

7 Health and Welfare

#### **OVERVIEW**

Victoria has a wide range of health services provided by government, non-profit organisations and private enterprise to help safeguard the health and well-being of Victorians and to assist those who are sick.

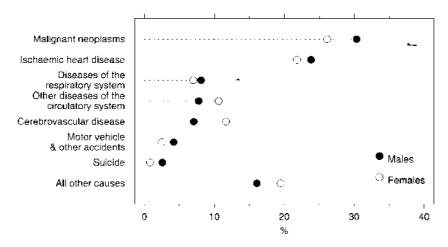
This chapter provides an overview of health statistics for Victoria. Data is provided on public and private hospitals, children's immunisation, causes of death, the 1995 National Health Survey and the 1993 Survey of Disability, Ageing and Carers. Information is also featured on the Ambulance Service, the use of Medicare services and Social Security allowances.

#### Causes of death

Statistics on causes of death, numbers of inpatients in hospitals, psychiatric units and nursing homes, and details of conditions treated and operations performed are important indicators that assist in analysing the health needs of the Victorian population.

The main cause of death for Victorian residents in 1995 was 'diseases of the circulatory system' (including heart attack and stroke), followed by cancer (malignant neoplasms). Diseases of the circulatory system accounted for 39% of male and 44% of female deaths and were the main cause of death for both males and females aged 65 years and over. The most common cause of death under this broad category was heart attack, which accounted for 24% of all male and 22% of all female deaths. Cancer accounted for 30% of male and 26% of female deaths.

ALL DEATHS: PERCENTAGE DISTRIBUTION BY SEX BY CAUSE, VICTORIA, 1995



Source: Deaths, Victoria (3312.2)

The number of deaths due to cancer (which is included in the category of neoplasms) increased by 3%, to 9,166 deaths in 1995. Cancer was the major cause of death for males aged between 45 and 64 years, and for females aged between 25 and 64 years. The most common types were lung cancer for males and breast cancer for females.

Accidents, poisonings and violence were responsible for 5% of the total deaths in 1995, and were the major causes of male deaths in the age groups 1 to 44 years, and female deaths in the age groups 1 to 24 years.

In 1995, as in 1994, the total number of suicides exceeded motor vehicle traffic accidents thus making suicide the major external cause of death. The total number of suicides increased by 11% to 566 in 1995, whilst motor vehicle traffic accidents increased by 3% to 436. Suicide was the major cause of death for males aged between 25 and 44 years, whilst motor vehicle accidents was the predominant cause for both males and females in the 15 to 24 year age group.

Deaths where AIDS was determined as the underlying cause of death accounted for 106 males and 12 females in 1995, compared with 108 and 2 respectively in 1994.

### 7.1 CAUSES OF DEATH: NUMBERS AND RATES, VICTORIA, 1995

Cause of death (a)	Number of deaths	Proportion of total	Rate (b)
Infectious and parasitic diseases (001–139)	224	0.7	50
Neoplasms (140-239)	9 331	28.8	2 073
Endocrine, nutritional and metabolic diseases,	* 332	20.0	2010
and immunity disorders (240-279)	1 332	4.1	296
Diseases of the blood and blood-forming organs (280–289)	98	0.3	22
Mental disorders (290–319)	875	2.7	194
Diseases of the nervous system and sense organs (320–389)	806	2.5	179
Diseases of the circulatory system (390–459)	13 357	<del>-</del> 41.2	2 967
Diseases of the respiratory system (460-519)	<del>~</del> 2 457	7.6	546
Diseases of the digestive system (520–579)	992	3.1	220
Diseases of the genito-urinary system (580–629)	595	1.8	132
Complications of pregnancy, childbirth, and the			
puerperium (630-676)	4	_	_
Diseases of the skin and subcutaneous tissue (680-709)	66	0.2	15
Diseases of the musculoskeletal system and connective			
tissue (710–739)	200	0.6	44
Congenital anomalies (740–759)	- 1/8	0.5	40
Certain conditions originating in the perinatal period (760–779)	140	0.4	31
Signs, symptoms, and ill-defined conditions (780–799)	104	0.3	23
Accidents, poisonings, and violence (external causes) (800–999)	<b>1</b> 666	5.1	370
Total	32 425	100.0	7 202

(a) The classification used is the International Classification of Diseases, Ninth Revision (ICD-9), aggregated at the class level.

(b) Per 1,000,000 mean population.

Source: Causes of Death, Australia (3303.0)



### 7.2 MAIN CAUSES OF DEATH IN AGE GROUPS, VICTORIA, 1995

	Deaths from specified cause		
	In age group		At all ages
Cause of death	No.	% (a)	No.
Under 1 year			
Certain conditions originating in the perinatal period (760–779)	137	44.5	140
Congenital anomalies (740–759)	106	34.4	178
Signs, symptoms, and ill-defined conditions (780–799)	23	7.5	104
1 14 years			
Other external accidents (excluding motor vehicle accidents			
and suicides) (800-807, 820-949, 960-999)	47	24.5	664
Malignant neoplasms (140–208)	34	17.7	9 166
Motor vehicle traffic accidents (810–819)	22	11.5	436
Congenital anomalies (740–759)	22	11.5	178
15 24 years			
Motor vehicle traffic accidents (810–819)	119	28.1	43 <del>6</del>
Suicide and self-inflicted injury (950–959)	107	25.2	566
Other external accidents (excluding motor vehicle accidents			
and suicides) (800–807, 820–949, 960–999)	64	15,1	664
Malignant neoplasms (140–208)	32	7.5	9 166
25–44 years	-		
Malignant neoplasms (140–208)	354	25.0	9 166
Suicide and self-inflicted injury (950–959)	236	16.6	566
Diseases of the circulatory system (390–459)	163	11.5	13 357
Other external accidents (excluding motor vehicle accidents	151	10.0	. 004
and suicides) (800-807, 820-949, 960-999)	151	10.6	<del>`-66</del> 4
45–54 years			
Malignant neoplasms (140– 208)	689	45.4	9 166
Ischaemic heart disease (410–414)	239	15.7	7 39 /
Suicide and self-inflicted injury (950–959)	94	6.2	566
Cerebrovascular disease (430–438)	58	3.8	3 010
55–64 years			
Malignant neoplasms (140-208)	1 427	46.8	9 166
Ischaemic heart disease (410–414)	629	20.6	7 397
Diseases of the respiratory system (460–519)	<b>1</b> 67	5.5	2 457
Endocrine, nutritional and metabolic	*0.0	<b>.</b> F	4.330
diseases and immunity disorders (240–279)	136	4,5	1 332
65–74 years			
Malignant neoplasms (140–208)	2 940	40.4	9 166
Ischaemic heart disease (410–414)	1 <b>68</b> 6	23.2	7 397
Diseases of the respiratory system (460–519)	605	8.3	2 457
Cerebrovascular disease (430-438)	500	6.9	3 0 <b>1</b> 0
75 years and over	er		
Ischaemic heart disease (410-414)	4 762	26.1	7 397
Malignant neoplasms (140–208)	3 688	20.2	9 166
Cerebrovascular disease (430–438)	2 314	12.7	3 010
Diseases of the respiratory system (460–519)	1 581	8.7	2 457

<sup>(</sup>a) Deaths in this age group from the stated cause expressed as a percentage of all deaths in the age group.

Source: Causes of Death, Australia (3303.0)

Public hospitals

Total expenditure in Victorian public hospitals in 1994–95 was \$3,132.9 million. Wages and salaries (\$1,707.7 million) was the largest expenditure item, comprising 54.5% of total Victorian expenditure. Average expenditure per occupied bed day was \$874 and per separation was \$3,708. Total revenue for Victorian public hospitals was \$3,210.9 million of which 77.7% was derived from Government grants (including Commonwealth and state indirect contributions).

Acute health

In 1994–95, Victoria's public hospitals treated a total of 844,920 patients, with each separation having an average length of stay of 4 days. Females accounted for 54% of all cases treated in Victorian public hospitals.

The most treated condition related to diseases and disorders of the Kidney and urinary tract, which accounted for 95,636 separations or 11.3% of total. This was followed by diseases and disorders of the Digestive system, which accounted for 93,483 separations (11.1%), and Pregnancies and childbirth (82,711 separations or 9.8%).

Organ transplants represented the highest average length of stay, with each case involving a 24 day stay in hospital on average. In contrast, the average for cases relating to Eyes, Ears, nose, mouth and throat and to Kidney and urinary tract conditions was under 2 days.

The total amount of time spent by patients in care was greatest for 'other contacts with health services' with 433,016 days or 12.1% of the total for all conditions. This category included a variety of sub-categories including rehabilitation, after-care, various testing and vaccinations for which the average length of stay was 10.7 days.

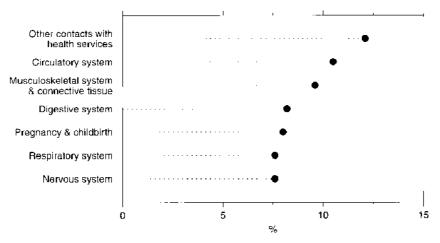


**7.3** SEPARATIONS AND AVERAGE LENGTH OF STAY BY MAJOR DIAGNOSTIC CATEGORY AND SEX, VICTORIAN PUBLIC HOSPITALS, 1994–95

	Males		Females		Total	
Major diagnostic condition	Separ- ations	Average length of stay	Separ- ations	Average Length of stay	Separ- ations	Average length of stay
Organ transplants	78	23.97	111	23.68	189	23.80
Nervous system	20 856	6.37	18 804	7.42	39 660	6.87
Eye	8 901	1.79	9 116	1.62	18 017	1.70
Ear, nose, mouth & throat	22 616	1.91	19 013	1.79	41 629	1.85
Respiratory system	27 085	5,67	21 089	5.64	48 174	5.66
Circulatory system	39 330	5.31	30 583	5.49	69 913	5.39
Digestive system	47 100	3.14	46 383	3.17	93 483	3.15
Hepatobiliary (liver) system	4, 100	3124	40 000	0.2	,,	
and pancreas	7 346	5.76	9 581	4.79	16 927	5.21
Musculoskeletal system	1 3 10	<b>.</b>	0 001			
and connective tissue	33 743	4.41	31 326	6.17	65 069	5,26
Skin, subcutaneous tissue	00 7 10		01010	0.2.	00 000	51
and breast	15 504	3,36	22 166	3.64	37 670	3.53
Endocrine, nutrition	13 304	0.00	22 200	2.3.	3. 2.3	5.00
and metabolism	5 413	5.32	6 848	5.72	12 261	5.54
Kidney and urinary tract	59 168	1.70	36 468	1.97	95 636	1.81
Male reproductive system	15 888	2.76	30 100		15 888	2.76
Female reproductive system		2.70	41 845	2,31	41 845	2.31
Pregnancy & childbirth	_	_	82 711	3.48	82 711	3.48
Newborns & perinatal	9 122	6.54	7 182	6.90	16 304	6.70
Blood, blood forming organs		0.54	1 102	. 0.50	_ 10 304	0.10
and immunological disorde		2.28	6 817	··· 2.36	13 886	2.32
Mycloproliferative diseases	313 / 003	2.20	0011	2.00	13 000	2.02
(cancer)	22 764	2.33	20 994	2.32	43 758	2.33
Infectious & parasitic diseas		2.33 4.70	4 659	⊋.3∠ 5,55	12 984	5.00
Mental diseases & disorders		10.82	9 643	12.48	16 875	11.77
Alcohol/drug use	1 639	4.95	728	4.68	2 367	4.87
Injuries, poisonings	1 029	4.90	120	4.00	2 301	4.07
and toxic effects of drugs	9 141	3.47	8 848	3.13	17 989	<del>*3</del> .30
Burns	721	8.10	360	8.79	1 081	8.33
	121	0.10	200	0.13	1001	0.33
Other contacts with health services	19 906	9.04	20 698	- 12.22	40 604	10.66
Total	388 947	4.09	455 973	4.36	844 920	4.24

Source: Dept of Human Services, Victoria

# PERCENTAGE OF TOTAL LENGTH OF STAY BY MAJOR DIAGNOSTIC CONDITION, VICTORIAN PUBLIC HOSPITALS, 1994–95



Source: Dept of Human Services, Victoria

**7.4** SEPARATIONS BY LENGTH OF STAY AND MAJOR DIAGNOSTIC CATEGORY, VICTORIAN PUBLIC HOSPITALS, 1994–95

Major diagnostic condition	Same day %	Over- night %	2 days %	3 days and over %	Fotal %	Total cases
					-	No.
Organ transplants	4.8	3.2	1.6	90.5	100.0	189
Nervous system	29.4	17.7	8.5	44.4	100.0	39 660
Eye	45.6	24.5	17.7	12.2	100.0	<b>18</b> 017
Ear, nose, mouth & throat	<b>39</b> .3	32.0	14.8	13.9	100.0	41 629
Respiratory system	14.3	16.6	13.2	55.9	100.0	48 174
Circulatory system	17.9	17.1	12.1	52.9	100.0	69 913
Digestive system	47.1	13.6	10.6	28.7	100.0	93 483
Hepatobiliary (fiver) system						
and pancreas	17.5	13.5	14.8	54.2	100.0	16 927
Musculoskeletal system						
and connective tissue	30.9	<b>1</b> 7.3	9.2	42.6	100.0	65 069
Skin, subcutaneous tissue						
and breast	48.6	14.9	8.1	28.4	100.0	37.670
Endocrine, nutrition						
and metabolism	21.1	11.5	11.1	56.4	100.0	12 261
Kidney & urinary tract	81.8	4.6	3.3	10.3	100.0	95 636
Male reproductive system	49.4	11.3	8.3	31.0	100.0	15 888
Female reproductive system	59.3	12.5	4.1	24,1	100.0	41 845
Pregnancy & childbirth	23.0	12.2	9.5	55.3	100.0	82 711
Newborns & perinatal	18.7	19.0	13.4	48.9	100.0	16 304
Blood, blood forming organs,						
and immunological disorders	64.9	10.5	6.3	1.8,3	<del>−1</del> 00.0	13 886
Myeloproliferative diseases						
(cancers)	79.6	4.1	2.9	13.4	100.0	43 758
Infectious & parasitic diseases	32.0	12.3	10.1	45.5	100.0	12 984
Mental diseases & disorders	17.7	11.8	5.4	65.1	100.0	16 875
Alcohol/drug use	29.6	26.3	6.5	37.6	100.0	2 367
Injuriės, poisonings						
and toxic effects of drugs	31.9	32.5	10.7	24.9	100,0	17 989
Burns	14.7	26.4	11.8	47. <b>1</b>	100.0	1 084-
Other contacts with						
health services	50.7	4.3	3.0	42.0	100.0	40 604
Total	42.0	14.0	8.8	35.2	100.0	844 920

Source: Dept of Human Services, Victoria

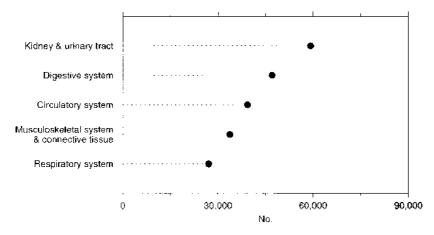
Forty-three per cent of all separations had a length of stay of less than one day, whilst 36% involved a stay of longer than three days.

Of the major diagnostic conditions, 82% of cases involving Kidney and urinary tract disorders and diseases and 80% of cases for Myeloproliferative disease (cancer) involved a stay of less than one day.

In comparison, 90.5% of separations involving organ transplants necessitated a stay of more than three days, and 65.1% of separations relating to Mental disease and disorder involved a stay of at least three days.

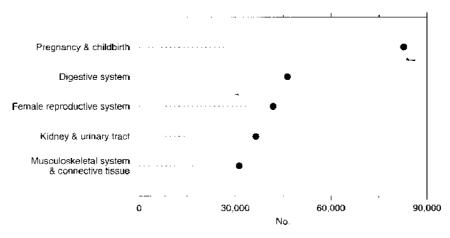
The profile for the conditions of men and women in the public hospital system was quite different. The most commonly treated conditions for men were diseases and disorders of the Kidney and urinary tract (59,168 separations), the Digestive system (47,100 separations) and the Circulatory system (39,330 separations). For women, the most commonly treated conditions were Pregnancy and childbirth (82,711 separations), diseases and disorders of the Digestive system (46,383 separations) and the Female reproductive system (41,845 separations).

SEPARATIONS BY MAJOR DIAGNOSTIC CONDITION, VICTORIAN PUBLIC HOSPITALS, MALES, 1994-95



Source: Dept of Human Services, Victoria

SEPARATIONS BY MAJOR DIAGNOSTIC CONDITION, VIOTORIAN PUBLIC HOSPITALS, FEMALES, 1994–95



Source: Dept of Human Services, Victoria

# Staffing and administration

In 1994–95, there were 41,643 effective full time staff in Victorian public hospitals. Of this number, 18,558 were nurses (44.6%), 8,437 (20.3%) were staff involved in the general running of the hospitals (orderlies, cleaners, laundry workers, etc) and 3,111 (7.5%) were resident, salaried or sessional medical staff.

### 7.5 STAFF (a) IN PUBLIC HOSPITALS, 1994-95

Position	No.
Nurse	18 558
Administration	5 924
Medical Support	5 612
Hotel (b)	8 437
Resident Medical Officer	1 911
Salaried Medical Staff	638
Sessional Medical Staff	562
Total	A1 GA2

- (a) Effective full-time (EFT) units.
- (b) Staff engaged in cleaning and catering. Source: Dept of Human Services, Victoria

### Private hospitals

In Victoria in 1994-95 there were 104 private acute hospitals, 7 private psychiatric hospitals and 23 day hospital facilities. Day hospital facilities provide investigation and treatment for acute conditions on a day-only basis. Of the 23 day hospital facilities in Victoria, 11 were classified as specialist endoscopy, 8 general surgery, 3 ophthalmic and 1 other.

### 7.6 PRIVATE HOSPITALS BY TYPE AND SIZE, VICTORIA AND AUSTRALIA, 1994-95\_

	Victoria .		Australia	
Hospitals .	No.	%	No.	%
Acute	104	93.7	301	91.8
Psychiatric	7	6.3	27	8.2
Hospital size (a)				
0-25 beds	38	34.2	69	21.0
<b>26–</b> 50	34	30.6	99	30.2
51-100	25	22.5	101	30.8
101-200	10	9.0	45	13.7
Over 200	4	3.6	14	4.3
Total acute and psychiatric	111	100.0	328	100.0

(a) Based on available beds (average for year). Source: Private Hospitals, Australia (4390.0)

There were 365,600 separations in Victorian private hospitals in 1994–95, accounting for 1,521,400 occupied bed days. This represented 27.1% and 28.1% respectively of the Australian total. The Victorian occupancy rate was 68.6% and the average length of stay was 4.2 days, compared with the Australian average of 4.0 days.

In Victoria there were 10,502 full-time equivalent staff employed (over the 1994–95 year) in private acute and psychiatric hospitals. This number represented 28.7% of the total Australian full-time equivalent staff employed. In Victoria, 56.3% of employed staff comprised nursing staff. The average number of staff per occupied bed was 2.5, the same as the national figure.

Total expenditure in Victorian private hospitals amounted to \$722.1 million. Wages and salaries (\$438.4 million) was the largest expenditure item, comprising 60.7% of total Victorian expenditure. Average expenditure per occupied bed day was \$475 and per separation was \$1,975. This compared with the Australian average of \$462 and \$1,859 respectively. Total revenue for Victoria was \$794.5 million, of which 95.2% was patient revenue.

### Mental health services

In recent years the State Government's emphasis on provision of mental health services has changed from a reliance on separate psychiatric hospitals to an increased focus on community-based care. Community-based care involves the provision of specialised services and the integration of mental health care with existing types of health and community care.

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In Victoria, in the three years to June 1995, this was reflected in a reduction in the number of beds in stand-alone psychiatric hospitals, an increase in the number of psychiatric beds in general hospitals and an increase in the provision of community-based services.

In the public health system at June 1995, 1,508 psychiatric beds were available in Victoria. In the three years to June 1995, the number of beds in stand-alone psychiatric hospitals had fallen to 1,180 beds. Over the same period, and additional 31 beds were provided in psychiatric units in general hospitals. Of the net reduction, most occurred in the provision of non-acute psychiatric beds with a decrease of 327 compared to a decrease of 27 in acute beds. Spending on stand-alone hospitals was reduced by \$37.6 million over the same period.

Victorian Government spending on community-based mental health services increased by \$38 million (37%) in the three years to June 1995. In 1994–95, 44% of the \$322.7 million spent on mental health services was directed to community-based services. These services include:

- ambulatory services such as outpatient clinics, mobile assessment and treatment teams, and day programs;
- specialised residential services; and
- services provided by not-for-profit non-government organisations which may include accommodation, recreation, rehabilitation, social support and advocacy programs.

During 1994–95, 339 psychiatric beds were available in the 7 private psychiatric hospitals which operated in Victoria. A further 11 private hospitals operated specialised psychiatric units or wards within the state. The average length of stay for patients admitted to private hospitals with psychiatric conditions in Victoria was 9.5 days.

### Infectious diseases

A vital aspect of health care is the prevention and containment of disease. As more becomes known about the factors which contribute to the incidence of specific diseases it becomes possible to prevent diseases or detect and treat them at earlier stages with improved chances of success.

An important element in containing the spread of disease is the surveillance of infectious diseases. These diseases, which were the main cause of sickness and death in the nineteenth century, have been largely brought under control in the twentieth century through improvements in living standards and medical advances such as immunisation and antibiotics. However, factors related to large population movements, the ecological environment and the increasing ease of travel can all contribute to the spread of infection from overseas and within Australia.

In order to monitor the incidence and spread of infectious diseases, medical workers involved in the diagnosis of disease are required to notify the Victorian Infectious Diseases Unit of any new occurrences of specified diseases. In particular, four types of infectious diseases pose problems for the community, vaccine preventable diseases, hospital acquired infections, blood-borne viral infections and enteric infections.

### 7.7 NOTIFICATIONS OF SELECTED INFECTIOUS DISEASES, VICTORIA

	1991	1995	
	No.	No.	Rate (a)
Food and water-borne diseases			
Campylobacter infections	2 4 <b>6</b> 6	2 964	66.2
Giardiasis (Giardia)	913	985	21.9
Hepatitis A	496	257	5.7
Salmonellosis (Salmonella)	932	971	21.7
Listeriosis	26	23	0.5
Typhoid	21	13	0.3
Other diseases			
AIDS	190	143	3.9
Barmah Forest Virus		7	0.2
Haemophilus influenza type b (Hib)	270	26	0.6
Hepatitis B			
Acute	84	93	2.1
Prevalent	1 708	1 900	42.4
Hepatitis C	<b>1</b> 735	4 513	100.7
HIV	311	173	3.9
Legionellosis (Legionnaires' Disease)	20	<b>2</b> 2	0.5
Leptospirosis	88	70	1.6
Marana	111	119	2.7
Measles	448	<del></del> 150	3.4
Meningococcal infection	<b>~</b> 82	75	1.7
Mumps	49	77	1.7
Pertussis (Whooping cough)	71	393	8.9
Q Fever	39	62	1.4
Ross River Virus	404	32	0.7
Rubella	181	1 292	28.8
Sexually transmitted diseases (c)			-
Gonorrhoea	337	341	9.6
Syphilis	78	264	5.9
Chlamydia	<b>1</b> 915	1 317	29.4
Shigellosis	86	83	1.8
Tetanus	_	4	0.09
Tuberculosis	244	286	6.4
Typhus	<del>_</del>	6	0.13

<sup>(</sup>a) Notifications per 100,000 population.

Source: Dept of Human Services, Victoria

### Blood-borne infections

Blood-borne viral infections, such as HIV, Hepatitis B and Hepatitis C are spread by sexual transmission and other exchange of body fluids, such as can occur through intravenous drug use. In Victoria, these infections are being largely contained by a combination of epidemiological surveillance and contact tracing, educational programs and monitoring of blood donors and donated blood.

A total of 3,546 people have been diagnosed with HIV in Victoria. There has been a steady decline in the number of new cases diagnosed since 1991. In 1995, 173 people were newly diagnosed with HIV, compared with 311 in 1991. A significant reduction in the number of homosexual men diagnosed with HIV contributed to this decrease. In total, AIDS has been diagnosed in 1,426 people in Victoria, of whom 1,095 people have died. The number of new AIDS cases diagnosed fell from 190 cases in 1991 to 143 cases in 1995.

<sup>(</sup>b) Testing was not available in 1991.

<sup>(</sup>c) Rate quoted is for population over 15 years of age.

Of other sexually transmitted diseases diagnosed in 1995, Syphilis accounted for 264 cases, Gonorrhoea 341 and Chlamydia 1,317. In the treatment of Gonorrhoea, an increase in the level of resistance to traditional antibiotics is an area of concern. A significant number of antibiotic resistant strains were contracted overseas, highlighting the need for an ongoing campaign to warn travellers of the risks of acquiring sexually transmitted diseases when overseas.

# Food and water-borne infections

Food and water borne diseases can result in intestinal illness generally described as 'food poisoning'. The organisms which most commonly cause these types of illnesses are the campylobacter and salmonella organisms. Listeriosis, although affecting a small number of people can cause scrious illness. Groups most at risk are pregnant women and their babies, the elderly and people with lowered immunity. Infection with *Giardia Lambla* is also a commonly reported intestinal illness, although it may often be water rather than food-borne.

#### **Immunisation**

There is growing concern that vaccine preventable diseases, such as whooping cough and measles, which have been controlled in the past, could return if immunisation rates are not effectively maintained.

A public immunisation program, commenced in August 1993, has led to the reduction in the incidence of serious *Haemophilus influenza* type b (Hib), which mainly affects children under 5 years. In 1991\_270 cases of Hib were notified compared with 117 in 1993 and 26 in 1995. The notifications of whooping cough (Pertussis) have fluctuated widely, increasing from 71 cases in 1991 to 527 cases in 1993, before decreasing to 393 cases in 1995.

In April 1995 the ABS collected data on child immunisation. Data from the survey showed that the proportion of children considered fully immunised declined with age. This decline was consistent for all diseases covered by the immunisation schedule except measles and mumps. For both these diseases, the proportion of fully immunised children remained relatively high for most age groups in comparison with other diseases.

A higher proportion of Victorian children aged 1 year were immunised for all conditions when compared with the national average. However, the Victorian immunisation rates fell below the national average for Diptheria/Tetanus and Whooping cough (Pertussis) for children aged 2 years, and additionally for Polio for children aged 6 years. The drop in the proportion of children aged 2 years immunised for Diphtheria, Tetanus and Whooping cough (Pertussis) occurred nation-wide. A possible explanation for this decline was the omission of the DTP (Triple Antigen) booster, required at 18 months.

7.8 PERCENTAGE OF CHILDREN FULLY IMMUNISED BY CONDITION, VICTORIA AND AUSTRALIA, APRIL 1995

Age	Diphtheria/ Tetanus	Whooping cough (Pertussis)	Palio	Hib	Measles	Mumps	Rubella
			Victoria				
I year	91.7	89.6	87.9	65.6	87.4	86.9	84.9
2 years	58.4	52.4	88.2	55.6	92.5	92.0	85.2
6 years	39.4	15.5	56.0	30.1	94.9	93.1	72.5
			Australia				
l year	88.5	86.2	86.3	62.3	86.8	86.0	81.4
2 years	63.0	57.5	86.9	<b>5</b> 2.4	91.5	90.1	81.1
6 years	45.2	17.2	60.2	26.6	91.7	88.4	62.8
Source: Children's Imme	unisation, Australia						

The proportion of those fully immunised against Polio remained similar for children of all ages, until the age 6, when significant decreases were recorded nation-wide. Proportions of children fully immunised against Hib were lower than for any other disease on the immunisation schedule at all ages.

In addition to information about vaccinations recommended in the Standard Childhood Vaccination Schedule, the survey collected information about selected other types of vaccination. The highest proportion of children had received a Tetanus vaccination, other than in DTP or CDT form. Some 12% of children had received at least one vaccination against Hepatitis B and less than 2% had received a vaccination against Hepatitis A.

### **7.9** PERCENTAGE OF CHILDREN AGED 0 TO 14 YEARS IMMUNISED BY TYPE OF OTHER VACCINATION, APRIL 1995

	 Tetanus (a)	Hepatitis A	Hepatitis B	Tuberculosis	Monovalent pertussis (b)	Influenza
Victoria	20.5	1.5	12.0	4.3	3.0	2.6
Australia	24.6	1.9	<b>1</b> 7.6	5.5	4.8	3.4

- (a) Relates to a vaccine against Tetanus only; excludes Tetanus vaccination received in DTP or CDT form.
- (b) Excludes Pertussis vaccination received in DTP form.

Source: Children's Immunisation, Australia (4352.0)

# Children's health screening

In April 1995 the ABS collected data on children's health screening. Data from this survey showed that when compared with the national average, Victorian children had lower reported rates for sight testing, but higher reported rates for hearing tests. An estimated 76% of Victorian children aged 2–14 years had visited a dental professional at some time in their life. This was slightly higher than the national average of 75%.

**7.10** PERCENTAGE OF CHILDREN AGED 0 TO 14 YEARS: TYPE OF HEALTH SCREENING TEST, VICTORIA AND AUSTRALIA, APRIL 1995

	¬	
	Victoria	Australia
Has had both sight and hearing tests	51.2	52.6
Has had sight tests only	7.4	10.0
Has had hearing tests only	24.1	13.3
Has not had either sight or hearing tests	16.5	23.1
Total (a)	100.0	100.0
Has visited a dental professional (b)	76.2	75.0
Has not visited a dental professional (b)	23.6	24.8
Total (a)	100.0	100.0

- (a) Includes not known if tested, and type of test not stated.
- (b) Data relating to dental visits refers to children aged 2–14 years.

Source: Children's Health Screening, Australia (4337.0)

### Non-infectious diseases

Non-infectious diseases of most concern in the community include the incidence of cardiovascular disease and cancer. Advances in screening technologies, treatment, and community education have led to significant reductions in the incidence of these conditions in the community.

Despite substantial decreases in death rates over the past 20 years, cardiovascular disease remains a major health problem for Victorians. In 1995, coronary heart disease was responsible for the deaths of 7,397 people, of whom 2,635 were under the age of 75 years. A further 3,010 people died from stroke.

Although improvements in the treatment have made some contribution to the decrease of deaths from cardiovascular disease, much of the decline in heart disease has been attributed to the reduction in risk factors leading to heart attacks. A decline in smoking and consumption of animal fats, and improved screening and control of hypertension have been particularly significant. The decline in deaths from stroke in Australia is largely attributed to reductions in blood pressure levels within the community, through the use of anti-hypertensive drugs and improved diet.

Cancers accounted for over 9,000 Victorian deaths in 1995. For males, lung cancer is the primary cause of cancer related death, while prostate cancer is responsible for the highest incidence of cancer. For females, breast cancer accounts for the highest incidence and the highest number of deaths.

While significant gains have been made as a result of preventative programs and improvements in detection and treatment, numbers of deaths overall continue to rise. The successful treatment of cancers depends on the type of cancer and stage of its detection.

Some cancers can be prevented by managing risk factors, for example smoking in the case of lung cancer and sunlight in the case of melanoma. Community education programs, such as the 'Quit' and 'Slip Slop Slap' campaigns, have been employed to raise awareness of specific risk factors to health. However, because cancers usually manifest after a lengthy latent period, a lag occurs between the introduction of a preventative program and a subsequent reduction in incidence or death rates.

Where screening for cancer is undertaken and reliable tests and treatments are available, significant gains for the community can be made. In 1995 the death rate from cancer of the cervix was 3.3 per 100,000 women, almost-half the rate of 6.5 per 100,000 recorded in 1973. Early detection and treatment made possible through the Pap smear screening program is a significant factor in this reduction. To reduce deaths from breast cancer through early detection and treatment, screening for women over 50 years old has been progressively introduced in Victoria since 1990. Effective screening tests have not been developed yet for the more common cancers of the colon and rectum. Work is also continuing on the development and evaluation of screening tests for cancer of the prostate in men.

### Metropolitan Ambulance Service

The Metropolitan Ambulance Service (MAS) is one of seven regions within the Ambulance Service Victoria reporting to the Minister of Health through the Ambulance Section of the Department of Human Services. It was created in 1987 under the Ambulance Services Act 1986 from the former Ambulance Service Melbourne and Peninsula Ambulance Service.

The MAS provides skilled pre-hospital emergency health care and patient transport services for all members of the community. This service is provided free to members of the ambulance subscription scheme and pensioner concession card holders, but charges are levied for the transport of non-member patients.

An extensive network of strategically placed emergency ambulance teams services more than three million people living and working within the Greater Melbourne service area, which extends over 9,000 square kilometres from Whittlesea in the north to the Mornington Peninsula in the south and Warburton and Koo-wee-rup in the east to Bacchus Marsh in the west.

When requested by hospitals and medical practitioners, non-emergency patient transport is provided by clinically accredited private operators under MAS supervision.

Air Ambulance Victoria is operated by the MAS on behalf of Ambulance Service Victoria.

In 1995-96, the MAS employed a staff of 740 (excluding non-emergency sub-contracting resources) 683 of whom were operational. The MAS fleet of vehicles numbered 228.

In 1995–96, the MAS dealt with a total of 322,359 cases, which involved travelling a total of 6,364,879 kilometres. Of this, the largest proportion was accounted for by stretcher ambulances, which dealt with 289,324 cases, or 90% of the total number of cases, and covered 4,166,599 kilometres, equivalent to 65% of total kilometres covered.

### Regional ambulance services

The following regional services operate throughout Victoria: North-Eastern (headquartered in Wangaratta), South-Eastern (Morwell), North-Western (Bendigo), South-Western (Geelong) and Western (Ballarat). There is also the Alexandra and District Ambulance Service, which is staffed by volunteers.

In 1995–96 regional ambulance services responded to an estimated 79,900 cases of which 28% were time-critical, 29% were non-time-critical and 43% were routine.

### 7.11 METROPOLITAN AMBULANCE SERVICE: STATISTICAL SUMMARY

	<b>1993</b> -94	1994-95	1995–96 (b)
Cases (a)			<b>►</b>
Stretcher ambulance	219 959	242 814	289 324
Clinic car	56 394	36 545	28 639
Fixed wing	3 990	2 820	3 405
Helicopter	1 446	981	991
Total cases	281 789	283 160	322 359
Kilometres			
Stretcher ambulance	3 494 243	3 741 356	4 166 599
Clinic car	<b>1</b> 821 585	123 359	935 880
Fixed wing	1 482 510	1 104 320	1 262 400
Total kilometres	6 798 338	6 078 935	6 364 879

<sup>(</sup>a) Includes all patients assessed/treated and/or transported, plus all other ambulance responses to a request for service.

Source: Metropolitan Ambulance Service: Annual Report

### Health related actions

During 1995 the second National Health Survey was conducted. The survey focused on the health status of Australians, their use of health facilities and services and lifestyle factors affecting the health of the nation.

In 1995, an estimated 72% of Victorians took some health-related action in a two week period. The action taken varied widely and could include hospitalisation, consultation with a doctor, dentist or other health professional, use of medication or time away from work or school. Use of medications was the most common action taken. An estimated 27% of Victorians used vitamins/minerals or natural/herbal remedies, and 56% used other medications. Consultation with a doctor was the action taken by 23% of the population.

<sup>(</sup>b) Case and kilometre statistics for October, November and December 1995 are estimated due to industrial action.

A higher proportion of women consistently took health-related actions than did men. Overall, 78% of Victorian women took some health-related action compared with 67% of men.

**7.12** PERSONS: WHETHER TOOK HEALTH-RELATED ACTION IN LAST TWO WEEKS BY TYPE OF ACTION BY SEX, VICTORIA, 1995 (PRELIMINARY)

	Males	Females	Persons	
Type of action	,000	.000	,000	%
Hospital inpatient episode	13.0	19.6	32.5	0.7
Visit to hospital outpatients/emergency	50.8	60.2	110.9	2.5
Visit to day clinic	25.8	37.5	63.3	1.4
Doctor consultation	448,4	592.9	1 041.3	23.1
Dental consultation	109.5	138.8	248.3	5.5
Consultation with other health professional -				
Chiropractor	30.4	45.9	76.3	1.7
Chemist	35.0	56.4	91.4	2.0
Chiropodist/podiatrist	8.4	22.1	30.5	0.7
Nurse	21.7	29.5	51.2	1.1
Optician/optometrist	14.6	14.3	28.8	0.6
Physiotherapist/hydrotherapist	38.2	30.8	69.0	<b>1</b> .5
Other health professional(a)	37.6	63.5	101.2	2.2
Seen or talked to anyone else	70.3	94.5	164.8	3.7
Used medication				
Vitamins/minerals, natural/herbal medicines	501.2	726.3	1 227.5	27.3
Other medication	1 137.2	1 382.2	2 519.4	55.9
Total medication	1 339.0	1 621.6	2 960.7	65.7
Days away from work/school	167.9	157.6	325.6	7.2
Other days of reduced activity	162.3	151.5	313.8	<b>⊷</b> 7.0
Total persons taking action	1 487.0	1 765.6	3 252.6	72.2
Total persons not taking action	742.2	- 5 <b>08.</b> 4	1 250.5	27.8
Total (b)	2 229.1	2 274.0	4 503.1	100.0

<sup>(</sup>a) Includes and diogst/audiometrist, dietitian/nutritionist, herbalist, hypnotherapist, naturopath, osteopath, occupational therapist, bychologist, social worker or welfare officer and speech therapist, pathologist.

Source: National Health Survey - unpublished data



<sup>(</sup>b) Persons may report more than one type of action, therefore components do not add to the totals shown.

A National Nutrition Survey was conducted in conjunction with the 1995 National Health Survey, as a joint project between the ABS and the Commonwealth Department of Human Services and Health. Results from the Nutrition Survey are expected to be available from August/September 1997.

## Disability and ageing

In 1993 the ABS conducted a Survey of Disability, Ageing and Carers, providing estimates of the numbers and main characteristics of persons with disabilities, persons with handicaps, persons aged 60 years or more, and carers.

A person was identified as having a disability if he/she had one or more of a group of selected limitations which had lasted, or was likely to last, for 6 months or more. A handicap results from a disability which limits a person's ability to perform certain tasks associated with daily living.

Results showed that 818,000 Victorians had a disability, with 640,100 of these people experiencing a handicap because of their disability. Overall the rates per 1,000 population were slightly higher than the Australian average. There were more females than males with both disabilities and handicaps, putting the rates for females well above the Australian average.

7.13 HANDICAP AND DISABILITY STATUS AND RATES (a), 1994

			CD T-4-1		
	Handicap	No handicap	<sup>™</sup> Total disability	No disability	Total
Males –					
Number ('000)	295.1	102.5	397.5	1 812.8	2 210,3
Victorian rate	133	46	180	820	
Australian rate	140	45	184	<b>81</b> 6	-
Females –					
Number (1000)	345.0	75.47	_420.5	1 830.7	1 251.2
Victorian rate	153	34	187	813	1101.1
Australian rate	144	32	176	824	
Persons					
Number (*000)	640, <b>1</b>	177.9	818.0	3 643.4	4 461.4
Victorian rate	143	40	183	817	01.4
Australian rate	142	38	180	820	

(a) Rate per 1,000 population.

Source: Disability, Ageing and Carers, Australia: Summary of Findings (4330.0)

### Private medical practitioners

As part of the ongoing program of collections for the services sector of the Australian economy, the ABS conducted a survey of medical practitioners in private practice in respect of the 1994–95 financial year. The survey was conducted from a sample of medical practitioners selected from the Health Insurance Commission's Medicare Provider File. It was the first time that the ABS had conducted such a survey.

The following information relates to general practitioners and specialists in private practice whose main activity was the provision of medical services to patients. Medical practitioners who mainly worked in hospitals and other institutions such as universities, government departments, etc. on a salary basis and who mainly serviced non-private patients were excluded.

In 1994–95, there were 4.007 general practitioners and 2,537 specialists in private practise, accounting for 24.5% and 26.7% of the national total respectively. There were more men than women in private practise: men accounted for 74% of Victorian general practitioners and 86.9% of specialists.

7.14 GENERAL PRACTITIONERS AND SPECIALISTS, 1994-95

	Males	Females	Total
General practitioners			
Victoria	2 966	1 041	4 007
Australia	11 677	4 701	16 378
Specialists			
Victoria	2 204	333	2 537
Australia	8 381	1 109	9 490

Source: Private Medical Practitioners, Australia (8689.0)

The largest proportion of general practitioners conducted between 100 and 149 private patient consultations per week (28.6%), with 21.7% seeing between 150 and 199 private patient consultations per week. These figures contrasted with specialists, where the largest proportion (39.5%) had between 20 and 59 private patient consultations/contacts per week.

7.15 GENERAL PRACTITIONERS BY NUMBER OF CONSULTATIONS/CONTACTS, VICTORIA, 1994-95

		General practitioners		Specialists	
Number of private patient consultations/contacts per week	4	No.	%	No.	%
consoliations/contacts per week	n.		75		,5
Less than 20		*81	*2.0	326	12.8
20 59		500	<b>~</b> 12.5	1 002	39.5
60–79		403	10.1	317	12.5
80 99 .		355	8.9	299	11.8
100 149		<b>1 1</b> 47	28.6	316	12.5
150 199		870	21.7	<b>-</b> 96	*3.8
200–299		591	14.8	125	4.9
300 or more		*58	*1.4	*56	2.2
Total		4 007	100.0	2 537	100.0
			-		

Source: Private Medical Practitioners, Australia (8689.0)

Of those specialists in private practise, the largest proportion (24.3%) were surgeons, followed by those specialising in internal medicine (22.4%). Psychiatrists comprised 13.1% of specialists in private practise and anaesthetists a further 12.7%.

7.16 SPECIALIST MEDICAL PRACTITIONERS BY PRINCIPAL SPECIALITY, 1994-95

	Victoria		Australia		
Principal speciality	No.	. %	No.	%	
Anaesthesia	323	12.7	<b>1 14</b> 3	12.0	
Dermatology	55	2.2	239	2.5	
Diagnostic imaging	189	7.5	853	9.0	
Internal medicine	568	22.4	2 130	22.4	
Obstetrics/gynaecology	237	9.3	837	8.8	
Ophthalmology	144	5.7	602	6.3	
Pathology	*49	*1.9	223	2.3	
Psychiatry	332	13.1	1 <b>06</b> 0	11.2	
Surgery	616	24.3	2 323	24.5	
Other	*25	*0.9	79	0.8	
Total	2 537	100.0	9 490	100.0	

Source: Private Medical Practitioners, Australia (8689.0)

#### Medicare

Medicare, as Australia's public health insurance scheme, is one of the major institutions in the health system. Funded by a levy on all employed adults, Medicare is available to all Australians and allows a wide range of goods and services to be accessed. The following two tables relate to the Health Insurance Commission's (HIC) Medicare operations.

In 1994–95, a total of 46,166,700 Medicare services were processed in Victoria, accounting for a quarter of all Medicare services nationally. This represented a dollar value of \$1,423.9 million.

The largest proportion of Medicare services comprised unreferred consultations by general practitioners, which accounted for 45.5% of the Victorian total (20,989,200 cases). The next most commonly accessed Medicare service was pathology: 10,579,000 cases were processed or 22.9% of total services. These two services corresponded to the two most accessed services across Australia.

**7.17** MEDICARE: NUMBER AND VALUE OF SERVICES PROCESSED BY BROAD TYPE OF SERVICE, VICTORIA, 1994–95 (a)

	Number of services	Value of services		
Broad type of service	<sup>,</sup> 000	%	\$m	%
Unreferred attendances -				•••
General practitioner/VRGP	20 989.2	45.5	474.4	33.2
Other	3 720.9	8.1	78.8	5.5
Specialist attendance	4 729.6	10.2	232,7	16.3
Obstetrics	187.2	0.4	15.8	1.1
Anaesthetics	472.4	1.0	31.7	2.2
Pathology	10 579.0	22.9	174.1	12.2
Diagnostic imaging	2 413.1	5.2	194.3	13.Z
Operations	1 134.8	2.5	128.9	9.1
Assistance at operations	69.5	0.2	6.6	0.5
Optometry	793.3	<b>- 1</b> .7	31.2	2.2
Radio and nuclear therapy	91.4	0.2	6.0	0.4
Miscel-areous	986.1	2.1	49.3	3.5
Total	46 166.7	100.0	1 423.9	100.0

(a) For services processed from 1 July 1994 to 30 June 1995.

Source: Health Insurance Commission - 1994-95 Medicare, Pharmaceutical Benefits and Childcare Cash Rebate Statistical Tables

In terms of dollar value, however, general practitioners' consultations made up only a third of the value of services processed, and pathology only 12%. Specialist attendance and diagnostic imaging both accounted for a larger proportion of services processed by dollar value than pathology. Respectively they accounted for \$232.7 million (16%) and \$194.3 million (14%) of the value of total services, while only accounting for 10% and 5% of visits respectively.

### Social security

The Department of Social Security administers a range of schemes which provide financial support to individuals and families. It also provides the framework to support access to employment for those with the ability to participate in the workforce. This section brings together statistical information relating to the recipients of each main payment type. Separate data on supplementary payments (such as remote area allowance) are not included.

Unless otherwise indicated, these statistics relate to the relevant pay periods closest to 30 June of the reference year.

Additional classifications have been included in this section relating to new payments, such as maternity allowance and parenting allowance. Other benefit payments such as home child care allowance have either been included in alternative payments or have been renamed since June 1995.

It is important to note that over the years there have been changes to the conditions of eligibility applying to the payments. As it is not readily possible to indicate all the changes that have occurred, any analysis of historical data should generally be undertaken with caution.

7.18 SOCIAL WELFARE PROGRAMS, VICTORIA

Type of program	June 1994	June 1995	June 1996
Pensions, the sick and disabilities -	-		
Age pension	404 830	404 540	410 122
Disability support pension	101 845	107 709	115 580
Wife pension	36 620	38 560	35 403
Carer pension	4 251	5 014	6 278
Sickness allowances	10 696	10 856	8 796
Mobility allowances	6 094	6 772	7 572
Child disability allowance	17 742	19 679	22 730
Labour market allowance		-	
Youth training (a)	<del>_</del>	4 260	6 361
Jobsearch allowance	114 966	99 802	1 <b>11</b> 579
Newstart allowance	121 190	108 208	93 879
Mature age	7 192	10 664	12 606
Mature age partner	2 798	4 350	3 474
Partner allowance (a)	_	56 304	20 137
Family payment –		7	
Family	447 771	440 179	441 065
Double orphan pension	298	297	295
Sole parent pensions	68 734	7 <b>1 41</b> 7	7 <b>5 1</b> 44
Parenting allowance (b)	_	·-	165 427
Maternity allowance (c)		<del>-</del>	19 901
Child care assistance (a)	_	53 426	61 164
Other social security payments			
Special benefits	7 626	6 142	5 682
Drought relief	_	_	14
Widow pension class B	15 497	14 110	12 982
Widow allowance (a)	_	<b>2</b> 477	3 <b>36</b> 5
/ 3 E 4 L - 400E			

 $<sup>\</sup>langle a \rangle$  From 1 Jan 1995.

<sup>(</sup>b) From 1 July 1995.

<sup>(</sup>c) From 1 Feb 1996.

Source: DSS customers - A Statistical Overview 1996

### REFERENCES

Data on Private Hospitals is obtained from the annual census of all private hospitals in Australia.

A National Nutrition Survey was conducted in conjunction with the 1995 National Health Survey, as a joint project between the ABS and the Commonwealth Department of Human Services and Health. Results from the Nutrition Survey are expected to be available from August/September 1997.

Cause of Death statistics are compiled by the ABS from data made available by the Registrar of Births, Deaths and Marriages.

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#### **Photographs**

Ambulance officer: Courtesy of Metropolitan Ambulance Service

Hospital patient: Courtesy of Monash Medical Centre part of the Southern Health Care Network

Nurse and infant: Courtesy of Monash Medical Centre part of the Southern Health Care Network

Physiotherapy: Courtesy of Monash Medical Centre part of the Southern Health Care Network

