–14	no.	n.p.	n.p.	n.p.	39	42
15–24	no.	n.p.	n.p.	5	84	95
25–34	no.	10	3	13	150	173
35–44	no.	12	7	19	286	324
45–54	no.	11	13	24	471	513
55–64	no.	15	10	25	910	962
65 and over	no.	17	16	33	9 429	9 703
Not stated	no.	—	—	—	—	—
Median age at death	years	51.0	55.5	53.2	79.8	79.6
Indirect standardised death rate (ISDR)(c)	rate	18.3	10.1	13.7	5.6	5.8
Infant mortality rate(d)	rate	9.7	9.9	4.9	4.7	4.6
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	10	8	18	3 221	3 301
Digestive organs (C15–C26)	no.	n.p.	n.p.	4	921	947
Trachea, bronchus and lung (C33,C34)	no.	n.p.	n.p.	n.p.	587	598
Diabetes mellitus (E10–E14)	no.	5	5	10	251	263
Mental and behavioural disorders (F00–F99)	no.	n.p.	n.p.	n.p.	222	235
Diseases of the circulatory system (I00–I99)	no.	14	17	31	4 510	4 665
Ischaemic heart diseases (I20–I25)	no.	10	8	18	2 490	2 567
Cerebrovascular diseases (I60–I69)	no.	3	5	8	1 069	1 107
Diseases of the respiratory system (J00–J99)	no.	6	6	12	1 149	1 196
Chronic lower respiratory diseases (J40–J47)	no.	3	4	7	472	490
Diseases of the digestive system (K00–K93)	no.	n.p.	n.p.	6	361	382
Diseases of the liver (K70–K77)	no.	n.p.	n.p.	4	115	124
Certain conditions originating in the perinatal period (P00–P96)	no.	n.p.	n.p.	n.p.	40	41
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	n.p.	n.p.	n.p.	44	45
All other medical conditions (remainder of (A00–R99)	no.	7	5	12	1 106	1 147
External causes of morbidity and mortality (V01–Y98)	no.	23	8	31	540	616
Transport accidents (V01–V99)	no.	n.p.	n.p.	10	140	160
Intentional self-harm (X60–X84)	no.	5	3	8	186	207
Assault (X85–Y09)	no.	n.p.	n.p.	4	13	21
Other external causes (remainder of (V01–Y98)	no.	5	4	9	201	228

(a) 2001 coverage of Indigenous deaths in South Australia has been estimated at 89% on 1991 Census-based projections and 59% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the 2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.42 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, Western Australia(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**210**	**126**	**336**	**10 265**	**10 779**
Age at death (years)						
0	no.	14	12	26	87	122
1–14	no.	n.p.	n.p.	6	60	69
15–24	no.	16	5	21	153	180
25–34	no.	19	12	31	205	250
35–44	no.	28	19	47	314	373
45–54	no.	27	16	43	533	586
55–64	no.	39	18	57	909	996
65 and over	no.	62	43	105	8 003	8 202
Not stated	no.	—	—	—	—	—
Median age at death	years	52.0	54.0	53.0	78.4	77.9
Indirect standardised death rate (ISDR)(c)	rate	18.3	9.2	13.4	5.2	5.4
Infant mortality rate(d)	rate	17.7	14.9	16.3	4.1	5.1
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	24	17	41	3 058	3 130
Digestive organs (C15–C26)	no.	8	4	12	879	900
Trachea, bronchus and lung (C33,C34)	no.	n.p.	n.p.	7	596	610
Diabetes mellitus (E10–E14)	no.	15	21	36	269	310
Mental and behavioural disorders (F00–F99)	no.	n.p.	n.p.	11	246	260
Diseases of the circulatory system (I00–I99)	no.	60	26	86	3 677	3 821
Ischaemic heart diseases (I20–I25)	no.	30	11	41	1 986	2 070
Cerebrovascular diseases (I60–I69)	no.	17	5	22	863	892
Diseases of the respiratory system (J00–J99)	no.	15	11	26	765	805
Chronic lower respiratory diseases (J40–J47)	no.	4	3	7	396	410
Diseases of the digestive system (K00–K93)	no.	12	11	23	325	357
Diseases of the liver (K70–K77)	no.	5	6	11	77	91
Certain conditions originating in the perinatal period (P00–P96)	no.	4	3	7	39	48
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	n.p.	n.p.	8	40	52
All other medical conditions (remainder of (A00–R99)	no.	22	18	40	1 111	1 173
External causes of morbidity and mortality (V01–Y98)	no.	43	15	58	735	823
Transport accidents (V01–V99)	no.	13	6	19	169	199
Intentional self-harm (X60–X84)	no.	n.p.	n.p.	10	251	269
Assault (X85–Y09)	no.	n.p.	n.p.	9	13	25
Other external causes (remainder of (V01–Y98)	no.	15	5	20	302	330

(a) 2001 coverage of Indigenous deaths in Western Australia has been estimated at 80% on 1991 Census-based projections and 62% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the 2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.43 INDIGENOUS, NON-INDIGENOUS AND TOTAL DEATHS, Northern Territory(a)

		INDIGENOUS			NON-INDIGENOUS	TOTAL(b)
		Males	*Females*	*Persons*	*Persons*	*Persons*
Total deaths	no.	**259**	**170**	**429**	**436**	**872**
Age at death (years)						
0	no.	17	10	27	14	41
1–14	no.	6	8	14	3	17
15–24	no.	20	7	27	17	44
25–34	no.	35	12	47	27	75
35–44	no.	51	28	79	23	103
45–54	no.	36	24	60	52	113
55–64	no.	38	28	66	81	149
65 and over	no.	56	53	109	219	330
Not stated	no.	—	—	—	—	—
Median age at death	years	45.1	52.8	48.4	65.1	58.2
Indirect standardised death rate (ISDR)(c)	rate	27.2	14.5	20.2	6.0	9.2
Infant mortality rate(d)	rate	19.2	12.5	16.0	6.6	10.7
Leading causes of death(e)						
Malignant neoplasms (C00–C97)	no.	28	20	48	122	171
Digestive organs (C15–C26)	no.	11	6	17	27	44
Trachea, bronchus and lung (C33,C34)	no.	7	3	10	30	41
Diabetes mellitus (E10–E14)	no.	14	24	38	8	46
Mental and behavioural disorders (F00–F99)	no.	7	4	11	3	13
Diseases of the circulatory system (I00–I99)	no.	68	35	103	132	239
Ischaemic heart diseases (I20–I25)	no.	36	17	53	84	137
Cerebrovascular diseases (I60–I69)	no.	9	5	14	16	33
Diseases of the respiratory system (J00–J99)	no.	30	13	43	31	74
Chronic lower respiratory diseases (J40–J47)	no.	18	9	27	22	49
Diseases of the digestive system (K00–K93)	no.	14	9	23	15	38
Diseases of the liver (K70–K77)	no.	9	7	16	5	21
Certain conditions originating in the perinatal period (P00–P96)	no.	11	4	15	9	24
Congenital malformations, deformations and chromosomal abnormalities (Q00–Q99)	no.	n.p.	n.p.	n.p.	5	9
All other medical conditions (remainder of (A00–R99)	no.	34	32	66	38	105
External causes of morbidity and mortality (V01–Y98)	no.	52	26	78	74	153
Transport accidents (V01–V99)	no.	14	10	24	23	47
Intentional self-harm (X60–X84)	no.	n.p.	n.p.	18	25	43
Assault (X85–Y09)	no.	7	10	17	3	20
Other external causes (remainder of (V01–Y98)	no.	15	4	19	23	43

(a) 2001 coverage of Indigenous deaths in the Northern Territory has been estimated at 104% on 1991 Census-based projections and 85% on 1996 Census-based projections. See table 6.34.

(b) Includes not stated.

(c) Per 1,000 population. See Glossary. The Indigenous population used for the ISDR is the 2001 Indigenous population (ABS data available on request). Standardised using age-specific death rates for the 1991 Australian population in 5 year age groups from 0–4 years to 75 years and over. The ISDR is derived using the ratio of observed deaths to expected deaths. Due to the undercoverage of Indigenous observed deaths, the ISDRs presented here are likely to be conservative estimates.

(d) Per 1,000 live births.

(e) Source: *Causes of Death, Australia, 2001* (cat. no. 3303.0).

6.44 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, Australia(a), 1999–2001

Age	*lx*	*qx*	*Lx*	*e°x*	*Age*	*lx*	*qx*	*Lx*	*e°x*
	MALES					FEMALES			
0	100 000	0.0239	97 900	56.3	0	100 000	0.0196	98 275	62.8
1–4	97 614	0.0044	389 333	56.6	1–4	98 039	0.0039	391 165	63.1
5–9	97 181	0.0024	485 322	52.9	5–9	97 659	0.0021	487 793	59.3
10–14	96 947	0.0025	484 123	48.0	10–14	97 458	0.0023	486 739	54.5
15–19	96 702	0.0145	480 013	43.1	15–19	97 237	0.0060	484 735	49.6
20–24	95 303	0.0196	471 836	38.7	20–24	96 657	0.0080	481 346	44.9
25–29	93 431	0.0287	460 453	34.4	25–29	95 881	0.0121	476 501	40.2
30–34	90 750	0.0393	444 837	30.4	30–34	94 719	0.0186	469 198	35.7
35–39	87 185	0.0506	424 887	26.5	35–39	92 960	0.0245	459 111	31.3
40–44	82 770	0.0720	398 957	22.8	40–44	90 685	0.0384	444 725	27.0
45–49	76 812	0.0962	365 582	19.4	45–49	87 206	0.0598	422 997	23.0
50–54	69 420	0.1234	325 692	16.2	50–54	81 993	0.0757	394 451	19.3
55–59	60 856	0.1776	277 270	13.1	55–59	75 787	0.1243	355 384	15.7
60–64	50 052	0.2513	218 809	10.4	60–64	66 367	0.1917	300 025	12.5
65–69	37 472	0.3479	154 773	8.0	65–69	53 643	0.2255	237 970	9.9
70–74	24 437	0.4722	93 338	6.0	70–74	41 545	0.3417	172 236	7.1
75 and over	12 898	1.0000	53 017	4.1	75 and over	27 350	1.0000	121 350	4.4

(a) Excludes Tasmania and the Australian Capital Territory.

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.45 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, New South Wales, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
	MALES					FEMALES			
0	100 000	0.0239	97 900	56.8	0	100 000	0.0196	98 275	63.6
1–4	97 614	0.0048	389 221	57.2	1–4	98 039	0.0023	391 601	63.9
5–9	97 141	0.0009	485 480	53.5	5–9	97 815	0.0023	488 504	60.0
10–14	97 051	0.0017	484 834	48.5	10–14	97 586	0.0016	487 546	55.1
15–19	96 882	0.0073	482 640	43.6	15–19	97 432	0.0030	486 422	50.2
20–24	96 174	0.0157	477 104	38.9	20–24	97 137	0.0076	483 836	45.4
25–29	94 668	0.0298	466 288	34.5	25–29	96 398	0.0095	479 699	40.7
30–34	91 847	0.0424	449 493	30.5	30–34	95 482	0.0179	473 140	36.1
35–39	87 950	0.0462	429 601	26.7	35–39	93 775	0.0232	463 424	31.7
40–44	83 890	0.0720	404 357	22.9	40–44	91 595	0.0292	451 282	27.4
45–49	77 853	0.0922	371 323	19.4	45–49	88 918	0.0448	434 628	23.1
50–54	70 677	0.0934	336 888	16.2	50–54	84 934	0.0748	408 786	19.1
55–59	64 078	0.1966	288 899	12.6	55–59	78 581	0.1060	372 075	15.4
60–64	51 481	0.2515	225 035	10.0	60–64	70 249	0.2260	311 563	12.0
65–69	38 533	0.3655	157 452	7.6	65–69	54 376	0.2087	243 509	9.7
70–74	24 448	0.5443	88 970	5.5	70–74	43 028	0.4018	171 920	6.6
75 and over	11 140	1.0000	45 082	4.1	75 and over	25 740	1.0000	113 530	4.4

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.46 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, Victoria, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
	MALES					FEMALES			
0	100 000	0.0239	97 900	56.8	0	100 000	0.0196	98 275	63.8
1–4	97 614	0.0019	390 011	57.1	1–4	98 039	0.0028	391 466	64.1
5–9	97 425	0.0049	485 937	53.3	5–9	97 767	0.0022	488 299	60.2
10–14	96 950	0.0017	484 329	48.5	10–14	97 553	0.0025	487 167	55.4
15–19	96 781	0.0000	478 060	43.6	15–19	97 314	0.0087	484 448	50.5
20–24	94 442	0.0261	466 055	39.6	20–24	96 466	0.0105	479 799	45.9
25–29	91 980	0.0347	451 929	35.6	25–29	95 454	0.0237	471 610	41.4
30–34	88 792	0.0500	432 872	31.8	30–34	93 190	0.0299	458 991	37.3
35–39	84 357	0.0453	412 231	28.3	35–39	90 407	0.0183	447 901	33.4
40–44	80 535	0.0454	393 527	24.5	40–44	88 754	0.0224	438 789	29.0
45–49	76 876	0.0964	365 854	20.6	45–49	86 762	0.0387	425 426	24.6
50–54	69 466	0.1643	318 791	17.5	50–54	83 408	0.0687	402 724	20.5
55–59	58 050	0.1266	271 878	15.5	55–59	77 681	0.1247	364 189	16.8
60–64	50 701	0.1588	233 372	12.3	60–64	67 994	0.1909	307 524	13.8
65–69	42 648	0.2631	185 188	9.2	65–69	55 015	0.1161	259 102	11.5
70–74	31 427	0.3956	126 056	6.6	70–74	48 626	0.2653	210 873	7.7
75 and over	18 995	1.0000	81 275	4.3	75 and over	35 723	1.0000	162 646	4.6

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.47 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, Queensland, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
	MALES					FEMALES			
0	100 000	0.0239	97 900	56.6	0	100 000	0.0196	98 275	62.5
1–4	97 614	0.0037	389 545	57.0	1–4	98 039	0.0034	391 298	62.7
5–9	97 258	0.0023	485 734	53.2	5–9	97 707	0.0023	487 965	58.9
10–14	97 036	0.0034	484 357	48.3	10–14	97 479	0.0018	486 971	54.0
15–19	96 707	0.0183	479 104	43.5	15–19	97 309	0.0060	485 080	49.1
20–24	94 935	0.0183	470 334	39.2	20–24	96 723	0.0077	481 752	44.4
25–29	93 199	0.0263	459 858	34.9	25–29	95 978	0.0111	477 217	39.7
30–34	90 745	0.0204	449 097	30.8	30–34	94 909	0.0157	470 834	35.2
35–39	88 894	0.0443	434 617	26.4	35–39	93 424	0.0200	462 462	30.7
40–44	84 953	0.0712	409 650	22.5	40–44	91 561	0.0438	447 787	26.3
45–49	78 907	0.0941	375 977	19.0	45–49	87 554	0.0758	421 172	22.3
50–54	71 484	0.1484	330 903	15.7	50–54	80 915	0.0716	390 097	19.0
55–59	60 878	0.1550	280 804	13.0	55–59	75 124	0.1337	350 520	15.2
60–64	51 444	0.2722	222 213	9.9	60–64	65 084	0.1817	295 856	12.2
65–69	37 441	0.3642	153 118	7.7	65–69	53 259	0.2773	229 369	9.4
70–74	23 807	0.5103	88 660	5.7	70–74	38 489	0.3512	158 655	7.0
75 and over	11 658	1.0000	47 407	4.1	75 and over	24 973	1.0000	109 820	4.4

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.48 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, South Australia, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
	MALES					FEMALES			
0	100 000	0.0239	97 900	55.1	0	100 000	0.0196	98 275	61.0
1–4	97 614	0.0053	389 094	55.4	1–4	98 039	0.0063	390 508	61.6
5–9	97 095	0.0039	484 530	51.7	5–9	97 423	0.0017	486 691	57.9
10–14	96 717	0.0017	483 162	46.9	10–14	97 254	0.0019	485 800	53.0
15–19	96 548	0.0149	479 145	42.0	15–19	97 066	0.0100	482 899	48.1
20–24	95 110	0.0168	471 551	37.6	20–24	96 093	0.0103	477 998	43.6
25–29	93 511	0.0271	461 219	33.2	25–29	95 106	0.0121	472 649	39.0
30–34	90 977	0.0533	442 753	29.0	30–34	93 953	0.0207	464 908	34.5
35–39	86 124	0.0774	413 947	25.5	35–39	92 010	0.0361	451 750	30.1
40–44	79 454	0.0663	384 101	22.4	40–44	88 690	0.0455	433 369	26.2
45–49	74 186	0.1009	352 222	18.8	45–49	84 657	0.1133	399 316	22.3
50–54	66 703	0.1491	308 656	15.7	50–54	75 069	0.0605	363 998	19.8
55–59	56 760	0.1910	256 693	13.0	55–59	70 530	0.1700	322 674	15.9
60–64	45 917	0.2451	201 457	10.5	60–64	58 539	0.1752	267 063	13.7
65–69	34 665	0.3830	140 136	8.1	65–69	48 286	0.1114	227 987	11.1
70–74	21 389	0.3964	85 746	6.5	70–74	42 909	0.3323	178 900	7.2
75 and over	12 909	1.0000	53 070	4.1	75 and over	28 651	1.0000	127 703	4.5

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.49 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, Western Australia, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
	MALES					FEMALES			
0	100 000	0.0239	97 900	55.5	0	100 000	0.0196	98 275	63.0
1–4	97 614	0.0066	388 739	55.9	1–4	98 039	0.0045	390 996	63.3
5–9	96 968	0.0049	483 663	52.3	5–9	97 598	0.0007	487 831	59.5
10–14	96 497	0.0025	481 887	47.5	10–14	97 534	0.0043	486 628	54.6
15–19	96 257	0.0143	477 857	42.6	15–19	97 117	0.0076	483 744	49.8
20–24	94 885	0.0231	468 953	38.2	20–24	96 381	0.0064	480 358	45.2
25–29	92 696	0.0305	456 408	34.0	25–29	95 762	0.0173	474 670	40.4
30–34	89 867	0.0473	438 702	30.0	30–34	94 105	0.0162	466 707	36.1
35–39	85 614	0.0523	416 876	26.4	35–39	92 577	0.0245	457 218	31.7
40–44	81 137	0.0711	391 257	22.7	40–44	90 310	0.0372	443 156	27.4
45–49	75 366	0.1109	355 934	19.3	45–49	86 953	0.0402	426 016	23.4
50–54	67 007	0.1081	316 932	16.3	50–54	83 454	0.0959	397 258	19.2
55–59	59 765	0.1868	270 922	13.0	55–59	75 449	0.1285	353 009	16.0
60–64	48 604	0.2745	209 660	10.4	60–64	65 754	0.1873	297 983	13.0
65–69	35 260	0.3214	147 969	8.4	65–69	53 439	0.2371	235 527	10.4
70–74	23 927	0.4358	93 569	6.2	70–74	40 772	0.2319	180 218	7.9
75 and over	13 500	1.0000	55 761	4.1	75 and over	31 315	1.0000	140 787	4.5

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.50 EXPERIMENTAL LIFE TABLE OF INDIGENOUS PEOPLE, Northern Territory, 1999–2001

Age	lx	qx	Lx	e°x	Age	lx	qx	Lx	e°x
	MALES					FEMALES			
0	100 000	0.0239	97 900	55.7	0	100 000	0.0196	98 275	62.1
1–4	97 614	0.0037	389 540	56.0	1–4	98 039	0.0063	390 512	62.3
5–9	97 256	0.0016	485 896	52.2	5–9	97 424	0.0023	486 550	58.7
10–14	97 103	0.0023	484 952	47.3	10–14	97 196	0.0026	485 361	53.8
15–19	96 878	0.0182	479 981	42.4	15–19	96 948	0.0073	482 969	48.9
20–24	95 114	0.0246	469 714	38.2	20–24	96 239	0.0092	478 986	44.3
25–29	92 771	0.0275	457 488	34.1	25–29	95 355	0.0095	474 505	39.7
30–34	90 224	0.0500	439 846	29.9	30–34	94 447	0.0225	466 934	35.0
35–39	85 714	0.0615	415 386	26.4	35–39	92 327	0.0344	453 691	30.8
40–44	80 440	0.0890	384 305	23.0	40–44	89 150	0.0534	433 854	26.8
45–49	73 282	0.0918	349 599	20.0	45–49	84 392	0.0649	408 264	23.2
50–54	66 558	0.1268	311 690	16.7	50–54	78 914	0.0745	379 877	19.6
55–59	58 118	0.1827	264 051	13.8	55–59	73 037	0.1234	342 659	16.0
60–64	47 502	0.2310	210 073	11.3	60–64	64 027	0.1543	295 440	12.9
65–69	36 527	0.3141	153 954	8.9	65–69	54 149	0.2358	238 832	9.8
70–74	25 054	0.3460	103 598	6.9	70–74	41 383	0.3532	170 372	7.0
75 and over	16 385	1.0000	69 053	4.2	75 and over	26 766	1.0000	118 506	4.4

lx number of persons at exact age *x*

qx proportion dying between exact age *x* and exact age *x* + n, where n is the age interval

Lx number of person years lived within the age interval x to x + n

e°x expectation of life at exact age *x*

6.51 INTERNATIONAL COMPARISON, Life expectancy at birth

	INDIGENOUS.....		NON-INDIGENOUS		TOTAL.....	
Reference year	*Male*	*Female*	*Male*	*Female*	*Male*	*Female*
			AUSTRALIA(a)			
1998–2000(b)	56.0	62.7	n.a.	n.a.	76.6	82.0
1999–2001(b)	56.3	62.8	n.a.	n.a.	77.0	82.4
			NEW ZEALAND(c)			
1995–1997(d)	67.2	71.6	75.3	80.6	74.3	79.6
			UNITED STATES OF AMERICA(e)			
1996–1998(f)	(g)67.4	(g)74.2	n.a.	n.a.	73.6	79.4

Sources: *Statistics New Zealand (1998), New Zealand Life Tables, 1995–97; U.S. Department of Health and Human Services Indian Health Service, Trends in Indian Health 1998–99.*

(a) Indigenous data are for the Australian Aboriginal and Torres Strait Islander population,and include an adjustment for undercoverage of Indigenous deaths.

(b) Indigenous life expectancy excludes Tasmania and the Australian Capital Territory.

(c) Indigenous data are for the New Zealand Maori population.

(d) Prior to 1990–1992, the Maori figures relate to the population with 'half or more' degree of Maori blood or of 'solely' Maori origin, whereas the 1990–1992 figures relate to the population who identified as belonging to the Maori ethnic group irrespective of their degree of Maori blood. In September 1995 a change in the ethnicity question on the New Zealand birth and death registration forms was introduced. The 1995–1997 life tables for Maori and non-Maori have been constructed using data drawn from the new birth and death registration forms, and are not comparable with earlier life tables.

(e) Indigenous data are for those American Indians and Alaska Natives who are eligible for Indian Health Service (IHS) services.

(f) American Indian and Alaska Native life expectancy is based on the three year periods specified. Life expectancy for the total population is based on the single year in the middle of the three year reference period.

(g) Includes an adjustment for miscoding of Indian race on death certificates.

6.52 INTERNATIONAL COMPARISON, Infant mortality rate(a)

Reference year	*Indigenous*	*Non-Indigenous*	*Total*
	AUSTRALIA(b)		
1999(c)	14.1	5.0	5.7
2000(c)	13.6	4.6	5.2
2001(c)	10.6	4.9	5.3
	NEW ZEALAND(d)		
1999	8.1	n.a.	5.6
2000	7.8	n.a.	6.1
2001	7.8	n.a.	5.3
	UNITED STATES OF AMERICA(e)		
1996–1998	8.9	n.a.	7.2

Sources: *Statistics New Zealand (requested data); U.S. Department of Health and Human Services Indian Health Service, Trends in Indian Health 1998–99; U.S. Department of Health and Human Services Indian Health Service, Regional Differences in Indian Health 2000–01.*

(a) Infant deaths per 1,000 live births.

(b) Indigenous data are for the Australian Aboriginal and Torres Strait Islander population.

(c) Indigenous data is for Queensland, South Australia, Western Australia and the Northern Territory.

(d) Indigenous data are for the New Zealand Maori population.

(e) Indigenous data are for those American Indians and Alaska Natives who are eligible for Indian Health Service (IHS) services, and include an adjustment for miscoding of Indian race on death certificates. American Indian and Alaska Native rates are for the three year periods specified. Rates for the total population are for the single year in the middle of the three year reference period.

EXPLANATORY NOTES

INTRODUCTION

1 The registration of deaths is the responsibility of the individual state and territory Registrars and is based on information supplied by a relative or other person acquainted with the deceased, or an official of the institution where the death occurred and on information supplied by a medical practitioner as to the cause of death. This information is supplied to the Australian Bureau of Statistics (ABS) by individual Registrars for compilation into the aggregate statistics in this publication.

2 In the main, statistics in this publication refer to deaths registered by the state and territory Registrars during the calendar year shown. There is usually an interval between the occurrence and registration of a death and, as a result of delays in registration, some deaths occurring in one year are not registered until the following year or even later.

DEATHS REGISTERED IN THE SAME YEAR AS THEY OCCURRED

Year	*%*	*Year*	*%*
1990	92.8	1996	95.2
1991	93.6	1997	95.6
1992	94.3	1998	96.0
1993	94.8	1999	95.8
1994	95.6	2000	95.8
1995	95.2	2001	95.3

3 For deaths data, cell values less than three have been randomly allocated a value of zero or three to assist in the preservation of confidentiality of information, with the execption of tables 6.20 and 6.21.

STATES AND TERRITORIES

4 Statistics for states and territories have been compiled and presented in respect of the state or territory of usual residence of the deceased, regardless of where in Australia the death occurred and was registered.

5 Table 6.7 shows the number of deaths cross-classified by state or territory of usual residence and state or territory of registration.

6 In 2001 there were 369 deaths registered in Australia of persons usually resident overseas. These deaths have been included in this publication and classified according to the state or territory in which the death was registered.

STATES AND TERRITORIES *continued*

Deaths of overseas visitors

State or territory of registration	*1996*	*1997*	*1998*	*1999*	*2000*	*2001*
New South Wales	135	130	120	145	127	114
Victoria	61	55	49	64	55	51
Queensland	106	98	91	90	110	107
South Australia	22	16	21	14	17	12
Western Australia	48	55	61	50	41	50
Tasmania	4	4	4	7	7	11
Northern Territory	15	11	17	16	17	18
Australian Capital Territory	—	6	8	4	3	6
Australia	**393**	**375**	**371**	**390**	**377**	**369**

7 Following the 1992 amendments to the Acts Interpretation Act to include the Indian Ocean Territories of Christmas Island and Cocos (Keeling) Islands as part of the geography of Australia, population estimates commencing with September quarter 1993 include estimates for these two territories. To reflect this change, another category of the state and territory level has been created, known as Other Territories. Other Territories include Jervis Bay Territory, previously included with the Australian Capital Territory, as well as Christmas Island and the Cocos (Keeling) Islands, previously excluded from population estimates for Australia. Before 1997, cause of death data do not include deaths of persons usually resident in Other Territories. From 1997, cause of death data for residents of Other Territories are included in the total for Australia.

EXCLUSIONS

8 Figures in this publication do not include foetal deaths (stillbirths). Statistics on foetal deaths are given in *Causes of Death, Australia* (cat. no. 3303.0).

9 Deaths of Australian residents which took place outside Australia are not included in the statistics.

INDIGENOUS DEATHS

10 Although it is considered likely that most Indigenous deaths are registered, a proportion of these deaths are not registered as 'Indigenous'. This publication includes the number of registered Indigenous deaths for usual residents in each state and territory. However, because of the data quality issues outlined below, more detailed breakdowns of Indigenous deaths are provided for New South Wales, Victoria, Queensland, South Australia, Western Australia and the Northern Territory only.

Coverage of Indigenous deaths

11 There are several data collection forms on which people are asked to state whether they are of Indigenous origin. Due to a number of factors, the results are not always consistent. The likelihood that a person will identify, or be identified, as Indigenous on a specific form is known as their propensity to identify as Indigenous. Propensity to identify as Indigenous can be thought of as the proportion of the total, unknown, number of Indigenous people who identify as such on a specific form.

INDIGENOUS DEATHS *continued*

12 Propensity to identify as Indigenous is determined by a range of factors, including who completes the form (e.g. the person in question, a relative, or an official); the perception of how the information will be used; education programs about identifying as Indigenous; and emotional reaction to identifying as Indigenous.

13 There are three estimates of the number of Indigenous deaths each year. Each is based on a different collection, with a different propensity to identify as Indigenous:

- 1991 Census-based projections: These data are estimated using mortality levels based on 1986–1991 Indigenous life tables, and the Indigenous population based on the 1991 Census. These are published in *Experimental Projections of the Aboriginal and Torres Strait Islander Population, 30 June 1991 – 30 June 2001* (cat. no. 3231.0);
- 1996 Census-based estimates and projections: Estimates prior to 1996 are derived by backdating estimates of the 1996 Indigenous population. The level of mortality is based on the 1991–1996 experimental life tables published in *Experimental Projections of the Aboriginal and Torres Strait Islander Population, 30 June 1996–30 June 2006* (cat. no. 3231.0); and
- Death registrations: This publication is based on the registration of deaths by each State and Territories' Registrar of Births, Deaths and Marriages.

14 The estimated coverage of Indigenous deaths is a comparison of the number of deaths registered as Indigenous with the Census-based estimates and projections of Indigenous deaths. For example, the total number of Indigenous deaths registered in 2001 (2,100) was around 85% of the number projected in the 1991 Census-based experimental projections, and 55% of the number of deaths projected in the 1996 Census-based experimental projections (see table 6.34). The variation between the 1991 and 1996 Census-based coverages can be primarily attributed to two factors: the change in propensity to identify as Indigenous on Census forms between the 1991 and 1996 Censuses, and the method used to estimate the death rates applied in the projections. In particular, the method used to estimate the death rates is very sensitive to the inputs used so that the resulting projected deaths are quite volatile.

15 Given this volatility, and the experimental nature of the base populations, the estimates of coverage in table 6.34 are only indicative. Actual coverage of death registrations is likely to lie within the 1991 Census base to 1996 Census base range provided, although possibly outside it. Given this uncertainty, the assessment of the completeness of coverage of Indigenous deaths should be interpreted with caution. Over-precise analysis based on Indigenous death registrations, Indigenous deaths coverage or projected Indigenous deaths should be avoided.

CAUSES OF DEATH

16 For deaths registered in 1999, the 10th revision of the World Health Organisation's International Classification of Diseases (ICD-10) was introduced for the coding of causes of death. Deaths registered in 1997 and 1998 have since been coded to ICD-10. Causes of death descriptions and corresponding codes used in this publication relate to particular causes or groups of causes as classified in ICD-10. The introduction of ICD-10 has broken the underlying cause of death series, particularly at the more detailed level of classification. For information on the differences between ICD-9 and ICD-10, please refer to *Causes of Death, Australia* (cat. no. 3303.0).

CAUSES OF DEATH *continued*

17 Deaths registered prior to 1997 are coded on the 9th version of the World Health Organisation's International Classification of Diseases (ICD-9). For cause of death tables, new time series tables have been constructed commencing from 1997 on ICD-10. For cause-specific indirect standardised death rates the Australian 1999 death rates have been used as standard for 1997 onwards, as the conventional standard death rates (1991) are not available on ICD-10.

18 The time-series summary table (table 6.1) includes causes of death data. Data prior to 1997 is coded to ICD-9 and is not directly comparable with later years presented in the table. The pre-1997 data in this table relates to:
Malignant neoplasms (140–208);
Ischaemic heart diseases (410–414);
Cerebrovascular diseases (430–438);
Chronic obstructive pulmonary disease and allied conditions (including asthma, emphysema and bronchitis (490–496);
Accidents (E800–E949);
from the ICD-9 classification.

19 To enable the reader to see the relationship between the various summary classifications used in this publication, all tables show in brackets the ICD codes which constitute the causes of death covered.

20 ICD-10 allows for the coding of AIDS and AIDS-related deaths (B20-B24). As ICD-9 did not directly accommodate the coding of AIDS and AIDS-related deaths, cases where AIDS was the underlying cause were coded to ICD-9 deficiency of cell-mediated immunity (279.1), from 1988 to 1995. In 1996, ABS adopted ICD-9 Clinically Modified (CM) for coding of AIDS and AIDS-related deaths. Hence, for 1996, all AIDS-related deaths (i.e. deaths where AIDS was mentioned in any place on the death certificate) were coded to HIV infection (042–044). For all years where ICD-9 has been used, all AIDS-related deaths in table 6.20 and 6.21 have been reported as ICD-9 CM HIV infection (042–044).

21 All data in this publication refer to AIDS-related deaths rather than only those deaths where AIDS is the underlying cause. Hence in table 6.20 and 6.21, AIDS-related deaths differ from the data provided for all other causes in that table since for all other causes, only data for underlying cause are given.

LIFE TABLES

22 A life table is a statistical model used to represent mortality of a population. In its simplest form, a life table is generated from age-specific death rates and the resulting values are used to measure mortality, survivorship and life expectancy.

23 The life tables in this publication are current or period life tables, based on death rates for a short period of time during which mortality has remained much the same. Mortality rates for the Australian, state and territory, and Indigenous life tables are based on 1999–2001 data.

24 A life table may be complete or abridged, depending on the age interval used in the compilation. Complete life tables such as those for Australian population contain data by single years of age, while abridged life tables, such as those for the Indigenous population, contain data for five-year age groups.

LIFE TABLES *continued*

25 Life tables are presented separately for each sex. The life table depicts the mortality experience of a hypothetical group of newborn babies throughout their entire lifetime. It is based on the assumption that this group is subject to the age-specific mortality rates of the reference period. Typically this hypothetical group is 100,000 in size.

26 To construct a life table, data on population, deaths and births are needed. Mortality rates are smoothed to avoid fluctuations in the data. The life tables presented in this publication contain four columns of interrelated information. These functions are:

q_x — the mortality rate. The probability of dying between exact ages x and $x+1$. All other functions of the life table are derived from q_x:

l_x — the number of survivors at exact age x;

L_x — the number of person-years lived within the age interval x and $x+1$; and

e^0_x — life expectancy. The average remaining lifetime (in years) for persons who survive to an exact age x.

Australian life tables

27 The 1999–2001 life tables were produced by the ABS. The tables differ from those published prior to the 1995 edition of this publication in a number of important respects. Firstly, they are based on three years of population and deaths data. This is designed to reduce the impact of year-to-year statistical variations, particularly at younger ages where there is a small number of deaths and at very old ages where the population at risk is small. Secondly, the population and deaths data are based on Australian residents who are physically present in Australia over the three-year period i.e. Australian residents temporarily overseas are excluded. Thirdly, they have been actuarially graduated on the same principles which were used for the quinquennial Australian life tables prepared by the Australian Government Actuary. Life tables for the states and territories are produced on the same principles as these tables and are available on request or in the *Demography, State* publications (cat. nos 3311.1–8).

Small area life tables

28 Expectation of life for Statistical Divisions (table 6.6) have been calculated with reference to state and territory life tables, using Brass' Logit System. Small area life tables are based on age-specific death rates for each area, some of which may be zero as no deaths were recorded at those ages. Brass' Logit technique enables the calculation of smooth abridged life tables for regions which have defective age-specific death rates, by adjusting them with reference to a standard life table. The technique does not alter the overall level of mortality, but the age-specific functions of the life table are smoothed.

29 Essentially, the technique compares mortality between the regional and standard life tables across ages, then a line of best fit is calculated to describe that relationship by age. The line of best fit is then used in conjunction with the standard life table to determine death rates for the small area life table. For a more detailed description of Brass' Logit System refer to Brass (1975) *Methods for Estimating Fertility and Mortality from Limited and Defective data*.

TIME SERIES

30 Time series data from 1901 to 1995 is available in the 1995 issue of *Deaths, Australia* (cat. no. 3302.0), in *Australian Demographic Trends, 1997* (cat. no. 3102.0) and in Australian Historical Population Statistics (available through AusStats, see Explanatory Note 32).

ACKNOWLEDGEMENT

31 ABS publications draw extensively on information provided freely by individuals, businesses, governments and other organisations. Their continued cooperation is very much appreciated: without it, the wide range of statistics published by the ABS would not be available. Information received by the ABS is treated in strict confidence as required by the *Census and Statistics Act 1905*.

RELATED PUBLICATIONS

32 Other ABS publications which may be of interest to users include:

AusStats — electronic data (see Explanatory Note 30)
Australian Demographic Statistics, cat. no. 3101.0 — issued quarterly
Australian Demographic Trends, cat. no. 3102.0 — issued irregularly
Births, Australia, cat. no. 3301.0 — issued annually
Causes of Death, Australia, cat. no. 3303.0 — issued annually
Perinatal Deaths, Australia, cat. no. 3304.0 — issued annually to 1993
Population Projections, Australia 1999–2101, cat. no. 3222.0
Experimental Projections of the Aboriginal and Torres Strait Islander Population, cat. no. 3231.0 — issued irregularly.

33 AusStats is a web based information service which provides the ABS full standard product range on-line. It also includes companion data in multidimensional datasets in SuperTABLE format and spreadsheets. For a list of the related data available on AusStats see the List of tables on page 5.

34 A compendium of all demographic data for each state and territory has been released in state or territory specific publications, *Demography, State* (cat. nos 3311.1–8). These publications are released each year for each state or territory and contain a variety of demographic data.

35 From 1994 detailed state and territory data for deaths and causes of death are available in *Causes of Death, Australia* (cat. no. 3303.0).

36 Current publications produced by the ABS are listed in the *Catalogue of Publications and Products* (cat. no. 1101.0).

37 As well as the statistics included in this and related publications, additional information is available from the ABS Web site at http://www.abs.gov.au and accessing Themes/Demography.

ADDITIONAL STATISTICS AVAILABLE

38 The ABS can also make available information which is not published. See Appendix 2 for the characteristics processed by the ABS related to deaths registered. A charge is made for providing unpublished information.

APPENDIX 1 EXPERIMENTAL LIFE TABLES FOR INDIGENOUS PEOPLE

METHOD

Experimental Indigenous abridged life tables were produced for the periods 1990–1992, 1995–1997, 1997–1999 and 1999–2001. During these periods, only South Australia, Western Australia and the Northern Territory had a relatively high estimated coverage of Indigenous deaths. For this reason experimental Indigenous life tables for these three states and territory were produced for all three periods. Experimental life tables were also produced for New South Wales, Victoria and Queensland but only for 1997–1999 and 1999–2001 as the coverage of Indigenous deaths had improved considerably for Victoria, Queensland and New South Wales. Due to the small number of registered Indigenous deaths and/or very low coverage, Indigenous life tables were not produced for Tasmania and the Australian Capital Territory. Experimental Indigenous life tables for all of Australia were produced only for the period 1997–1999 and 1999–2001. Indigenous deaths registered in Tasmania and the Australian Capital Territory were excluded from the Australian tables. This exclusion would have only a minimal effect on the Australia level Indigenous life expectancy.

The 1990–1992, 1995–1997, 1997–1999 and 1999–2001 life tables used mortality rates based on an average annual number of Indigenous deaths registered in 1990–1992, 1995–1997, 1997–1999 and 1999–2001 respectively. Deaths were averaged over the three-year periods to smooth out the year to year irregularities in the number of registered deaths. The only exception was the New South Wales life tables for 1997–1999 which were based on the average deaths registered in 1998–1999.

Experimental estimated resident Indigenous population (ERP) at June 1991 (both 1991 and 1996 Census based estimates), experimental estimated resident Indigenous population at June 1996 and experimental projected resident Indigenous population at June 1998 and June 2000 were used as mid-year populations to calculate mortality rates for 1990–1992, 1995–1997, 1997–1999 and 1999–2001 respectively.

Adjustment

Two sets of experimental Indigenous life tables were produced. One set was based on the number of registered deaths which were not adjusted for under-coverage. There is under-coverage of Indigenous deaths to some degree in all states and territories. To compensate for under-coverage, the other set was produced after inflating the number of registered deaths in the state or territory by the respective adjustment factor. This is the set published in section 6, tables 6.43–6.49 of this publication.

The ABS calculates, for each state and territory and Australia, the coverage of Indigenous deaths by dividing the number of deaths registered by the number of deaths projected from the 1996 and 1991 Census-based experimental estimates. The projected deaths are derived using mortality levels based on the 1991–1996 experimental Indigenous life tables. The 1996 Census-based (low series) coverage estimates were used to obtain an average coverage of Indigenous deaths for the periods 1990–1992, 1995–1997,

1997–1999 and 1999–2001. The reciprocal of the average coverage was then used as an adjustment factor to obtain adjusted deaths. No separate adjustment factor

ADJUSTMENT *continued*

was derived for Australia, instead the number of adjusted deaths in New South Wales, Victoria, Queensland, South Australia, Western Australia and the Northern Territory were combined to construct life tables for Australia.

RESULTS

At the national level the life expectancy at birth in the period 1999–2001 was estimated to be about 56.3 years for Indigenous males. This compares to the life expectancy of Indigenous males of 55.6 years previously estimated for 1997–1999. The life expectancy at birth of Indigenous females in the 1999–2001 period was estimated to be 62.8 years, 0.2 years less than Indigenous female life expectancy at birth in 1997–1999.

EXPERIMENTAL ESTIMATES OF LIFE EXPECTANCY AT BIRTH, Indigenous

	NSW(a)	*Vic.*	*Qld*	*SA*	*WA*	*NT*	*Aust.(b)*
OBSERVED LIFE EXPECTANCY							
MALES							
1990–1992(c)	n.a.	n.a.	n.a.	58.0	57.8	55.4	n.a.
1990–1992(d)	n.a.	n.a.	n.a.	60.0	59.4	56.5	n.a.
1995–1997	n.a.	n.a.	n.a.	60.1	59.8	57.6	n.a.
1997–1999	65.8	64.5	62.9	61.6	60.0	57.8	62.5
1999–2001	66.5	66.2	64.1	62.2	60.5	57.7	63.2
FEMALES							
1990–1992(c)	n.a.	n.a.	n.a.	64.2	62.4	59.3	n.a.
1990–1992(d)	n.a.	n.a.	n.a.	65.8	64.6	60.9	n.a.
1995–1997	n.a.	n.a.	n.a.	68.4	65.6	63.3	n.a.
1997–1999	71.4	71.6	68.5	68.0	66.6	62.4	68.2
1999–2001	71.1	70.7	68.8	67.6	66.9	63.7	68.4
ADJUSTED LIFE EXPECTANCY							
MALES							
1990–1992(c)	n.a.	n.a.	n.a.	51.2	53.4	54.1	n.a.
1990–1992(d)	n.a.	n.a.	n.a.	52.5	55.0	54.9	n.a.
1995–1997	n.a.	n.a.	n.a.	53.7	55.7	55.5	n.a.
1997–1999	55.6	56.1	55.9	54.4	54.9	56.3	55.6
1999–2001	56.8	57.0	56.6	55.2	55.5	55.7	56.3
FEMALES							
1990–1992(c)	n.a.	n.a.	n.a.	57.7	58.7	58.3	n.a.
1990–1992(d)	n.a.	n.a.	n.a.	59.3	60.9	59.7	n.a.
1995–1997	n.a.	n.a.	n.a.	62.8	62.3	61.5	n.a.
1997–1999	64.0	65.2	62.5	62.5	62.8	61.4	63.0
1999–2001	63.6	63.8	62.5	61.7	63.0	62.1	62.8

n.a. not available

(a) Based on deaths for 1998–1999.

(b) Excludes Tasmania and the Australian Capital Territory.

(c) Derived using the experimental Indigenous ERP at June 1991 (1991 Census-based) as the mid-year population.

(d) Derived using the experimental Indigenous ERP at June 1991 (1996 Census-based) as the mid-year population.

RESULTS *continued*

There are several possible explanations for the apparent variations in Indigenous life expectancy. It could be due to improved recording of Indigenous deaths, including the introduction of a question on Indigenous status on the Queensland death registration forms in 1996. It could also be due to the differences in the method used. Early attempts at calculating Indigenous life tables used the Preston-Hill method to estimate the coverage of Indigenous deaths registered in the 1991–1996 intercensal period. The present analysis used coverage estimates which were derived by dividing the number of deaths registered by the number of deaths projected from the 1996 Census-based experimental projections. For these reasons, comparison of life expectancy estimates presented in this publication with estimates from other sources should only be undertaken with extreme caution. For example, the lower male life expectancy in 1997–1999 than in 1991–1996 does not necessarily mean that the Indigenous male mortality increased during this period.

The observed life expectancies are higher than the adjusted life expectancies in all states and territory, for both sexes. The observed life expectancies are based on the actual number of registered deaths. As Indigenous deaths are under-registered to some extent in all states/territories, the observed life expectancies are over-estimates of the true life expectancies. The adjusted life expectancies, on the other hand, are based on the number of deaths which are obtained after inflating the observed number of deaths by an adjustment factor and hence are expected to be closer to reality than the observed life expectancies.

APPENDIX 2 CHARACTERISTICS AVAILABLE

RELATED TO THE DEATH

Date of death (day, month and year)
Date of registration (month and year)
Cause of death (multiple cause introduced in 1997; ICD-10 available from 1997 onwards)
State of registration
State or territory of usual residence
Statistical Local Area of usual residence

RELATED TO THE PERSON

Age at death
Sex
Date of birth (NSW, SA, WA, NT, ACT)
Marital status
Date of marriage (WA and NT)
Age at marriage (not available for Vic.; age at last marriage for Tas., for other states either first of subsequent marriage)
Number of children
Country of birth
Duration of residence in Australia, if born overseas
Indigenous status

APPENDIX 3 FEATURE ARTICLES LIST

DEATHS, AUSTRALIA (cat. no. 3302.0)

A century of change in life expectancy, 1997, p. 57

Death of older people, 1998, p. 46

Death of people aged 25–39 years, 1999, p. 59

How long can I look forward to live? Mortality projections for 'real' cohorts, 2000, p. 42

Life expectancy of first generation migrants, 2000, p. 29

Life tables, 1996, p. 59

Socioeconomic differences in mortality, 2000, p. 33

The years of living dangerously, 1997, p. 28

AUSTRALIAN SOCIAL TRENDS (cat. no. 4102.0)

Accidental death of children, 1996, p. 59

Accidental drowning, 2000, p. 69

Cancer trends, 1995, p. 68

Cardiovascular disease: 20th century trends, 2002, p. 81

Drug-related deaths, 2001, p. 71

Infant mortality, 2002, p. 91

Mortality in the 20th Century, 2001, p. 67

Mortality of Aboriginal and Torres Strait Islander people, 2002, p. 86

Suicide, 2000, p. 65

Youth suicide, 1994, p. 55

GLOSSARY

Age-specific death rate Age-specific death rates are the number of deaths (occurred or registered) during the calendar year at a specified age per 1,000 of the estimated resident population of the same age at mid-point of the year (30 June). The infant mortality rate is used for the age-specific death rate for children under one year of age. Pro rata adjustment is made in respect of deaths for which the age of the deceased is not given.

Country of birth The classification of countries is the Australian Standard Classification of Countries for Social Statistics (ASCCSS). For more detailed information refer to the *Australian Standard Classification of Countries for Social Statistics* (ASCCSS) (cat. no. 1269.0).

Recent political developments in Europe and the former USSR have resulted in a number of changes to the ASCCSS. These changes have affected some categories and are detailed in Revisions 1.02 and 1.03 of the ASCCSS.

Crude death rate The crude death rate is the number of deaths registered during the calendar year per 1,000 estimated resident population at 30 June. For years prior to 1992, the crude death rate was based on the mean estimated resident population for the calendar year.

Death Death is the permanent disappearance of all evidence of life after birth has taken place. The definition excludes deaths prior to live birth. For the purposes of the Deaths and Causes of Death collections conducted by the ABS, a death refers to any death which occurs in, or en route to Australia and is registered with a State or Territory Registry of Births, Deaths and Marriages.

Estimated resident population The concept of estimated resident population (ERP) links people to a place of usual residence within Australia. Usual residence is that place where each person has lived or intends to live for six months or more in a reference year.

The ERP is an estimate of the Australian population obtained by adding to the estimated population at the beginning of each period the components of natural increase (on a usual residence basis) and net overseas migration. For the states and territories, account is also taken of the estimated interstate movements involving a change of usual residence.

Estimates of the resident population are based on census counts by place of usual residence, to which are added the estimated net census undercount and Australian residents estimated to have been temporarily overseas at the time of the Census. Overseas visitors in Australia are excluded from this calculation.

After each census, estimates for the preceding intercensal period are revised by incorporating an additional adjustment (intercensal discrepancy) to ensure that the total intercensal increase agrees with the difference between the ERPs at the two respective census dates.

Indigenous Persons who identify themselves as being of Aboriginal or Torres Strait Islander origin.

Indigenous death The death of a person who is identified as being of Aboriginal or Torres Strait Islander origin on the death information form.

Infant death An infant death is the death of a live-born child who dies before reaching his/her first birthday.

Infant mortality rate The number of deaths of children under one year of age in a calendar year per 1,000 live births in the same calendar year.

Intercensal discrepancy Intercensal discrepancy is the difference between two estimates of a Census year population, the first based on the latest Census and the second arrived at by updating the previous Census date estimate with intercensal components of population change which take account of information available from the latest Census. It is caused by errors in the start and/or finish population estimates and/or in estimates of births, deaths or migration in the intervening period which cannot be attributed to a particular source.

Life expectancy Life expectancy refers to the average number of additional years a person of a given age and sex might expect to live if the age-specific death rates of the given period continued throughout his/her lifetime.

Life table death rate The life table death rate represents the annual number of deaths (per 1,000 population) that would occur based on the death rates and population structure of the life table. It is calculated as 1,000/expectation of life at birth.

Marital status Two separate concepts are measured by the Australian Bureau of Statistics. These are registered marital status and social marital status. They have different personal characteristics and are independent variables with separate classifications. Marital status relates to registered marital status which refers to formally registered marriages or divorces for which the partners hold a certificate. Four categories of marital status are identified: never married, married, widowed and divorced.

Median value For any distribution the median value (age, duration, interval) is that value which divides the relevant population into two equal parts, half falling below the value, and half exceeding it. Where the value for a particular record has not been stated, that record is excluded from the calculation.

Natural increase Excess of births over deaths.

Neonatal death For neonatal deaths a birthweight and period of gestation criterion apply:

- A neonatal death is the death within 28 days of birth of a child weighing at least 500 grams at delivery (or of at least 22 weeks gestation, if birthweight was unavailable) who after delivery, breathes or shows any evidence of life such as a heartbeat. Applies to data collected prior to 1997; and
- A neonatal death is the death within 28 days of birth of a child weighing at least 400 grams at delivery (or of at least 20 weeks gestation, if birthweight was unavailable) who after delivery, breathes or shows any evidence of life such as a heartbeat. Applies to data collected from 1997 onwards.

Sex ratio The sex ratio relates to the number of males per 100 females. The sex ratio is defined for total population, at birth, at death and among age groups by appropriately selecting the numerator and denominator of the ratio.

Standardised death rate (SDR)

Standardised death rates enable the comparison of death rates between populations with different age structures by relating them to a standard population. The ABS standard populations relate to the years ending in 1 (e.g. 1991). The current standard population is all persons in the 1991 Australian population. They are expressed per 1,000 or 100,000 persons. There are two methods of calculating standardised death rates:

- The *direct method*—this is used when the populations under study are large and the age-specific death rates are reliable. It is the overall death rate that would have prevailed in the standard population if it had experienced at each age the death rates of the population under study; and
- The *indirect method*—this is used when the populations under study are small and the age-specific death rates are unreliable or not known. It is an adjustment to the crude death rate of the standard population to account for the variation between the actual number of deaths in the population under study and the number of deaths which would have occurred if the population under study had experienced the age-specific death rates of the standard population.

Wherever used, the definition adopted is indicated.

Standardised mortality ratio (SMR)

The ratio of the actual number of deaths in the population under study and the number of deaths which would have occurred if the population under study had experienced the age-specific death rates of the standard population (see also—Standardised death rate, *The indirect method*).

State or territory of registration

State or territory of registration refers to the State or territory in which the event was registered.

State or territory and Statistical Local Area of usual residence

State or territory and Statistical Local Area (SLA) of usual residence refers to the state or territory and SLA of usual residence of:

the population (estimated resident population);

the mother (birth collection); or

the deceased (death collection).

In the case of overseas movements, state or territory of usual residence refers to the state or territory regarded by the traveller as the one in which he/she lives or has lived. State or territory of intended residence is derived from the intended address given by settlers, and by Australian residents returning after a journey abroad. Particularly in the case of the former, this information does not necessarily relate to the state or territory in which the traveller will eventually establish a permanent residence.

Year of occurrence

Data presented on year of occurrence basis relate to the date the death occurred.

Year of registration

Data presented on year of registration basis relate to the date the death was registered.

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