

# **Health and community services labour force, 2001**

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# **Health and community services labour force 2001**

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# Preface

This publication, published jointly by the AIHW and the Australian Bureau of Statistics (ABS), is the second in an AIHW series that presents health and community services workers' data from the ABS Census of Population and Housing. It includes information on the number, distribution and characteristics of employed persons in 105 occupations identified as providing health and community services in the 2001 census, and discusses growth and other changes in this workforce since the 1996 census. Also included in this report are data from the census showing all persons employed in the health and community services industries. In addition, data from the ABS Employee Earnings and Hours surveys of May 1996 and May 2002 are provided to give an indication of the remuneration of employees in these industries.

There is increasing debate about the capacity of existing and likely future health and community services workforces to meet service requirements. The changing age structure of the population affects demand, and this has been increasingly recognised. However, the supply side is also affected by population ageing and other demographic changes (due to changes in retirement patterns, hours worked and student numbers), and this aspect has attracted far less debate. Just as importantly, earnings levels also affect labour supply, and these will rise if shortages emerge.

Debate on these important issues demands a strong information base. While the Australian Institute of Health and Welfare (AIHW) provides good quality data on registrable health occupations (doctors, nurses, dentists, pharmacists and some allied health professions), only the five-yearly census can provide a comprehensive picture.

The report will be of interest to state and territory governments, which are the major suppliers of health and community services and engage in workforce planning, and to professional associations and industrial organisations in monitoring membership and in representing their members.

We would like to acknowledge the assistance of the Australian Health Workforce Advisory Council (AHWAC) in providing funding for this project.

The Institute and the ABS welcome comments from the readers of this publication. These, and requests for further information, can be emailed to [labourforce@aihw.gov.au](mailto:labourforce@aihw.gov.au).

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# Abbreviations

ABS	Australian Bureau of Statistics
ACT	Australian Capital Territory
AHMAC	Australian Health Ministers' Advisory Council
AHWAC	Australian Health Workforce Advisory Committee
AHWOC	Australian Health Workforce Officials Committee
AMWAC	Australian Medical Workforce Advisory Committee
FTE	Full-time equivalent
NSW	New South Wales
NT	Northern Territory
OECD	Organisation for Economic Co-operation and Development
Qld	Queensland
RNO	Regional nursing officer
SA	South Australia
Tas	Tasmania
UK	United Kingdom
USA	United States of America
Vic	Victoria
WA	Western Australia

## Symbols and other usages

Throughout this publication, data may not add to the totals shown due to the estimation process for non-response. Percentages may not add to 100.0 due to rounding. The totals may also vary between tables. This is because some tables exclude 'not stated' responses to certain census questions. The numbers of 'not stated' responses vary from question to question. See Explanatory notes on page 122 for more information.

*Italics* within a table denote a subtotal.

Percentage printed as 0.0 may denote less than 0.05%.

.. denotes not applicable.

— denotes nil.

n.a. denotes not available.

n.p. denotes not published because of high standard error (greater than 40%) or because it may be possible to identify individuals from the figure.

\* denotes a relative standard error between 25% and 40%, and should be used with caution.

n.e.c. denotes not elsewhere classified.

n.f.d. denotes not further defined.

# Main findings

In 2001:

- There were 450,792 people employed in health occupations and 237,055 employed in community services occupations  
– this represented growth of 11.4% and 26.8%, respectively, since 1996.
- There were 798,295 people employed in health and community services industries, of whom over two-thirds (69%) worked in health or community services occupations  
– this represented growth of 10.6% since 1996.
- The largest occupational groups for health were nursing workers (244,405 employed) and medical workers (51,859), and the largest for community services were child and youth services (101,715 employed) and those employed in aged or disabled care (51,784).
- Between 1996 and 2001 there were increases of 12.6% in medical practitioner numbers, 25.0% for medical imaging workers, 11.0% for dentists, 5.4% for nurses, 13.0% for pharmacists, 26.6% for allied health workers and 31.2% for complementary health therapists; and increases of 9.0% for child and youth services workers and 44.1% for persons employed in aged or disabled care.
- Workers in the health and community services occupations were predominantly female (74% and 87%, respectively). A relatively large proportion of all persons in these occupations worked part-time (34% and 51%, respectively).
- There were 3,742 Indigenous people employed in health occupations, comprising 0.9% of health workers – well below the 2.4% Indigenous proportion of the population. Of these workers, 853 were employed as Indigenous health workers.
- There was a higher proportion of Indigenous workers in the community services occupations, with the 6,294 Indigenous workers representing 2.7% of this group.
- Census data highlighted substantial restructuring within the health and community services industries by way of changes in occupational mix between 1996 and 2001:
  - there were large decreases in the number of workers in hospitals and nursing homes (down 10%), in line with changes in the delivery of care to aged persons and those with a disability or mental illness
  - there were decreases in hospitality and food preparation workers (down 9.3%), and tradespersons, plant operators, labourers and cleaners (down 19.2%), probably reflecting some outsourcing of food preparation, cleaning and maintenance services
  - there was an increase of 9,084 (6.0%) for registered nurses, but this was accompanied by a 4,946 (21.4%) decrease in enrolled nurses and a larger number of lower paid carers and aides (up by 8,488, or 20.3%).
- There were 2,354 health workers per 100,000 population overall in Australia, ranging from 2,150 per 100,000 in the Northern Territory to 2,614 per 100,000 in South Australia.
- There were 1,228 community services workers per 100,000 overall in Australia, ranging from 1,077 per 100,000 in New South Wales to 1,694 per 100,000 in the Australian Capital Territory.
- The supply of workers in the health industries decreased with increasing remoteness, from 3,005 per 100,000 population in the Major cities of Australia to 1,498 per 100,000 in Very remote Australia.

- The supply of workers in the community services industries also decreased with increasing remoteness, from 1,008 per 100,000 population in the Major cities of Australia to 796 per 100,000 in Very remote Australia.
- The central regions of the capital cities had the highest apparent supply of health practitioners, based on their place of work, probably reflecting the centralisation of major hospital and specialist services in the inner city areas.
- Some of the rapidly growing regions on the outskirts of all five major capital cities had the lowest supply of health and community services professionals of any region within their respective states.





# Introduction

This report focuses on the health and community services workforce and is based on the 2001 census. It makes some comparisons with the 1996 census data published by the Australian Institute of Health and Welfare (AIHW) in *Health and Community Services Labour Force 1996*. The five-yearly census is the most comprehensive data source on all of the occupations, although more detailed information on a number of the professions that require registration is available from other data sources.

The report will be of particular interest to those involved in health and community services workforce planning. Many health and community services workforce planning issues involve a specific occupation or a specialised subset of that occupation; this report provides a wealth of detailed information on the numbers, and the demographic and work characteristics of health and community services workers. The real power of the census is its ability to provide population data as well as data on all occupations in relatively small geographic areas. This allows analysis of occupational growth and mix in the context of changes in population size and structure in rural and remote areas, which makes this report of value to those who are interested in assessing patterns of provision of health and welfare workers across Australia.

This chapter provides an overview of the health and community services industries and occupations, and illustrates the relationship between them.

The following chapter provides contextual information relevant to interpreting changes in the health and community services labour force that are occurring. The chapter starts by describing changes in the age profile and geographic distribution of the Australian population. It then describes the role of health and welfare services in the economy, discusses change in the numbers of employed people and in the occupational mix within the relevant industries, and provides data on changes in income and hours worked.

The main body of the report has chapters that describe the health and community services workforce in detail: the characteristics of health and community services workers; information about each of the specific occupations; and finally the geographic distribution of the workers in those occupations.

## Health and community services industries and occupations

The main focus of this report is on health and community services occupations, based on the Australian Standard Classification of Occupations (ASCO) (see Explanatory notes). ASCO classifies occupations by skill levels – managerial, professional, associate professional, tradesperson etc. Related occupations that may be separated by skill level in the classification are grouped under headings to facilitate analysis. For the health occupations, these include medical workers, medical imaging workers, dental workers, nursing workers, pharmacist workers, allied health workers, complementary therapies workers and miscellaneous health workers. For the community services occupations, the groupings are child and youth services, family services workers, disability workers, aged and disabled care workers and other community services workers. As an example, the occupations of director of nursing, registered nurse, enrolled nurse and nursing assistant are grouped under the heading

'nursing workers', and the occupations of welfare worker, family counsellor and family support worker are grouped under 'family services workers'.

Most people in the health occupations are employed in the health industries, and many in the community services occupations are employed in the community services industries. However, there is not a direct match between the occupations and the industries: some of those employed in health or community services occupations work in other industries, while people employed in occupations other than health or community services work within the health and community services industries. This relationship is shown diagrammatically in Figure 1, with the part outlined by the heavy box comprising the core of this report.

The health and community services industries in this report are based on the Australian and New Zealand Standard Industry Classification (ANZSIC) used for the 2001 census (see Explanatory notes). The broad health industries included in this report are hospitals and nursing homes, medical and dental services and other health services, and the broad community services industries are child care services and community care services. The broad industry grouping of 'other health services' includes pathology services, optometry and optical dispensing, ambulance services, community health centres, physiotherapy services, chiropractic services and health services not elsewhere classified (n.e.c).

	<b>Health and community services industries</b>	<b>Other industries</b>
<b>Health occupations</b>	405,250 employed persons Doctors Nurses Dentists Allied health workers Ambulance officers	45,542 employed persons Primary products inspectors Safety inspectors Environmental health officers
<b>Community services occupations</b>	145,677 employed persons Children's care workers Aged and disabled person carers Refuge workers	91,379 employed persons Pre-school teachers and aides Special needs teachers Social security inspectors
<b>Other occupations</b>	247,368 employed persons Managers Accountants and auditors Clerks Tradespersons Labourers	

(a) The industry in which each occupation is listed is the one in which most of the workers in that occupation are employed.

Source: ABS, Census of Population and Housing, 2001.

**Figure 1: Health and community services industries and occupations<sup>(a)</sup>**

The health and community services industries comprise the fourth largest employing industry division in the Australian economy, providing employment for almost 800,000 people, or 9.7% of employed persons, and a growth of 10.6% since 1996. Because of their size, these industries can also have an impact on the wellbeing of communities. A recent Department of Family and Community Services occasional paper identified social physical infrastructure such as hospitals and schools, and social 'soft' infrastructure such as medical and allied health professionals, teachers and institutions delivering community and welfare services as factors enhancing community wellbeing (FACS 2001).

Over two thirds (69%) of the 798,295 people employed in the health and community services industries were employed in health (405,250) and community services (145,677) occupations, a growth of 11.4% and 26.8%, respectively, since 1996.

Over 80% of those in health occupations were employed in the health industry, and 2.3% were in government administration and defence (Table A.7). Industrial and retail pharmacists are essential to health care but are employed in the manufacturing and retail industries. Most of the persons in occupations with a public health function (primary product inspectors, safety inspectors, environmental health officers and occupational health and safety officers) were employed in government administration or manufacturing or personal service industries. The makers of medical aids and appliances (dental technicians, biomedical engineers and orthotists) were mainly employed in manufacturing industries. All of the health occupations discussed in this report have some persons employed in government administration.

The community services industry employed over 47% of those in community services occupations, and 9.1% were in government administration. The pre-primary and special needs teachers were mainly employed in the education industry, which employed 22.8% of those in community services occupations.

In this and the following chapters, the numbers of people working in the health and community services occupations and industries refer to raw counts only. There has been no adjustment for the average number of hours worked, as this can not be calculated from census data. As a result it is not possible to provide full-time equivalent numbers.

# Context

This chapter commences with an overview of the broad changes in population over the previous five years, without which it would be difficult to place in context the workforce and industry changes that have occurred since 1996. For example, it is clear that changes in the age profile of the population will alter the prevalence of certain health conditions as well as the mix of health and community services needed. Similarly, changes in the geographic distribution of the population will affect the need for the provision of health and community services in those areas experiencing high population growth or decline. Any growth or decline in the numbers of workers in an area needs to be interpreted against population change in that area.

Overall need for health and community services is also affected by population growth and ageing. Much of government policy over recent years is focussed on maintaining an appropriate level of services into the future. Governments also monitor the proportion of the economy dedicated to government and private sector expenditure on health and welfare.

Labour costs are a major component in the cost of health and community services. Although not the whole story, changes in the structure (i.e. the proportion of the labour force employed in the industries and the occupation mix), the average weekly working hours of those employed in the industries, and salary and wage levels are some of the factors affecting national health and welfare expenditure.

Changing patterns of service delivery may also lead to changes in the characteristics of the industries and occupations (for example, providing services to clients in a community setting rather than an institution). A response to shortages of particular occupations, perhaps as a result of population change, may lead to substitution of another occupation to perform some functions. An above-average increase in remuneration for one occupation may provide an incentive to substitute lower paid staff to perform some functions. An increase in less skilled, lower paid staff will act to minimise increases in the overall cost of providing services, particularly in conditions where there is an increased demand.

The following sections illustrate some of the changes in population size and distribution, expenditure on health and welfare services, numbers employed and occupational mix in the health and community services industries, income and hours worked, by relevant occupations.

## Population

### Changes in the age profile

The Australian population grew steadily in the two decades to 2001. It has increased by around 6% to 8% in each inter-census period since 1981 reaching 19.4 million at the 2001 census. Lower birth rates, changing migration patterns and lower death rates are changing the structure of the Australian population. The proportion of the population aged less than 30 years declined from 50.7% in 1981 to 41.4% in 2001. There were increases in the proportions of the population aged 45 to 59 years, which in 2001 includes all the so-called 'baby-boomers', and those over the age of 75 years (Table 1). As people grow older they tend

to rely more on health and community services, and more is spent on their health and personal care, which is why large increases in the number and proportion of older people are of interest.

**Table 1: Age distribution, Australia, 1981, 1986, 1991, 1996, 2001**

Year	Age group						Total	Persons	Per cent increase from previous census
	0–14	15–29	30–44	45–59	60–74	75+			
	(per cent)							(number)	
1981	25.0	25.7	20.4	15.1	10.4	3.5	<b>100.0</b>	14,923,260	
1986	23.1	25.2	22.2	14.6	11.0	4.0	<b>100.0</b>	16,018,350	7.3
1991	21.9	24.1	23.4	15.1	11.1	4.4	<b>100.0</b>	17,284,036	7.9
1996	21.4	22.4	23.2	17.1	11.0	5.0	<b>100.0</b>	18,310,714	5.9
2001	20.5	20.9	22.9	18.9	11.0	5.7	<b>100.0</b>	19,413,240	6.0

Source: ABS, Census of Population and Housing, 1981, 1986, 1991, 1996 and 2001.

## Changes in geographical distribution

Over the decade to 2001 there have been several steady patterns of population drift. Among the states and territories, the population share for Queensland and Western Australia grew, while the shares of the other states and territories declined (except for the Northern Territory, which maintained its population share of 1.0%) (Table 2).

As well as population movements between the states and territories, there was also a broad and consistent flow from less densely populated areas to more densely populated areas. Although there was a small increase in the proportion of the estimated resident population living in capital cities (from 63.6% in 1991 to 63.7% in 2001), this represents growth of some 1,370,000 people. There was much stronger proportional increase in Other metropolitan centres (from 7.3% to 7.8%, a growth of around 253,000 people). The share of the population in small rural centres remained the same on 6.5%, while the proportions living in the rural and remote areas declined (Table 2).

When viewed by remoteness category (the geographic classification principally used in this publication), the picture is similar: a small percentage population increase in Major cities (from 66.0% to 66.3%, representing an increase of 1,457,000 people), a larger increase in Inner regional areas (20.1% to 20.7%, or 550,000 more people) and declines in Outer regional areas, Remote areas and Very remote areas (Table 2).

Within capital cities, the growth areas were typically around the outer fringes, with some degree of urban infill occurring in the city centres in Sydney and Melbourne. Other regions experiencing growth were coastal areas in New South Wales and Queensland, particularly for people who have reached retirement age (ABS 2000).

As most of the above changes are projected to continue for the foreseeable future (ABS 2001a), they can be taken into account in informing policies concerned with the distribution of health and community services workforces.

**Table 2: Population geographical distribution, Australia, 1991, 1996, and 2001**

	1991	1996	2001
<b>State/territory</b>			
New South Wales	34.1	33.9	33.9
Victoria	25.6	24.9	24.7
Queensland	17.1	18.2	18.7
Western Australia	9.5	9.6	9.8
South Australia	8.4	8.1	7.8
Tasmania	2.7	2.6	2.4
Australian Capital Territory	1.7	1.7	1.6
Northern Territory	1.0	1.0	1.0
<b>Geographic region<sup>(a)</sup></b>			
Capital city	63.6	63.6	63.7
Other metropolitan centre	7.3	7.5	7.8
Large rural centre	5.9	6.0	6.0
Small rural centre	6.5	6.5	6.5
Other rural area	13.5	13.3	13.2
Remote centre	1.3	1.2	1.1
Other remote area	2.0	1.8	1.7
<b>Remoteness<sup>(b)</sup></b>			
Major city	66.0	66.1	66.3
Inner regional area	20.1	20.5	20.7
Outer regional area	10.9	10.7	10.4
Remote area	1.9	1.8	1.7
Very remote area	1.0	0.9	0.9
<i>Australia</i>	<i>100.0</i>	<i>100.0</i>	<i>100.0</i>

(a) Rural, Remote and Metropolitan Areas (RRMA) geographical classification.

(b) Australian Standard Geographical Classification (ASGC) Remoteness category.

Source: ABS, Census of Population and Housing, 1991, 1996 and 2001.

## Health and welfare services in the economy

The ratio of Australia's health and welfare expenditure to Gross Domestic Product (GDP) provides an indication of the proportion of overall economic activity contributed by the health and community services sectors.

Using this measure, Australians spend comparatively more on health (9.0% of GDP in 2000) than the people in the OECD countries of Japan, New Zealand and the United Kingdom but less than Canada, France, Germany and the United States of America. Government expenditure on welfare was higher in Australia (1.4% of GDP in 1998) than Japan, New Zealand, the United Kingdom and the United States, but lower than in Canada, France and Germany. In all of the OECD countries shown in Table 3, government welfare expenditure made up a much smaller proportion of GDP than health expenditure.

**Table 3: Health and government welfare expenditure as a proportion of GDP, Australia and other selected OECD countries, 1991 to 2000**

Country	Health expenditure (per cent)			Government welfare expenditure (per cent)		
	1991	1996	2000	1992	1996	1998
Australia	8.2	8.5	9.0	1.1	1.2	1.4
Canada	9.7	8.9	9.1	1.2	2.7	2.4
France	8.9	9.6	9.5	1.1	2.0	1.9
Germany	n.a.	10.9	10.6	1.3	1.5	1.6
Japan	5.9	7.0	7.8	0.3	0.5	0.6
New Zealand	7.4	7.2	8.0	0.2	0.1	0.1
UK	6.5	7.0	7.3	1.1	1.3	1.3
USA	12.6	13.2	13.0	0.7	0.7	0.6

Source: AIHW, *Health Expenditure Australia 2000-01*; AIHW, welfare services expenditure database; OECD, unpublished data.

## Expenditure on health services

It is estimated that spending on health accounted for 9.0% of GDP in 2000-01, up from 8.5% in 1996-97 (Table 4). Moreover, over the five years between 1995-96 and 1999-00 expenditure on health in Australia grew by 21.2% (Table A.1). Hospitals, which comprise the largest proportion of health expenditure (34.3% in 1999-00), grew by 18.2% over the period (Table A.1). Most of this growth can be attributed to drugs, medical and surgical supplies (which increased by 18.6% relative to GDP between 1995-96 and 1999-00), administrative expenses (which increased by 11.7% relative to GDP) and food supplies (11.4%) (Table A.3).

Services are the growth area in the Australian economy. Health and community services, as service industries, could expect to share in, and contribute to, the general growth in this area of the economy, particularly if demand increases due to demographic and other changes.

National health expenditure data are based on the industry classification (ABS 1993) and there is a relationship between industry and many of the health occupations. Some groups of the health occupations can be linked to areas of expenditure in the national health expenditure data. In the following analysis, changes in national expenditure are calculated only where there is a relatively direct relationship between the expenditure area and the occupations.

While health expenditure as a proportion of GDP has been increasing, some areas of expenditure grew at a greater rate than others. The broad area of most rapid growth in recurrent expenditure has been pharmaceuticals, aids and appliances (6.7%), followed by hospital and ambulance services (4.8%) (Tables 4 and A.2).

Within the broad groupings, however, there was more variation, ranging from increases in research (up 16.3%) and aids and appliances (up 9.7%) to decreases in public psychiatric hospitals (down 13.1%), community and public health (down 9.2%) and dental services (down 8.1%) (Table A.2).

**Table 4: Total health and welfare services expenditure as a proportion of GDP, 1996-97 to 2000-01**

Area of expenditure	1995-96	1996-97	1997-98	1998-99	1999-00	2000-01	Per cent increase 1996-97 to 1999-00
	(per cent)						
<b>Health expenditure</b>							
Hospitals, nursing homes and ambulance services	3.7	3.7	3.8	3.8	3.9	n.a.	4.8
Medical and other professional services	1.8	1.9	1.8	1.9	1.9	n.a.	1.4
Pharmaceuticals, aids and appliances	1.2	1.2	1.2	1.2	1.3	n.a.	6.7
Other services <sup>(a)</sup>	1.3	1.3	1.3	1.3	1.3	n.a.	-1.9
<i>Total health recurrent expenditure</i>	<i>7.9</i>	<i>8.0</i>	<i>8.1</i>	<i>8.1</i>	<i>8.3</i>	<i>n.a.</i>	<i>3.2</i>
Capital expenditure and consumption	0.5	0.5	0.5	0.6	0.6	n.a.	12.3
<b>Total</b>	<b>8.4</b>	<b>8.5</b>	<b>8.6</b>	<b>8.7</b>	<b>8.8</b>	<b>9.0</b>	<b>3.7</b>
<b>Welfare expenditure</b>							
Family and children's services	0.4	0.4	0.4	0.5	0.5	0.5	16.6
Aged persons	0.3	0.3	0.4	0.4	0.3	0.3	0.7
People with a disability	0.3	0.3	0.3	0.4	0.4	0.5	32.4
Purpose not defined <sup>(b)</sup>	0.8	0.8	0.8	0.8	0.8	0.8	2.8
<b>Total</b>	<b>1.8</b>	<b>1.9</b>	<b>1.9</b>	<b>2.0</b>	<b>2.1</b>	<b>2.0</b>	<b>10.7</b>

(a) Includes other non-institutional services (community and public health, dental services and administration) and research.

(b) Includes estimated expenditure by the private sector.

(c) Break in time series.

Note: Government welfare expenditure has a break in the time series between 1997-98 and 1998-99.

Source: Table A.2 and AIHW, *Welfare expenditure Australia 2000-01*.

## Expenditure on welfare services

The total value of welfare services provided in 2001 was estimated at \$43.1 billion (AIHW 2003). Of this, \$29.5 billion is the imputed value of services where no payments or expenses were actually incurred. The remaining \$13.7 billion relates to services for which expenditure was incurred, nearly all of which (\$13.5 billion) was incurred by governments and non-government community services organisations, making up 2.0% of GDP in 2000-01. (The remaining \$0.2 billion comprised estimated payments by households for informal paid childcare services provided within the households sector – that is, non-regulated care provided by family members, friends or neighbours, paid babysitters and nannies.)

Expenditure data on community services by the three levels of government are available by area of expenditure, but expenditure by individuals is not. Relative to GDP, government welfare expenditure increased by 10.7% between 1996-97 and 1999-00, much faster than the increase in health expenditure although from a smaller base. The largest increase was in expenditure for people with a disability, which increased by 32.4%. There was an 0.7% rise in expenditure on aged care to almost 1.0% of GDP when health expenditure on nursing homes, of which aged people are the principal clients, is combined with that on aged persons, which is delivered in a community setting. Expenditure on family and children's services rose by 16.6% (Table 4).



## Industry changes

The gradual redistribution of the age profile of the population has been accompanied by changes in policies that place a greater emphasis on care within a community environment rather than in an institution (AIHW 2001). A comparison of the 2001 and 1996 censuses shows that there have been changes to the occupational profiles of the health and community services industries (Table 5).

**Table 5: Employed persons in health and community services industries, Australia, 1996 and 2001**

Industry	1996	2001	Difference	% difference
<b>Health</b>				
Hospitals & nursing homes, undefined	2,816	1,803	-1,013	-36.0
Hospitals (excl. psychiatric hospitals)	219,640	211,363	-8,277	-3.8
Psychiatric hospitals	8,431	2,370	-6,061	-71.9
Nursing homes	80,574	65,884	-14,690	-18.2
Medical & dental services, undefined	—	2,428	2,428	. . #
General practice medical services	57,254	62,345	5,091	8.9
Specialist medical services	20,914	24,612	3,698	17.7
Dental services	24,896	29,426	4,530	18.2
Pathology services	10,869	15,707	4,838	44.5
Optometry & optical dispensing	8,236	9,281	1,045	12.7
Ambulance services	7,068	8,515	1,447	20.5
Community health centres	31,992	19,445	-12,547	-39.2
Physiotherapy services	6,722	8,428	1,706	25.4
Chiropractic services	4,384	5,086	702	16.0
Health services, nec	29,564	42,561	12,997	44.0 #
Health services, undefined	19,786	45,564	25,778	130.3 #
Other health services, undefined	4,208	2,963	-1,245	-29.6
<b>Community services</b>				
Child care services	66,424	64,385	-2,039	-3.1
Community care services, undefined	—	4,324	4,324	. . #
Accommodation for the aged	16,516	17,958	1,442	8.7
Residential care services, nec	24,357	19,056	-5,301	-21.8
Non-residential care services, nec	62,753	80,669	17,916	28.6 #
Community services, undefined	8,036	14,992	6,956	86.6
Health & community services, undefined	6,199	39,130	32,931	531.2 #
<b>Total health and community services</b>	<b>721,639</b>	<b>798,295</b>	<b>76,656</b>	<b>10.6</b>

Note: A hash (#) marks the industry data most affected by change in the data collection methodology.

Source: ABS, Census of Population and Housing, 2001.

Comparisons are complicated by a change in the methodology of collecting data on the employing business of census respondents, which resulted in large numbers of employees being classified to 'health and community services not further defined' in 2001. In 1996, 128,155 employed persons (17.8% of total employment) were in 'undefined' and 'not elsewhere classified' industry classes compared to 210,929 employed persons (26.4% of total employment) in 2001. (The industries most affected are marked with a hash (#) in Table 5.)

These data uncertainties make it difficult to conduct a definite quantitative analysis of change in the structure of the health and community service delivery industries since the 1996 census, but some trends are evident. For example, Table 5 shows a decrease in employment in institutional settings (hospitals, nursing homes and other residential care services), consistent with recent moves from institutional to community-based care in several health and community services industries (AIHW 2001a).

A considerable number of respondents to the census identified an area health council, by various names depending on state, as their employer. These councils have been included in ANZSIC in the health services 'not elsewhere classified' (n.e.c.) category, which increased by 13,000 employed persons from 4.1% of total employment in 1996 to 5.3% in 2001. The increase in the number of employed persons in health services n.e.c., and an almost equal decrease in numbers employed in community health centres between 1996 and 2001, are consistent with this classification change.

## **Changes in occupational mix**

The increase in employment in occupations in the health and community services industries was uneven, with a 14.7% increase in occupations designated as health and community services occupations and a much smaller 3.3% increase in the occupations providing managerial and other support services (Table 6). The largest growth tended to occur among the community services occupations.

The main feature of the increases in the health and community services occupations was an adjustment to the mix of the nursing and nursing assistant occupations within the nursing workforce. There was an increase in registered nurses that kept pace with the general population increase, and a decrease in enrolled nurses and their apparent replacement with a larger number of lower paid carers and aides. The number of medical professionals increased at a slightly lower rate (11.2%) than the overall increase in employment in health and community services occupations.

The apparent 35% reduction in the number of education professionals was the result of a change in the census coding of some of these workers from the health and community services industries to the education industry. There was an overall increase of 11.3% in the number of pre-primary and special needs teachers (Table A.11 and AIHW 1996).

There was a decrease of 2,976 (9.3%) in those employed in hospitality and food preparation occupations, and a decrease of 7,835 (19.2%) in plant operators, labourers and cleaners (Table 6). This may indicate some degree of outsourcing of food preparation, cleaning and maintenance services. While most occupations in the tradespersons and related workers group recorded decreases, there was an increase in the number of drivers (264 or 6.6%), mainly employed in the pathology services industry, and for 'other associate professionals' (296 or 28.0%), which includes security officers (Table 6 and unpublished data).

Increasing computerisation of administrative functions was evident, associated with a restructuring in the administrative occupations. There was a decrease of 1,974 (12.2%) in secretaries, personal assistants and advanced clerks and an increase in business and computing associate professionals, and intermediate clerical workers of 7,144 (44.5%) and 10,462 (13.9%) respectively.

**Table 6: Employed persons in health and community services industries: occupation, Australia, 1996 and 2001**

Occupation	1996	2001	Difference	% difference
<b>Health and community services occupations</b>				
Natural & physical science/engineering professionals	7,525	9,500	1,975	26.2
Medical professionals	41,447	46,073	4,626	11.2
Registered nurses	152,652	161,736	9,084	6.0
Allied and complementary health professionals	41,857	50,401	8,544	20.4
Education professionals	6,579	4,273	-2,306	-35.1
Social welfare professionals	34,443	42,529	8,086	23.5
Natural & physical science/engineering associate professionals	8,318	12,943	4,625	55.6
Enrolled nurses	23,140	18,194	-4,946	-21.4
Ambulance/dental/A&TSI health workers/inspectors	11,150	15,510	4,360	39.1
Welfare associate professionals	8,575	12,129	3,554	41.4
Carers and aides—health	41,734	50,222	8,488	20.3
Carers and aides—community services	83,703	102,526	18,823	22.5
Dental assistants/personal care consultants	14,052	17,524	3,472	24.7
<i>Total</i>	<i>475,175</i>	<i>543,560</i>	<i>68,385</i>	<i>14.4</i>
<b>Other occupations</b>				
Managers	24,260	26,722	2,462	10.1
Business/computing professionals	11,590	13,551	1,961	16.9
Business/computing associate professionals	16,059	23,203	7,144	44.5
Hospitality/accommodation/sales associate professionals	8,366	7,776	-590	-7.1
Mechanical/building/electrical tradespersons	11,217	8,902	-2,315	-20.6
Food tradespersons	7,261	6,642	-619	-8.5
Secretaries and personal assistants/advanced clerical	16,140	14,166	-1,974	-12.2
Intermediate clerical/sales and service	75,086	85,548	10,462	13.9
Plant & machine operators/drivers	6,694	6,524	-170	-2.5
Elementary clerical and sales	6,360	7,164	804	12.6
Guards/porters/housekeepers	7,261	8,314	1,053	14.5
Labourers and cleaners	34,195	26,530	-7,665	-22.4
Food labourers	16,494	14,727	-1,767	-10.7
Not stated	5,481	4,872	-609	-11.1
<i>Total</i>	<i>246,464</i>	<i>254,641</i>	<i>8,177</i>	<i>3.3</i>
<b>Total<sup>(a)</sup></b>	<b>721,639</b>	<b>798,201</b>	<b>76,562</b>	<b>10.6</b>

(a) Includes those whose occupation was not stated or could not be further defined.

Source: ABS, Census of Population and Housing, 1996 and 2001.

## Changes in income and hours worked

### Income

The census collects data on income from all sources within specified ranges and cannot provide average income by occupation, nor can it separate out wage and salary earnings derived from employment in the occupation from other sources of income. Hence, data presented here for comparisons of wage and salary earnings differentials between persons who are employees in these occupations, and estimates of the effects on the salary and wages of occupational restructuring, are drawn from the Australian Bureau of Statistics (ABS) Employee Earnings and Hours surveys of 1996 and 2002. Base pay, which excludes overtime and allowances, is used as the basis of comparison between occupations drawn from this source. These surveys provide good estimates for broad occupational groupings, but not all

specific occupations are accurately measured. For occupations at the finer level of classification, income data from the census is used in this report as an approximation.

For example, between the 1996 and 2001 census the number of registered nurses increased by 6%, while the number of enrolled nurses, a lower paid category of nursing care (\$720.80 base pay per week in 2002 for full-time workers, compared with \$936.30 for registered nurses), decreased by 21%. At the same time, personal carers and nursing assistants (\$631.40 base pay per week), occupations that are lower paid than enrolled nurses, increased by 20.3%, apparently substituting for enrolled nurses or taking over some of the less skilled tasks of registered or enrolled nurses (Tables A.20 and A.24).

**Table 7: Health and community services: selected adult non-managerial employees, weekly earnings, 1996 and 2002**

Occupations	Full-time adults: ordinary time earnings, base pay (dollars)		Per cent change
	1996	2002	
Medical practitioners	1,261.70	1,404.40	11.3
Nursing professionals	784.20	936.30	19.4
Enrolled nurses	558.70	720.80	29.0
Personal care and nursing assistants	509.00	631.40	24.0
Secretaries and personal assistants	561.20	633.00	12.8
Intermediate clerical workers	506.30	634.50	25.3
Computing professionals	775.60	848.80	9.4
Finance associate professionals	790.40	908.60	15.0
Accountants, auditors and corporate treasurers	813.30	930.80	14.4
Sales, marketing and advertising professionals	791.90	769.30	-2.9
Miscellaneous labourers and related workers	460.80	444.80	-3.5

Note: based on current prices, not adjusted for inflation.

Source: ABS, Survey of Employee Earnings and Hours.

The computerisation of clerical functions mentioned in the previous section may also have had an effect on wages and salaries. The base pay of secretaries and personal assistants increased by 12.8% between 1996 and 2002, but fell behind the increases of 25.3% for intermediate clerical workers. While the number of business/computing professionals and associate professionals grew by 16.9% and 44.5%, respectively, the base pay of computing professionals increased by 9.4%, also below increases of 15.0% in the base pay of finance associate professionals and 14.4% for accountants, auditors and corporate treasurers.

Occupations for which the base pay decreased within the health and community services industries between 1996 and 2002 included sales, marketing and advertising professionals (a drop of 2.9%) and miscellaneous labourers and related workers (down 3.5%).

## Hours worked

For both males and females in health and community services occupations there is a greater tendency to work part-time than in many other industries. In 2001, 52.6% of females and 21.6% of males in these occupations worked part-time (compared with 43.6% and 13.4% across all occupations) (ABS 2002a). This was an increase in part-time work from 1996, when the proportions were 50.9% and 18.7%, respectively. The health and community services

occupations are also major employers of females: the proportion of all females working in those occupations rose slightly from 77.8% in 1996 to 78.5% in 2001.

There was a greater propensity in 2001 for both males and females in community services occupations than in health occupations to perform part-time work. For those working part-time, the male proportions were 17.6%, 35.1%, and 21.6% in health occupations, community services occupations and all of those occupations respectively. The female proportions were more consistent at 51.3%, 54.5% and 52.6%, respectively.

**Table 8: Distribution of hours worked per week in health and community services occupations, Australia, 1996 and 2001**

	Proportion working 1–15 hrs			Proportion working < 35 hrs <sup>(a)</sup>			Proportion working 49+ hrs		
	Males	Females	Persons	Males	Females	Persons	Males	Females	Persons
	(per cent)								
<b>Health occupations</b>									
1996	3.7	10.4	8.7	15.4	50.0	41.3	30.7	4.4	11.1
2001	4.0	9.5	8.2	17.6	51.3	42.9	33.1	7.8	14.1
<b>Community services occupations</b>									
1996	11.4	18.3	17.4	31.1	52.3	49.5	10.3	6.3	6.8
2001	11.7	17.5	16.8	35.1	54.5	52.1	12.3	7.8	8.3
<b>Health and community services occupations</b>									
1996	5.3	13.4	11.7	18.7	50.9	44.1	26.4	5.2	9.6
2001	5.8	12.8	11.3	21.6	52.6	46.3	28.3	7.8	12.0

<sup>(a)</sup> Includes those working 1–15 hours.

*Note:* The published hours worked data for 1996 did not include all the occupations in this report. The 2001 data in this table are for the same occupations as the 1996 data and do not match calculations based on the full list of occupations in this report.

*Source:* ABS, Census of Population and Housing, 1996 and 2001.

At the other end of the scale, for those working 49 or more hours per week, the male proportions were 33.1%, 12.3% and 28.3% in the health, community services and all occupations, respectively. The female proportion was consistent at 7.8% in all three.

Table 8 compares 1996 and 2001 for the same occupations and shows that:

- The percentage of males working 15 hours or less per week increased while that for females decreased.
- The percentage of males and females working less than 35 hours per week (part-time) increased, with males increasing at a greater rate than females.
- The percentage of males and females working 49 or more hours per week increased.

The result of these differing movements was an overall decrease between 1996 and 2001 in the average hours worked in both the health and the community services occupations (from 30.9 to 30.8 per week and from 30.2 to 29.6 per week, respectively) (ABS 2003b).

Ambulance services provide a good example of the interaction of changes in occupational mix and wages and salaries. Between the 1996 and 2001 census, the number of ambulance officers and paramedics increased by 12.5% but the proportion of intensive care ambulance paramedic officers increased from 31% to 52% of the total. Paramedics have higher incomes than ambulance officers, with 82% of paramedics having incomes of \$41,600 or more per year compared with 63% of ambulance officers (Table A.22). This higher income may be partly due to the longer hours worked by paramedics – 64% of paramedics compared to 54% of

ambulance officers worked more than 40 hours per week (Table A.16). The greater staffing costs from this change in the occupational mix would amount to around \$8 million based on a rough estimate using the data in Table A.22.

As noted above, there were also apparent changes to the way nursing and related care is delivered, with increases in the highest paid category of registered nurses, and in the lowest paid category of personal carers and nursing aides, together with decreases in the number of enrolled nurses. Enrolled nurses have a younger age profile than the other two nursing groups, with 7.3% aged 55 or over, compared with 11.1% for registered nurses and 12.7% for personal care assistants and nursing assistants. This change in the mix of nursing occupations has resulted in an older age profile of nursing workers (11.2% were aged 55 years and over in 2001, compared with 7.6% in 1996) and a decrease in average hours worked (50.9% worked part-time in 2001, compared with 33.8% in 1996) (Tables A.14 and A.16, and AIHW 1996). In combination, the effect has been a lower proportion in 2001 of nursing workers with incomes under \$41,600 (73.4%) than in 1996 (73.5%), but these are in actual dollars for each of those years rather than real terms (Table A.22 and AIHW 1996). Data on nursing pay rates is not available from the employee earnings and hours data.

These are only two examples, however, and a more detailed analysis of changes for all the major health and community services occupations is provided in later chapters.

# Characteristics of health and community services workers

## Sex

The health and community services industries employed 9.7% of the Australian workforce in 2001, and are major employers of women, employing a much higher proportion (17.1%) of the female workforce. These industries are also predominantly female: females make up 74% of the health industry and 86% of the community services industry. Of the 105 occupations shown in this publication, men outnumbered women in only seven (Table 9).

**Table 9: Persons employed in selected health and community services occupations, proportions male, part-time and earning over \$1,000 per week, Australia, 2001**

Occupation	Proportion male	Proportion working part-time	Persons employed with weekly income of \$1,000 or more
	Per cent	Per cent	Per cent
<b>Predominantly male occupations<sup>(a)</sup></b>			
Ambulance officers and paramedics	80.1	8.4	45.9
Dental practitioners	74.0	24.1	75.3
Chiropractors and osteopaths	70.7	38.0	42.2
Generalist medical practitioners	64.1	22.7	76.5
Specialist medical practitioners	73.7	15.5	88.0
<i>All medical practitioners</i>	67.3	19.1	80.3
Optometrists	58.9	24.6	55.4
Occupational and environmental health professionals	57.5	15.1	31.4
Dental associate professionals	52.5	29.6	14.9
<b>Predominantly female occupations<sup>(b)</sup></b>			
Dental assistants	1.3	43.6	0.6
Pre-primary school teachers	2.0	40.2	12.5
Childrens care workers	3.8	52.8	0.7
Occupational therapists	7.0	38.9	17.4
All nursing professionals <sup>(c)</sup>	8.5	48.2	12.3

(a) All occupations in which the majority were male.

(b) Occupations with the highest proportions of females.

(c) Includes nursing professionals nfd. More detail on individual nursing occupations is presented in Table 10.

Source: ABS, Census of Population and Housing, 2001.

Men working in the health and community services industries tended to be concentrated in high-income occupations. By comparison, those occupations in which almost all were women had much lower proportions of workers with weekly incomes of \$1,000 or more. Part of the explanation is that men are more likely to have higher earnings as they are more likely than women to work full-time. (Income recorded by the census includes earnings as well as other sources such as investment returns, government welfare, child support etc. The ABS

Survey of Employee Earnings and Hours provides earnings data only for broad-level occupations, so income data from the census is used here as an indicator of earnings.) The predominantly male occupations shown in Table 9 tended to have much lower proportions of part-time workers than those with high proportions of females.

The sex differences persist in nursing, numerically the largest health and community service occupation. Males made up 8.6% of all nurses, but there were relatively higher proportions of males employed as health services and nurse managers and in the fields of mental health and developmental disability. These fields of nursing have more than twice the proportion with incomes of \$1,000 a week or more as general registered nurses.

**Table 10: Persons employed in nursing occupations: proportions male, part-time and earning over \$1,000 per week, Australia, 2001**

Occupation	Proportion male	Proportion working part-time	Persons employed with weekly income of \$1,000 or more
	Per cent	Per cent	Per cent
Registered mental health nurses	35.3	27.7	28.2
Registered developmental disability nurses	30.7	32.1	25.7
Health services managers	24.8	11.7	65.8
Nurse managers	11.7	21.7	55.3
Nurse educators and researchers	8.7	37.3	27.1
Registered nurses	7.6	50.4	11.5
Registered midwives	1.1	62.8	12.3
<b>All nursing professionals<sup>(a)</sup></b>	<b>8.6</b>	<b>48.8</b>	<b>14.4</b>

(a) Includes nursing professionals nfd. Excludes health services managers.

Source: ABS, Census of Population and Housing, 2001.

## Age

The change in age distribution of the health and community services occupations listed in this publication is a reflection of changes in the rate of growth in practitioners in many of the occupations and, possibly, the availability of options for a higher level career in other occupations. The length of training or experience that is required for entry to some professions shown in this publication (such as medicine) acts to increase the average age of those practitioners relative to other occupations. Much of the concern about health workforce planning has focussed on the occupations of medical practitioners, nurses and retail pharmacists, which are the mainstays of the traditional model of health service delivery, and all of which have ageing workforces. Nevertheless, there is growing concern about a number of other occupations in which there is a relatively old age profile in conjunction with a current or expected shortage of practitioners.

Occupations with large proportions (one-third or more) of practitioners aged 55 years and over include managerial positions (e.g. director of nursing, medical administrator, welfare centre manager) and those that are likely to require a number of years' experience in a related occupation before entry or where there is limited career progression to occupations with other titles. Specifically, this group includes the health occupations of obstetrician and gynaecologist; ophthalmologist; pathologist; specialist physician; psychiatrist; radiologist; surgeon; director of nursing; and dental specialist, and the community services occupations of safety inspector; teacher of the sight impaired; and welfare centre manager. For example,



6.5% of employed medical practitioners and 6.4% of retail pharmacists were aged over 65 years, as were 12.4% of ophthalmologists and 9.6% of surgeons (Tables A.14 and A.15).

Three-quarters or more of the practitioners in 17 of the health occupations were aged under 45 years – medical practitioner in training, emergency medicine specialist, radiation therapist, nuclear medicine technologist, sonographer, dental therapist, dental hygienist, dental assistant, industrial pharmacist, occupational therapist, optometrist, speech pathologist, podiatrist, dietitian, orthoptist, anatomist or physiologist and health information manager. Many of these occupations underwent substantial growth between 1996 and 2001. For community services, occupations with a young age profile were confined to those concerned with youth welfare: youth worker, child care worker and nanny.

Age is only one factor that can contribute to or exacerbate current or expected workforce shortages. Some of the other changes affecting supply of health professionals may include the increased number of females and an associated decrease in hours worked due to preferences for part-time work; rapid advances in technology; new approaches to service delivery; changes in the way health services are organised; changes in disease patterns (including those associated with an ageing population); and demographic shifts in the labour force, including an increased tendency for early retirement. Many of those changes are largely unpredictable, but even for those that are (such as the ageing workforce), the extent to which supply may be affected can not be fully anticipated (AMWAC 2003).

Making adjustments to student intake can only affect workforce numbers over the medium term, especially in professions requiring lengthy training. Adjustments to migrant intake and attracting qualified health practitioners into the labour force or encouraging current workers to work longer hours can have a quicker impact. For example, any undersupply of medical practitioners in rural and remote areas can in part be addressed by increasing the intake of temporary resident doctors (immigrant doctors employed for a period of up to one year in a designated area of need). This strategy can also introduce a number of younger practitioners into the workforce.

On the other hand, supply in many of the health occupations may be boosted by workers who continue to work beyond the customary retirement age of 65 years. Across all health fields, 15% of those 65 years of age with their highest qualification in a relevant field reported being employed, as did 40.2% of people aged over 65 years with qualifications in chiropractic and osteopathy, 40.1% of those with qualifications in medical studies, pharmacy (26.5%), optometry (24.3%) and dentistry (19.7%) (Table A. 9). This compares with around 5.8% of the general population aged 65 years or more who were employed in June 2001 (ABS 2001b).

## **Highest qualification in a health field**

Highest qualification data can provide a measure of the number of people with a relevant academic qualification for a profession compared to the number employed in the profession. This can give an indication of how many qualified people are not working in the relevant field, and an approximate size of the pool of potential re-entrants to a profession. For those occupations where entry is not dependent on a particular qualification, this data can also indicate whether their workforces comprise a large proportion without relevant skills. The data has some limitations because it does not identify the initial qualification of those who have a postgraduate qualification in a different field, for example, a nursing degree followed by a postgraduate management degree. In addition, a qualification reported in the census may be from an overseas institution and not recognised for entrance to a registered health profession in Australia.

There is a close relationship between the professional employment numbers and the number with qualifications in the fields of medical studies, dentistry, dental assisting, pharmacy, optometry, radiography, physiotherapy, chiropractic and osteopathy, speech pathology and podiatry (Tables A.6 and A.9). It is noted that courses leading to these qualifications have a close relationship with training for a related profession. Despite a similar close relationship between nursing qualifications and the nursing occupation there is a substantial gap between the numbers of employed persons who have a nursing qualification (230,184) (Table A.9) and the numbers employed in the profession (171,615 registered nurses and 19,510 enrolled nurses) (Table A.6). This indicates that there are around 40,000 employed persons with a nursing qualification who are not employed in nursing.

Unemployment ranged from zero for those qualified in obstetrics and gynaecology and palliative care nursing to 3-4% for aged care nursing and most public health fields. The fields where unemployment exceeded 4.0% were: 'first aid' at 14.5% among the 1,078 persons who reported this qualification; 6.3% of the 432 persons with 'Indigenous health' qualifications; 5.9% for 'massage therapy' and all the complementary therapy occupations (e.g. naturopathy, acupuncture and traditional Chinese medicine), which together averaged 5.4% (Table A.9).

## **Indigenous health and community service workers**

At the 2001 census, there were 410,003 people who identified as being of Indigenous origin, an increase of 16.2% from 352,970 people in 1996. The Indigenous population represented 2.4% of the total Australian population in 2001, up from 2.0% in 1996 (ABS 2003a). The current life expectancy at birth of Indigenous people is 56 years for males and 63 years for females, around 20 years less than the 77 years and 82 years for males and females respectively for the total population (ABS 2002b). Health care provided by Indigenous people is one strategy to improve health care and increase the health status and life expectancy of the Indigenous population.

There were 3,742 Indigenous people employed in health occupations in 2001, comprising 0.9% of health occupation workers (Table A.18). The occupation of Aboriginal and Torres Strait Islander health worker ('Indigenous health worker' in this publication) employed 853 Indigenous people, which comprised 22.8% of all Indigenous people working in health occupations and 93.2% of workers in this occupation. A total of 444 people reported a highest qualification in Indigenous health and, of those, 6.1% reported being unemployed and a further 24.3% as not in the labour force (Table A.9).

Excluding Indigenous health workers, 0.7% of health occupation workers in 2001 were Indigenous – well below the 2.4% Indigenous representation in the population. In the health occupations not specifically targeted at Indigenous health, those with the greatest proportion of Indigenous people were environmental health worker (3.5%), primary products inspector (2.0%), nursing assistant (1.7%), medical administrator (1.6%), ambulance officer (1.6%), personal care assistant (1.4%) and admissions clerk (1.1%). In all other health occupations there were 1.0% or fewer Indigenous workers.

There was a greater proportion of Indigenous workers in the community services occupations, with 6,294 workers, comprising 2.7% of community services occupation workers. The occupations with higher Indigenous representation were refuge worker (21.9%), family support worker (16.5%), special education teacher nec (16.2%), drug and alcohol counsellor (8.8%), welfare associate professional nfd (7.4%) and youth worker (7.1%) (Table A.19).

# Health occupations

There were 450,792 people employed in health occupations in 2001, representing a growth of 11.4% since 1996. This chapter provides a brief summary for each of the broad health occupations, including growth between 1996 and 2001, hours worked, gross income according to the census and earnings where available from the ABS Survey of Employee Earnings and Hours.

## Medical practitioners

The number of medical practitioners (including medical administrators) increased by 12.6% (from 46,043 to 51,859) between the 1996 and 2001 censuses. This was more than the 6.0% population increase. There was considerable variation within this overall increase, ranging from decreases of 537 (31.8%) for pathologists and 61 (7.1%) for obstetricians and gynaecologists, to relatively large increases in other medical occupations (Table A.20). Occupations with higher percentage increases were emergency medicine specialists (139 or 73.9%), dermatologists (41 or 20.1%), specialist physicians (307 or 18.8%), radiologists (189 or 16.0%) and paediatricians (94 or 13.3%). Numerically large increases of 2,772 generalist practitioners, 304 surgeons and 222 anaesthetists were all slightly below the general overall percentage increase. There was a substantial increase of 1,803 (93.9%) in medical administrators.

In 2001, 22.7% of generalist practitioners and 15.5% of specialists worked part-time hours (Table A.16) – an increase from 20.0% and 13.3% respectively in 1996. There was an increase in the proportion of specialists working long hours (49 or more hours per week), from 53.6% to 55.1%, and a decrease for generalist practitioners, from 46.4% to 44.1%. The proportion of women in general practice increased from 32.3% to 34.9% between the censuses. Female practitioners work part-time more often than males, and are less likely to work long hours.

At the 2001 census, 55.9% of medical practitioners reported annual gross income greater than \$78,000 and a further 31.9% reported incomes in the range \$41,600–\$77,999 (Table A.22). As noted previously, income data derived from the census includes all sources; not just income derived from paid employment. Most generalist practitioner and specialist remuneration in the private sector is derived from Medicare payments, although medical practitioners also receive payment as salaried and visiting medical practitioners in public hospitals. Australian Hospital Statistics reveal that in 2001–02, recurrent salary and wages expenditure on the 18,628 FTE salaried medical officers in public acute and psychiatric hospitals amounted to \$2.0 million (AIHW 2002). This equated to around \$108,700 per FTE salaried medical officer. For generalist practitioners, the number of Medicare services per capita decreased by 7.3% between 1996–97 and 2001–02, and the fees charged per capita increased by 13.4%. For specialists, the Medicare services per capita increased by 17.3% and the Medicare fees charged per capita increased by 32.2% (DoHA 2002).

Between May 1995 and May 2002, the base pay (which excludes allowances and overtime earnings) for salaried medical practitioners increased by 11–12% and that for medical practitioners in managerial positions increased by around 33%. Base pay for full-time non-managerial medical practitioners was 63.7% above the health and community services industry average (ABS 2002c).

## Medical imaging

The medical imaging workforce numbered 8,141 in 2001, a 25.0% increase on the 6,513 in the workforce in 1996 (Table A.20), much higher than the 6.0% population increase. Diagnostic radiographers, radiation therapists and nuclear medicine technologists increased by 16.0%, 15.4% and 12.1% respectively between 1996 and 2001. The number of sonographers increased by 102.0% to 1,418 and in 2001 made up 17.4% of the medical imaging workforce, up from 10.8% in 1996.

Some 55.6% of medical imagists had gross annual income in the range \$41,600–\$77,999 (Table A.22). Sonographers had the highest incomes amongst the medical imaging workforce, with 60.9% reporting gross income in the bracket \$41,600–\$77,999 and a further 12.2% with incomes above \$78,000. Between 53.9% and 59.2% of workers in all the other occupations in the group reported incomes in the range \$41,600–\$77,999 but did not have as large a proportion with incomes over \$78,000.

Sonographers generally worked fewer hours than diagnostic radiographers, radiation therapists and nuclear medicine technologists. Some 39.8% of sonographers worked part-time compared to 29.5%, 22.6% and 21.6% respectively for radiographers, radiation therapists and nuclear medicine technologists. At the other end of the scale, 5.5% of sonographers worked long hours (49 hours or more per week) compared to 9.5% of radiographers, 4.9% of radiation therapists and 8.8% of nuclear medicine technologists (Table A.16).

## Dental workers

The total dental workforce was 25,884 in 2001 – an increase of 11.0% from 23,318 in 1996, and more than the 6.0% population increase. The number of dentists and dental specialists increased by 7.8% to 8,194 between 1996 and 2001. This increase was slightly above the increase in the population. Dental therapists and hygienists increased by 6.0% overall with a decrease in dental therapists offset by a substantial increase in dental hygienists. There was a minor increase of 1.3% in dental technicians. The number of dental assistants increased by 16.3% to comprise 50.6% of the dental workforce in 2001 – up from 48.3% in 1996 (Table A.20).

Dentist specialists and dentists generally received relatively high incomes with 70.4% of dental specialists and 48.1% of dentists having incomes higher than \$78,000 in 2001. The annual incomes of a further 14.9% of specialists and 36.9% of dentists were in the range \$41,600–\$77,999 (Table A.22).

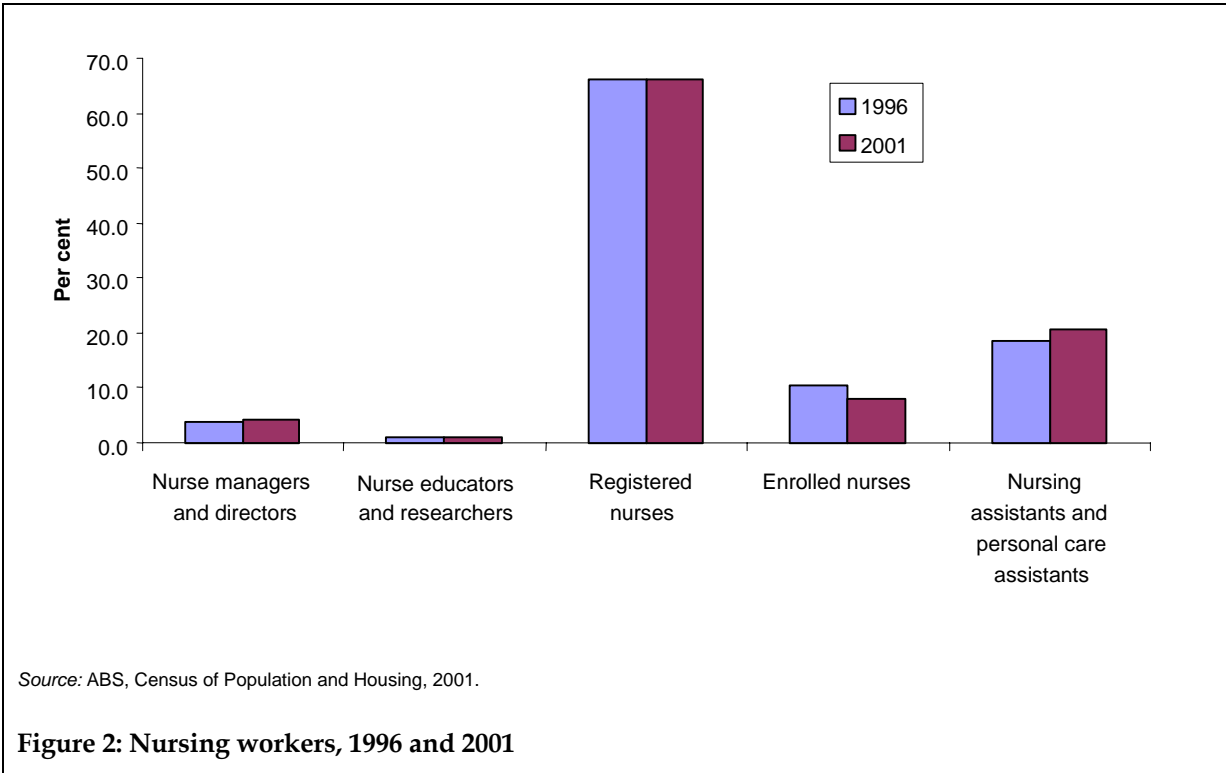
Dental hygienists had higher incomes than dental therapists, with 49.7% of hygienists receiving more than \$41,600 compared to 23.1% of therapists. The majority (55.8%) of dental therapists had incomes in the range \$20,800–\$41,599. Hygienists achieved these higher incomes in fewer working hours than therapists, with 60.6% of hygienists working part-time compared to 51.8% of therapists and 0.7% compared to 2.0%, respectively, working long hours (49 hours or more per week) (Table A.16).

Most (54.7%) dental assistants' annual incomes were in the range \$20,800–\$41,599 with 2.0% reporting incomes greater than \$41,600. A further 31.6% reported incomes between \$10,400 and \$20,799. In May 2002, the full-time adult base pay for dental assistants was 26.8% below the average for the health and community service industries, making dental assistants some of the lowest paid workers in the industries – only slightly above elementary clerks and labourers. Some 43.6% of dental assistants worked part-time and 2.6% worked long hours.

# Nursing workers

The total nursing workforce numbered 244,405 in 2001, up 5.4% on 1996 (Table A.20) but lower than the 6.0% population increase. There are indications of structural shifts in the composition of this workforce, which in 2001 consisted of 1.1% directors of nursing, 3.0% nurse managers, 1.1% nurse educators and researchers, 66.1% registered nurses, 8.0% enrolled nurses and 20.7% assistants in nursing. This compares with 1.4%, 2.7%, 0.9%, 66.1%, 10.6%, and 18.4% respectively in 1996. There was a decrease of 460 (14.7%) directors of nursing and an increase of 1,214 (19.7%) nurse managers; a small increase in nurse educators (8.0%) and an increase from 279 to 700 nurse researchers (Figure 2).

Just over half (51%) of all nurses worked part-time. The nursing occupations with the lowest proportions working part-time were director of nursing (9.0%) and nurse manager (21.7%), and were also those with the greatest proportion working long hours – 36.2% of directors of nursing and 16.8% of nurse managers. Registered midwives had the greatest proportion working part-time at 62.8%, closely followed by nursing assistants at 61.2% (Table A.16).



At the 2001 census, more than 75% of directors of nursing and nurse managers reported incomes above \$41,600, as did 50% or more nurse educators, mental health nurses, and developmental disability nurses. The majority of all other nursing occupations received incomes higher than \$20,800 (Table A.22).

Between May 1996 and May 2002 the base pay (i.e. excluding overtime and allowances) for full-time registered nurses increased around 19%, from \$784 per week to \$936 a week, while total earnings increased 16% and total paid hours worked decreased about one hour per week (3%). Enrolled nurses’ full-time base pay increased around 29% (to \$720.80 per week) while paid hours decreased around 4%. The full-time base pay for assistants in nursing increased 24% (to \$631.40 per week) and the paid hours increased by around one hour (3%).

In 1996 the base pay for a registered nurse in a non-managerial role was around 88% of that for a nurse in a managerial role. By 2002 this difference had disappeared and the base pay was equal (Table A.24 and ABS 2002c).

## Pharmacists

Pharmacists overall increased by 13.0% between 1996 and 2001 to 13,911, which was higher than the 6.0% population increase. Relatively large decreases in hospital pharmacists (339 or 19.6%) and industrial pharmacists (222 or 31.5%) were offset by a relatively large increase (2,161 or 21.9%) in retail pharmacists. Retail pharmacists made up 86.5% of all pharmacists in 2001 – up from 80.2% in 1996 (Table A.20).

In 2001, a similar proportion of both hospital (29.7%) and retail pharmacists (30.7%) worked part-time. However, far fewer hospital pharmacists (9.6%) worked long hours than retail pharmacists (27.1%) (Table A.16).

The Commonwealth Department of Health and Ageing publishes information on their website (<[www.health.gov.au/pbs/pubs/atoz.htm](http://www.health.gov.au/pbs/pubs/atoz.htm)>) relating to the government's Pharmaceutical Benefits Scheme (PBS). The number of prescriptions dispensed under the PBS gives an indication of the dispensing workload of retail pharmacists. There were 124.1 million PBS prescriptions dispensed in 1996–97 and 155.0 million in 2001–02 (excluding scripts for Veterans' Affairs) – a 24.9% increase. In 1996–97 there was an average of 12,560 PBS prescriptions per retail pharmacist compared to 12,870 prescriptions per pharmacist in 2001–02.

At the 2001 census, the income of pharmacists closely reflected the distribution of working hours. For most pharmacists, their income fell in the range \$41,600–\$77,999, while 35.6% of hospital pharmacists and 33.2% of retail pharmacists received incomes less than \$41,600. Receiving incomes over \$78,000 per year were 5.7% of hospital pharmacists and 22.9% of retail pharmacists. The pattern for industrial pharmacists differed in that 35.3% had incomes under \$41,600 – but 17.3% of this group worked part-time (Table A.22).

The average base pay for a full-time adult pharmacist in May 2002 was around \$959.70 per week, which was about 25% above the average base pay for employees in the health industries. This base pay had increased by about 25% since May 1996 (unpublished data from the ABS Surveys of Employee Earnings and Hours, 1996 and 2002).

## Allied health workers

Most allied health occupations were numerically small in 2001, but recorded relatively large increases between 1996 and 2001. Allied health professionals overall increased by 26.6% with the numerically largest occupations of physiotherapist, clinical psychologist and occupational therapist increasing 15.1%, 44.1% and 22.7% to 10,246, 7,567 and 5,353 respectively. These increases were all more than the 6.0% population increase over the period. The three occupations comprised 58.7% of this group (Table A.20).

At the 2001 census, allied health workers reported a wide range of incomes, with 38.2% reporting in the range \$41,600–\$77,999 and 37.7% in the range \$20,800–\$41,599 (Table A.22). A few occupations reported sizeable proportions with annual incomes above \$78,000 (21.3% of optometrists, 20.7% of chiropractors and 16.1% of osteopaths).

Over three-quarters of the allied health professionals worked 40 hours a week or less – 42.1% worked part-time and 35.5% worked 35–40 hours per week. This was similar to the profile of all health workers, of whom 77.3% worked 40 hours per week or less (Table A.16).

## Complementary therapies workers

As with the allied health occupations, the complementary therapies occupations were numerically small in 2001 (8,533 in total), but had increased substantially (by 31%) since 1996. Complementary therapies workers overall recorded an increase of 31.2% between 1996 and 2001. Naturopathy was the largest profession in the group with 2,502 members in 2001 – an increase of 31.3% since 1996. Natural remedy consultants and chiropractors had 2,345 and 2,072 members respectively. These three professions comprised 81.1% of this group.

Over half (55.4%) of complementary therapy professionals worked part-time – those working less than 16 hours per week made up the numerically largest group. Apart from chiropractors and osteopaths, who generally reported incomes in the higher ranges, most other practitioners of complementary therapies received incomes below \$41,600 (Table A.22).

## Other health workers

Other health workers may be divided into two groups – a group who mainly work in the health and community services industries, and a second group who mainly work in government administration or other industries.

The first group increased in numbers by 38.4% between the censuses, with most occupations recording substantial relative increases. Medical technical officers, the largest group in 2001, increased by 5,709 (69.5%) to 13,927 members, with most of the increase occurring in the pathology services industry. There was a smaller increase of 1,595 medical scientists (16.8%), the largest group in 1996, but the second largest in 2001. The numbers of massage therapists and anatomists or physiologists more than doubled to 4,921 and 512 respectively, and there were overall increases of 166 (48.0%) for biomedical engineers, 218 (30.8%) for Indigenous health workers and 747 (12.5%) overall for the two ambulance occupations (ambulance officers and intensive care ambulance paramedics) (AIHW 1996 and Table A.20).

Between 1996 and 2001, the second group decreased overall by 1.0% with an increase of 166 (48.0%) biomedical engineers, 667 (23.8%) occupational health and safety officers and 898 (24.5%) safety inspectors. These increases did not offset the decrease of 1,816 (35.4%) environmental health officers and a small decrease of 46 (1.6%) primary products inspectors and 31 (3.9%) weight loss consultants (Table A.20).

Between 1996 and 2001, ambulance officers and intensive care ambulance paramedics together increased by 12.4% to 6,708 officers. However, there was a major structural shift in the numbers in each occupation. In 2001, there were 3,464 intensive care ambulance paramedics and they comprised 51.6% of the two occupations together – up from 1,849 and 31.0% in 1996. The proportion of paramedics differs widely among the states and territories, with New South Wales having 17.6% paramedics, the Northern Territory 42.6%, Tasmania 52.0%, South Australia 60.9%, Western Australia 66.9%, Queensland and the Australian Capital Territory both with 72.6%, and Victoria 75.8% paramedics.

A small proportion of ambulance officers and intensive care ambulance paramedics worked part-time, 8.4% and 5.5% respectively, and almost equal numbers worked 49 or more hours

per week, 27.5% and 29.2% respectively (for which overtime payments may have applied) (Table A.16). The income that was recorded in the 2001 census would give an indication of the relative salary difference. Some 62.2% of ambulance officers and 80.7% of paramedics had incomes above \$41,600 per year (Table A.22).

In the other occupations in this group, those that stand out are:

- massage therapists and weight loss consultants – about 75% of workers in each occupation worked part-time, with resultant relatively low incomes
- biomedical engineers, with 3.4% working part-time, 22.9% working long hours and 76.0% earning more than \$41,600 per year.



# Community services occupations

In this section, occupations are grouped in categories that reflect the service or clients dealt with by that occupation and relate to other statistics published by AIHW. The distinction between the client group of an occupation is not always clear. For example, the ASCO job description of residential care officer is one who 'provides care and supervision for *children or disabled persons* in group homes or government institutions'. An aged or disabled person carer 'provides care for *aged or disabled people* in their homes' (ABS 1997). These occupations have been allocated to the group that other AIHW data would indicate is the main client group, that is, residential care officer has been allocated to 'disability services' and aged and disabled person carer has not been grouped with another occupation.

There were 237,055 persons employed in the 29 community services occupations shown in this publication. Of those employed persons, 130,664 (56.8%) are in the general group of occupations called 'carers and aides'. These occupations are predominantly female and characterised by relatively low income and large numbers in part-time work.

Comparison of community services occupation data between the 1996 and 2001 censuses lend additional support to trends discussed in the chapter on de-institutionalisation in the AIHW publication *Australia's welfare 2001* (AIHW 2001).

This chapter provides a brief summary for each of the broad community services occupations, including growth between 1996 and 2001, hours worked, gross income according to the 2001 census, and earnings where available from the ABS Survey of Employee Earnings and Hours.

## Child and youth services workers

Pre-primary and special education are in the education industry in ANZSIC but perform functions classified as community service activities or are directed at community services special needs target groups.

Overall, the workforce increased by 8,418 (9.0%) workers to 101,691 workers. Structural change appeared to have occurred in the child, youth and family services workforce between 1996 and 2001. A move of day care services for children from either the child's or carer's home, by carers who may not have relevant qualifications, to childcare centres with qualified staff was evident. There was a decrease of 7,558 in family day care worker, nanny and childcare coordinator and an increase of 13,989 child care workers, for an overall increase of 10.5% in workers providing day care services for children. In pre-primary schooling, there was a 12.5% increase in pre-primary teachers and a 52.3% increase in pre-school aides so that the ratio was one aide to three teachers in 2001 – up from 1:4 in 1996 (Table A.21).

Child or youth residential carers decreased by 3,108 (86.5%) between 1996 and 2001. These workers provided care for children in correctional service institutions. This decline, along with an increase of 777 (14.4%) in the number of youth workers (who provide care in the community) indicates possible restructure in this industry.

In the 2001 census, child and youth workers had relatively low incomes, with 8.1% of the overall group (mainly the pre-primary teachers) receiving more than \$41,600 and half (50.1%) less than \$20,800 (Table A.23). The distribution is largely related to the hours worked, as

49.7% of the group worked part-time (Table A.17). Base pay for full-time adult child care workers was around \$511 per week in May 2002 – an increase of about 10% from May 1996.

## Family services workers

Welfare workers and family support workers in this group increased 44.3% and 38.2% respectively between 1996 and 2001. The exception was family counsellor (provides marriage or relationship counselling) that decreased 6.4% in the same period (Table A.21).

The workers in these occupations do not generally work long hours, with only 7.2% overall working 49 or more hours per week. A little more than one-third (35.5%) of welfare workers worked part-time, and over half the family counsellors and family support workers worked part-time – 52.4% and 57.4% respectively (Table A.17).

In May 2002, the average full-time adult base pay for social welfare professionals, which includes family counsellors, was around \$811 per week, and that for family support workers was around \$670 per week (Table A.24 and unpublished data from the ABS Survey of Employee Earnings and Hours, 2002).

## Disability services workers

Between censuses, the most notable change was the 7,519 (261.3%) increase in integration aides to 10,396; these aides assist children with developmental disabilities in mainstream schools. Residential care officers (who provide care and supervision for children or disabled people in group housing) increased by 178.3% to 2,825 persons and disabilities services officer increased by 26.4% to 6,232 persons between 1996 and 2001. Special education teachers had an overall increase of 741 (6.9%) (Table A.21).

The distribution of income for special education teachers and integration aides is related to hours worked. There were 59.8% of special needs teachers working full-time and 54.9% with incomes over \$41,600 per year. Some 85.4% of integration aides worked part-time and 64.3% received incomes of less than \$20,800 (Tables A.17 and A.23).

Most residential care and disabilities services officers had incomes below \$41,600 per year, with 83.3% in this category – with 32.8% working part-time. Some 16.5% received more than \$41,600 – and 9.1% of these officers worked long hours (49 hours per week or more). In May 2002, the average base pay for full-time adult welfare associate professionals, which includes these officers, was around \$670 per week (Table A.24).

## Aged or disabled care workers

Home and Community Care (HACC), Community Aged Care Packages (CACP) and, since January 2001, Veterans' Home Care, are all programs that provide care in the home of an aged or disabled person. Around 70% of HACC clients are aged 70 or over. The number of CACPs almost quadrupled in number between 1997 and 2001 to 24,430 packages (AIHW 2001a).

The occupation of aged and disabled carer performs the task of providing 'general household assistance, emotional support, care and companionship for aged and disabled in their homes'

(ABS 1997). A number of workers providing home care may be in other occupations but the majority of home care is provided by workers in this occupation.

Between 1996 and 2001, the number of aged and disabled carers increased by 44.1% to 51,792. At the 2001 census, 70.0% reported working part-time hours and 5.9% reported working long hours. Reflecting the relatively large proportion of part-time workers in this group, 40.1% reported incomes between \$20,800 and \$40,599 per year, 39.7% between \$10,400 and \$20,799, and 14.4% less than \$10,400 per year (Tables A.17, A.21 and A.23).

In May 2002, the full-time adult base pay for special care workers was around \$665 per week but the average pay of all these workers, including those working part-time, was around \$370 per week (Table A.24).

## **Other community services workers**

Welfare, social and community worker numbers increased by 38.5% between the 1996 and 2001 censuses. The 17,113 community workers are the largest occupation in the group and, together with the 9,302 social security assessors and the 9,110 social workers, comprise 86.7% of the group in 2001. In 2001, there were 1,532 rehabilitation counsellors and 1,099 drug and alcohol counsellors, an increase of 326 (27.0%) and 343 (45.4%) respectively since 1996. The 368 refuge workers are the smallest occupation in the group (Table A.21).

In the 2001 census, 43.6% of social workers and 33.2% of community workers reported incomes greater than \$41,600, and 9.5% and 15.6%, respectively, reported incomes under \$20,800. Large differences in incomes were evident in 2001 between rehabilitation counsellors and drug and alcohol counsellors. Of rehabilitation counsellors, 58.2% received more than \$41,600, compared with 24.8% of drug and alcohol counsellors. Most (62.2%) drug and alcohol counsellors had incomes in the range \$20,800–\$41,599 (Table A.23). This disparity is not explained by a difference in hours worked, as similar proportions of each occupation worked part-time and long hours (Table A.17).

In May 2002, the average full-time adult base pay for social welfare professionals, which includes social and community workers, and rehabilitation and drug and alcohol counsellors, was around \$810 per week – about 6% above the health and community services industry average (Table A.24).

# Geographic regions

This chapter discusses the provision of health and community services workers across the geographic areas based on location of workplace. There are some factors that must be taken into consideration when comparing the number of health and community services workers across those areas. These include the placement of health care facilities, some blending of the roles of health and community services workers in more remote communities, the demographic characteristics of the populations in different regions of Australia and their patterns of service usage.

Because of the need for cost-effective utilisation of expensive equipment and/or to achieve and maintain clinical competence in complex and costly procedures, it may be feasible to have only a limited number of health care establishments, such as hospitals, providing certain specialised health services. These establishments are invariably located in large population centres, which will increase the number of health workers in those places – but these workers may service patients or clients from a much wider area.

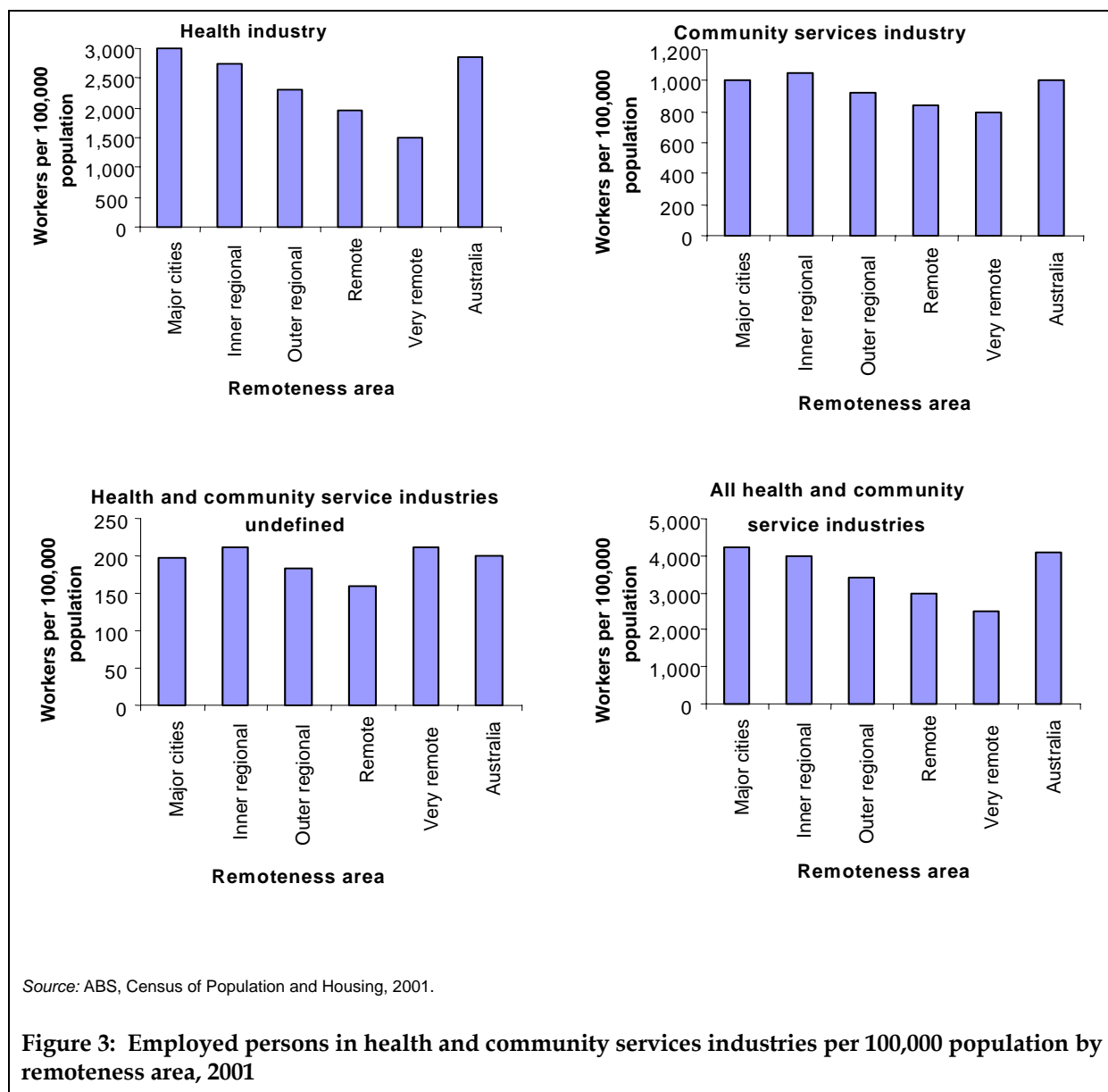
In less accessible areas, some occupations may partially take over some functions of other occupations. For example, certain registered nurses (nurse practitioners) are able to perform some of the functions of generalist practitioners, such as prescribing certain medications.

Patterns of use can vary between regions according to their different age, sex, disease profiles and other characteristics. For example, usage rates for communities with relatively large proportions of elderly people, very young children or women of child-bearing age would be expected to be higher than for, say, communities with high proportions of men and women in early adulthood, such as inner city areas (ABS 1999). The types of services would vary correspondingly – from aged care services and treatment of diseases that are prevalent in older age groups to family support services, obstetric care and paediatrics for young families.

Data in this publication are shown with two different regional classifications – ASGC remoteness areas and detailed statistical region structure (see Explanatory notes). Industry data, which includes employment for all support staff in addition to health and community services professionals, are shown by remoteness area. The data for the 105 identified health and community services occupations in this publication are shown by the more detailed statistical region classification.

## Industry by remoteness areas

In the health industries overall, nationally the Major cities had double the number of persons employed per 100,000 population than Very remote areas in Australia. There is considerable variation among the states and territories, however. It might be expected that the supply of health practitioners would decline with increasing remoteness, but only Western Australia and South Australia showed this pattern. However, Victoria does not have a Very remote area. In the Northern Territory the Remote area, which includes Alice Springs and its immediate hinterland, ranked third nationally behind the areas that include Adelaide and Hobart, and was well above the national average, while Outer regional Australia, which includes Darwin, was below the national average. The Very remote area in the Northern Territory had the lowest supply nationally of persons in health industries (Table A.27).



In the community services industries the national relative distribution of employed persons was much more even, with the greatest employment per 100,000 population in Inner regional areas – about one-third greater than in Very remote areas (Figure 3). Again there were large state variations, with Tasmania having about three times as many employed persons in Inner regional areas as in Remote areas, which had the lowest supply nationally of employed persons per 100,000 population (Table A.27).

When viewed by individual industry, the predominant pattern was for the number of employed persons per 100,000 population to decline with increasing remoteness. The decline was particularly marked for non-psychiatric hospitals (declining from 1,147 per 100,000 population in Major cities to 601 in Very remote areas), nursing homes (from 334 per 100,000 in Major cities to 71 in Very remote areas), general practice services (from 351 to 109 per 100,000), specialist medical services (from 147 to 15), dental services (from 169 to 35), pathology services (from 93 to 11), optometry and optical dispensing (from 53 to 1.7), physiotherapy services (from 48 to 7.2) and child care services (from 311 to 199).

**Table 11: Employed persons per 100,000 population: industry and remoteness, 2001**

Industry	Major cities of Australia	Inner regional Australia	Outer regional Australia	Remote Australia	Very remote Australia	Total
Health services, undefined	215.7	260.3	257.5	307.0	319.6	233.8
Hospitals and nursing homes, undefined	8.3	10.6	11.0	14.7	10.5	9.3
Hospitals (except psychiatric hospitals)	1,147.2	994.5	890.8	816.0	600.9	1,084.8
Psychiatric hospitals	13.0	13.9	5.6	4.0	0.0	12.2
Nursing homes	333.7	380.0	321.8	144.1	70.9	338.1
Medical & dental services, undefined	14.3	9.3	7.7	4.6	3.3	12.4
General practice medical services	350.5	280.4	227.5	197.5	109.1	320.0
Specialist medical services	146.7	104.8	59.1	26.4	15.0	126.3
Dental services	168.3	127.0	104.3	71.1	35.4	151.0
Other health services, undefined	15.7	15.4	11.2	12.3	6.6	15.1
Pathology services	93.0	64.3	46.7	19.3	10.5	80.6
Optometry and optical dispensing	52.6	43.8	30.2	14.1	1.7	47.7
Ambulance services	36.6	58.6	54.0	55.5	31.0	43.8
Community health centres	93.0	103.2	105.3	164.7	221.5	99.7
Physiotherapy services	48.3	37.3	27.2	21.8	7.2	43.3
Chiropractic services	25.9	30.5	21.3	10.4	1.7	26.1
Health services, nec	242.4	195.0	132.8	92.0	53.2	218.4
<i>Total health services</i>	<i>3,005.4</i>	<i>2,728.9</i>	<i>2,314.0</i>	<i>1,975.4</i>	<i>1,498.2</i>	<i>2,862.4</i>
Community services, undefined	76.7	72.1	65.2	84.9	216.6	76.6
Child care services	310.6	304.9	292.5	288.6	198.8	307.5
Community care services, undefined	22.7	20.2	20.3	18.7	33.8	22.2
Accommodation for the aged	86.7	110.7	98.8	49.4	21.0	92.2
Residential care services, nec	99.2	100.1	78.2	88.3	55.9	97.6
Non-residential care services, nec	412.4	441.5	366.1	307.9	270.3	413.5
<i>Total community services</i>	<i>1,008.3</i>	<i>1,049.6</i>	<i>921.0</i>	<i>837.8</i>	<i>796.4</i>	<i>1,009.5</i>
Health and community services, undefined	197.6	212.8	183.3	160.7	211.6	200.4
<b>Total</b>	<b>4,211.4</b>	<b>3,991.4</b>	<b>3,418.3</b>	<b>2,973.9</b>	<b>2,506.2</b>	<b>4,072.3</b>

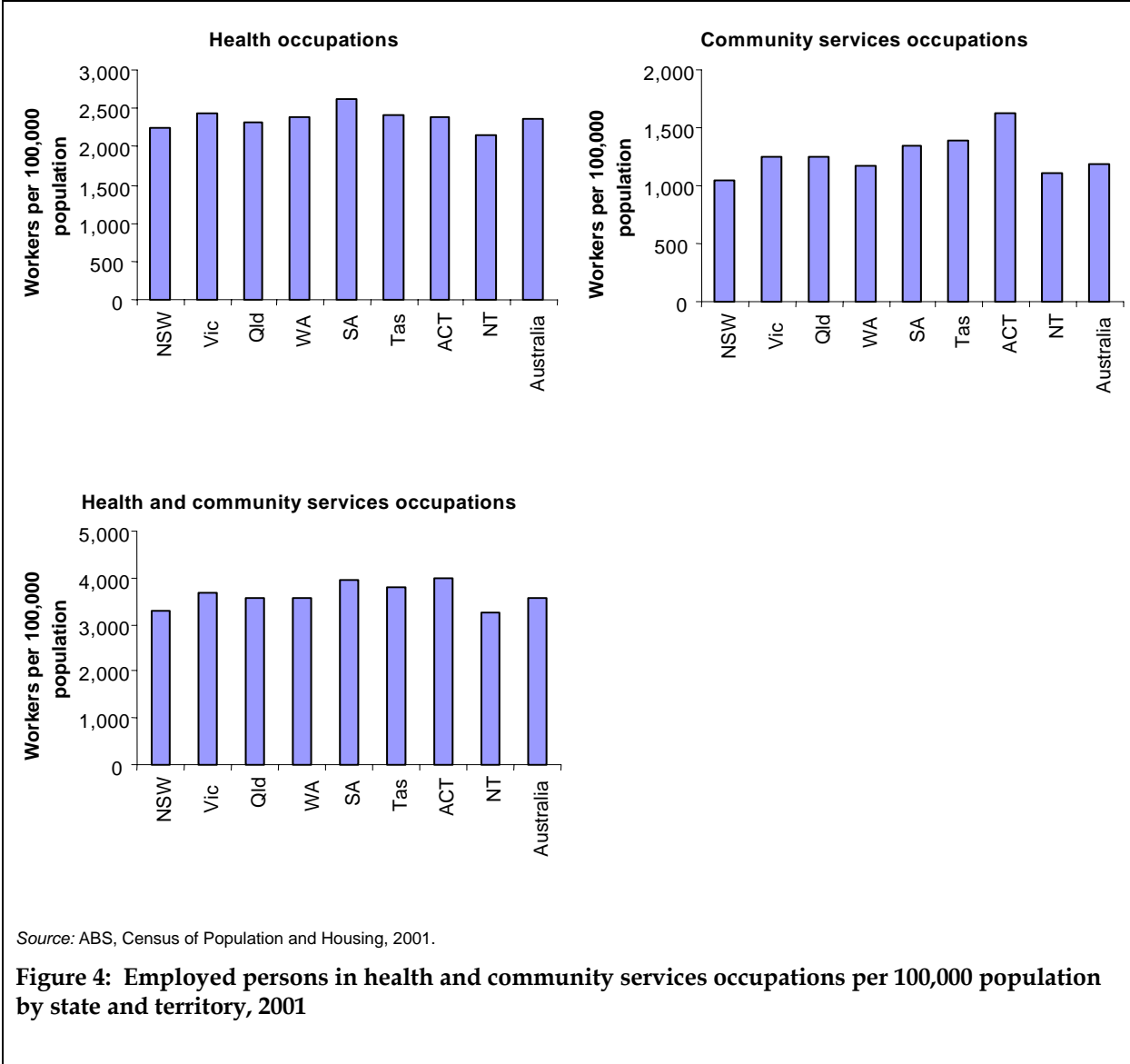
Source: ABS, Census of Population and Housing, 2001.

The pattern of employment decline with increasing remoteness was reversed for community health centres (increasing from 93 per 100,000 in Major cities to 222 per 100,000 in Very remote areas), and health services undefined (from 216 in Major cities to 320 per 100,000 in Very remote areas). For ambulance services, the pattern was different again: employment was higher in higher in the Inner and Outer regional areas and the Remote areas (all over 54 per 100,000) than in the Major cities or Very remote areas (36.6 and 31.0 per 100,000, respectively) (Table 11).

## Occupation by state/territory and region

The national supply of people employed in health occupations in 2001 was 2,354 health workers per 100,000 population. The Northern Territory, with 2,150 health workers per 100,000 population, was 8.7% below the national average, New South Wales with 2,249 per

100,000 was 4.4% below and Queensland with 2,320 was 1.4% below. The other states and territories were all above the national average (Figure 4).



Nationally, there were 1,228 employed persons in the community services occupations per 100,000 population in 2001. New South Wales (1,077 per 100,000) and Western Australia (1,201 per 100,000) were below the national average.

Data are available by statistical region of workplace for the various occupations. The five major capital cities have data available for regions within the city area but Hobart, Darwin and Canberra do not have smaller regions identified within the city.

The central city regions of the major cities had the highest apparent supply of health practitioners, which is likely to be due to the centralisation of major hospitals and specialist services in the inner city core, but these provide services to a much wider geographical area. The 66,700 people living in the very small city core of Brisbane had the highest apparent supply in Australia, with 22,290 practitioners per 100,000 population. There was a similar picture in the other major capital cities, with Central Metropolitan Perth (13,282 per 100,000 population), Inner Melbourne (9,454), Eastern Adelaide (6,551), Western Inner Brisbane

(5,185) and Inner Sydney (4,328). The same inner city regions also had the largest apparent supply of generalist medical practitioners, dentists and retail pharmacists, who supply the hospitals located in the inner city and the large daytime workforce (Table A.32).

Similarly, the supply of community services workers was relatively high in the inner city cores of the five major capital cities, but some areas outside the capital cities also ranked highly. The largest supply of community services workers was in the city core of Brisbane (3,696 per 100,000), and the next largest was in the Central Metropolitan area of Perth (2,657 per 100,000). This was closely followed by Central West Mackay-Fitzroy-Central West in Queensland (2,384 per 100,000), Inner Melbourne (2,188 per 100,000) and Nowra-Bomaderry in New South Wales (2,072 per 100,000).

Because of the propensity for the large hospitals with specialist and teaching facilities to be located in the inner city or older established areas close to the city centres, it is not always appropriate to compare supply in those areas with other areas, including the outer fringes of the cities. This is because the facilities service patients from other parts of the city and the rest of the state. It is, however, valid to compare supply between outer city areas and other areas outside capital cities.

Some of the rapidly growing regions on the outskirts of all five major capital cities (ABS 2000) had the lowest supply (in terms of numbers per 100,000 population) of health and community services professionals of any region within their respective states. The regions with lowest supply of health practitioners were, in ascending order, Beaudesert Shire Part A (Brisbane), Pine Rivers Shire (Brisbane), Gold Coast City Part A, Outer South Western Sydney, Logan City, Illawarra Statistical Division balance (Wingecarribee, part Shoalhaven), North Western Melbourne, Eastern Inner Brisbane, North Metropolitan Perth and Redland Shire (Brisbane).

As noted above, the demographic structure of a region can have an influence on the usage of particular services by the region's population. A region with small numbers of aged and large numbers of children will have different service usage from a region with large numbers of aged persons. The analysis below looks at the regions in each state and territory with the lowest supply of health practitioners and community services workers, with some reference to the population demographics in the region being discussed. For health, the key occupations of generalist medical practitioner, retail pharmacist, dentist, and ambulance officer and intensive care paramedic are used as indicators, and for community services, the child and youth services occupations and the aged or disabled care occupation are used.

Much of the information that follows is sourced from Tables A.32, A.33 and A.34.

## **New South Wales**

In 2001, 20.8% of the New South Wales population was less than 15 years of age and 13.1% was 65 or more years of age. The region of Outer South Western Sydney had the state's highest proportion (26.0%) of those less than 15 years and lowest proportion (6.8%) of those aged 65 or more. It was followed by North Western Sydney (24.6% and 8.1% respectively), and Fairfield-Liverpool (23.8% and 8.7% respectively). All regions outside Sydney and Newcastle had higher proportions of younger and older people than the state average.

The supply of health workers and community services workers overall were each lower in the outer areas of Sydney (2,103 per 100,000 and 941 per 100,000 population, respectively) than in the rest of the state outside Sydney (2,225 and 1,246, respectively) (Table 12). The supply of the key occupations of generalist medical practitioner, retail pharmacist and



dentist in outer city areas were, on the other hand, higher than in the rest of the state, but this masked areas of very low supply in some of the rapidly growing outer areas of Sydney.

For example, the regions of Outer South Western Sydney (Camden, Campbelltown, Wollondilly) and the adjacent rural area of the Illawarra region had the lowest supply of health professionals (1,106 and 1,136 respectively compared to 2,249 per 100,000 population for the state) of any region in New South Wales.

The supply of the key occupations of generalist medical practitioner, retail pharmacist and dentist in Outer Western Sydney (83, 43 and 19 per 100,000 population respectively) were all in the lowest decile nationally. This was in contrast to the relatively high supply of ambulance officers and intensive care paramedics (being in the fourth lowest decile).

**Table 12: Supply of selected health and community services workers per 100,000 population, New South Wales, 2001**

Occupation	Capital city		Rest of state <sup>(c)</sup>	Total
	Inner <sup>(a)</sup>	Outer <sup>(b)</sup>		
Generalist medical practitioner	364.7	162.5	122.8	156.8
Retail pharmacist	116.4	70.2	52.1	65.5
Dentist	118.2	43.2	27.0	40.5
Ambulance officer and paramedic	78.3	22.6	54.6	37.1
<b>Total health occupations</b>	<b>4,327.5</b>	<b>2,102.8</b>	<b>2,224.8</b>	<b>2,249.0</b>
Child and youth services	566.8	485.2	496.5	493.1
Aged or disabled care	106.3	121.7	303.3	188.9
<b>Total community services occupations</b>	<b>1,427.4</b>	<b>940.5</b>	<b>1,246.1</b>	<b>1,076.7</b>

(a) Comprises the statistical region of Inner Sydney.

(b) Comprises the statistical regions of Eastern suburbs, St George–Sutherland, Canterbury–Bankstown, Fairfield–Liverpool, Outer South Western Sydney, Inner Western Sydney, Central Western Sydney, North Western Sydney, Lower Northern Sydney, Central Northern Sydney, Northern Beaches and Gosford–Wyong.

(c) Comprises all other statistical regions in New South Wales

Source: ABS, Census of Population and Housing, 2001.

The state average supply of community services workers in New South Wales was 1,077 per 100,000 population. Supply overall, and for the key occupations of child and youth services and aged or disabled care, in outer areas of Sydney was much lower than in the rest of the state outside Sydney (Table 12).

The rural regions had above the state average in most categories of community service occupations. The relative numbers of persons employed in aged or disabled care in rural regions ranged up to double the state average (189 per 100,000 population) with only one region in Sydney (Northern Beaches) exceeding the state average. Canterbury–Bankstown, Fairfield–Liverpool, St George–Sutherland and North Western Sydney are the regions in the state with the lowest supply of community services workers in nearly all occupation groups. Fairfield–Liverpool (332 per 100,000 population) and Canterbury–Bankstown (348 per 100,000 population) had the lowest supply in the state of workers providing child and youth services compared to the state average of 493 per 100,000 population.

## Victoria

In Victoria, 20.3% of the population was less than 15 years of age and 13.1% was aged 65 or more years in 2001. The rural regions outside Melbourne had above the average proportion of the young and older population (similar to New South Wales). South Eastern Melbourne had the highest proportion of children (23.7%) and the lowest proportion of older people (9.3%) of any region in the state.

Victoria was comparatively well supplied with health practitioners (2,424 per 100,000) but, as in New South Wales, the overall supply of health workers and community services workers in outer Melbourne (1,866 per 100,000 and 874 per 100,000, respectively) were each lower than in the remainder of Victoria outside Melbourne (2,475 per 100,000 and 1,600 per 100,000, respectively) (Table 13).

For the key health occupations of generalist medical practitioner, retail pharmacist and dentist, overall supply in outer Melbourne was higher than in the rest of the state (but only slightly so for generalist medical practitioners). The supply of ambulance officers and paramedics, on the other hand, was lower in outer Melbourne than in the rest of Victoria (Table 13).

At a more local level, the region of North Western Melbourne, with 1,145 health practitioners per 100,000 population, was in the lowest decile nationally. South Eastern Melbourne (1,292 per 100,000 population), Outer Western Melbourne (1,394 per 100,000 population) and Outer Eastern Melbourne (1,565 per 100,000 population) were also relatively low.

**Table 13: Supply of selected health and community services workers per 100,000 population, Victoria, 2001**

Occupation	Capital city		Rest of state <sup>(c)</sup>	Total
	Inner <sup>(a)</sup>	Outer <sup>(b)</sup>		
Generalist medical practitioner	625.1	129.1	122.9	152.8
Retail pharmacist	133.5	63.3	53.1	64.1
Dentist	127.2	34.8	25.2	36.9
Ambulance officer and paramedic	31.8	27.2	51.6	34.2
<b>Total health occupations</b>	<b>9,453.9</b>	<b>1,866.4</b>	<b>2,475.1</b>	<b>2,424.4</b>
Child and youth services	868.1	386.9	497.1	499.9
Aged or disabled care	282.0	208.8	489.9	290.6
<b>Total community services occupations</b>	<b>2,269.2</b>	<b>874.0</b>	<b>1,600.5</b>	<b>1,298.1</b>

(a) Comprises the statistical regions of Inner Melbourne and Inner Eastern Melbourne.

(d) Comprises the statistical regions of North Western Melbourne, North Eastern Melbourne, Southern Melbourne, Outer Eastern Melbourne, South Eastern Melbourne and Mornington Peninsula.

(b) Comprises all other statistical regions in Victoria.

Source: ABS, Census of Population and Housing, 2001.

The regions with the lowest supply of generalist medical practitioners in Victoria compared to the state supply of 153 per 100,000 were North Western Melbourne (99), Outer Eastern Melbourne (100), South Eastern Melbourne (110) and Loddon-Mallee (also 110) and Goulburn-Ovens-Murray (108 per 100,000 population).

The state average of retail pharmacists was 64 per 100,000 population and the region with the lowest supply was Barwon-Western District with 49 per 100,000. South Eastern Melbourne

had the lowest supply within Melbourne (52 per 100,000), and the supply of pharmacists in all the rural regions of Victoria were equal to or lower than that.

North Western Melbourne had the lowest supply of dentists (22 per 100,000 population compared to the state figure of 37) with Goulburn–Ovens–Murray, Central Highlands–Wimmera and Gippsland only slightly better at 22, 23 and 23 per 100,000 population, respectively.

North Eastern, Southern and North Western Melbourne had a similar supply of ambulance officers, mostly intensive care paramedics, 12, 12 and 14 per 100,000 population respectively, as the state total of 34 per 100,000.

The key community services occupations of child and youth services, and particularly aged or disabled care, were in lower supply in outer Melbourne areas taken as a whole (387 and 209 per 100,000, respectively), than in the rest of the state (497 and 490 per 100,000, respectively) (Table 13).

The supply of community services occupations overall in rural regions was above the Victoria average of 1,298 per 100,000 population. Aged or disabled care worker supply in rural regions ranged from Loddon–Mallee at 289 per 100,000 population, just below the state average of 291 per 100,000 population, to Central Highlands–Wimmera with 387 per 100,000. The proportion of young people in all rural regions was above the state average, but the supply of child and youth service workers was below or around the state average of 500 per 100,000 population.

South Eastern Melbourne was the region with the lowest supply of community service workers (998 per 100,000 population). North Western Melbourne, Outer Western Melbourne and Mornington Peninsula closely followed it with 1,015, 1,019 and 1,031 per 100,000 population, respectively. Victoria's lowest supply of child and youth service workers of 419 per 100,000 population was in the Barwon–Western District. This closely followed by North Western Melbourne (427), which had an above-average proportion of young people. The lowest supply of aged and disabled carers (129 per 100,000 population) was in South Eastern Melbourne, which had the lowest proportion of older people (9.3%).

## Queensland

The Queensland population in 2001 included 21.6% of people aged less than 15 years and 11.7% of those aged 65 or more years. North West Queensland and Beaudesert Shire Part A were the regions with the highest proportion of young people, 26.6% and 26.4% respectively, and the lowest proportion of older people, 5.9% and 4.7% respectively. Most rural regions of Queensland have a proportion of young people greater than the state average, and of older people less than the state average. The region South and East BSD Balance (Logan City, Gold Coast City Part A, Beaudesert Shire Part A and Redland Shire) had a relatively large proportion of young people and a small proportion of older people.

There were 2,320 health practitioners and 1,275 community services workers per 100,000 population overall in Queensland. Once more, supply in the outer areas of Brisbane was lower than in the rest of the state outside Brisbane, markedly so for health practitioners (1,557 per 100,000 in outer Brisbane compared with 2,106 per 100,000 in the rest of the state), but also for community services workers (1,158 and 1,268 per 100,000, respectively).

For the key health occupations, only retail pharmacists were in greater supply in outer Brisbane areas overall than in the rest of the state. For the key community services occupations, there was a higher supply of child and youth services workers in the outer areas

of Brisbane, the only state where this was the case, but a much lower supply of aged or disabled care workers than in the rest of the state. This reflects the older age profile of the population outside Brisbane and the younger age profile of those living in the rapidly growing suburbs on the outskirts of Brisbane.

**Table 14: Supply of selected health and community services workers per 100,000 population, Queensland, 2001**

Occupation	Capital city		Rest of state <sup>(c)</sup>	Total
	Inner <sup>(a)</sup>	Outer <sup>(b)</sup>		
Generalist medical practitioner	342.0	111.4	123.9	142.5
Retail pharmacist	115.8	57.0	50.7	59.8
Dentist	82.9	31.2	32.4	37.3
Ambulance officer and paramedic	31.8	32.6	53.2	43.7
<b>Total health occupations</b>	<b>5,966.1</b>	<b>1,557.0</b>	<b>2,105.8</b>	<b>2,319.9</b>
Child and youth services	740.6	618.9	602.6	622.9
Aged or disabled care	284.4	199.0	305.1	265.6
<b>Total community services occupations</b>	<b>1,696.4</b>	<b>1,158.1</b>	<b>1,268.2</b>	<b>1,274.7</b>

(c) Comprises the statistical regions of Brisbane City Inner Ring (City Core, Northern Inner, Eastern Inner, Southern Inner and Western Inner).

(e) Comprises the statistical regions of Brisbane City Outer Ring (Northern Outer, Eastern Outer, Southern Outer and Western Outer).

(d) Comprises all other statistical regions in Queensland.

Source: ABS, Census of Population and Housing, 2001.

At a more local level, the region South and East Brisbane Statistical Division (BSD) Balance had less than half the national average supply of health practitioners and the lowest overall supply of any region in Australia. There were around 105 generalist medical practitioners per 100,000 population in the region compared to the state average of 143 per 100,000 and the national average of 153.

Beaudesert, Pine Rivers Shire and Logan City had between 26 and 45 pharmacists per 100,000 compared to the state average of 68 and the national average of 73 per 100,000 population. The regions of Fitzroy, Northern and Wide Bay–Burnett also had fewer than 45 pharmacists per 100,000 population.

Logan City was the Queensland region with the lowest supply of dentists at 22 compared to the state average of 37 per 100,000 population. The state average supply of ambulance officers and intensive care medics was 44 per 100,000 population. South and East Moreton (29 per 100,000 population) had the lowest supply in the state. All regions within Brisbane had around 30 ambulance workers per 100,000 population compared to the regions in the rest of the state, which had between 50 and 60 per 100,000 population.

Queensland had a higher overall supply of 1,275 community services workers per 100,000 population than the national average of 1,228 per 100,000 population. North and West Moreton (Caloundra, Ipswich, Gatton, Noosa, Maroochy) with 979 community service workers per 100,000 population was the region with the lowest overall supply. The state supply of child and youth services workers (623 per 100,000 population) was well above the national average and the third highest in Australia. The relative distribution among the regions of child and youth services workers and aged and disabled carers was generally aligned with the distribution of the target populations.

## Western Australia

Western Australia had a very similar population age profile to Queensland. In 2001, 22% of the Western Australia population was aged less than 15 years and 11% was aged 65 years or more. There are only two regions in WA outside Perth – Lower WA and the Remainder of the state. The Remainder of the state has a population of 231,900 scattered over a huge area with population centres separated by large distances – the treatment of this as one region will mask differences in supply between particular small regions. The Remainder of the state had the highest proportion of young people (26%) and the lowest proportion of older people (7.5%) and Central Metropolitan (Perth) had the lowest proportion of young people (16%) and the highest of older people (14%).

In Western Australia, the overall supply of health practitioners was 2,397 per 100,000 and the supply of community services workers was 1,201 per 100,000. As with the other states discussed above, overall supply of both health practitioners and community services workers in the outer suburbs of Perth (1,501 and 1,016 per 100,000, respectively) were lower than in the rest of the state outside Perth (2,049 and 1,314 per 100,000, respectively). For all of the key health occupations, overall supply in the outer regions of Perth was higher than in the rest of the state, but for the key community services occupations the reverse was the case. There were differences, however, between different outer-city areas.

**Table 15: Supply of selected health and community services workers per 100,000 population, Western Australia, 2001**

Occupation	Capital city		Rest of state <sup>(c)</sup>	Total
	Inner <sup>(a)</sup>	Outer <sup>(b)</sup>		
Generalist medical practitioner	741.5	104.2	100.6	143.7
Retail pharmacist	141.1	63.9	46.1	64.0
Dentist	161.7	34.3	28.9	40.9
Ambulance officer and paramedic	24.9	18.5	17.3	18.6
<b>Total health occupations</b>	<b>13,281.7</b>	<b>1,500.6</b>	<b>2,049.0</b>	<b>2,397.3</b>
Child and youth services	746.7	425.3	482.1	461.0
Aged or disabled care	560.9	226.2	364.8	284.8
<b>Total community services occupations</b>	<b>2,657.2</b>	<b>1,015.9</b>	<b>1,314.1</b>	<b>1,200.5</b>

(e) Comprises the statistical region of Central Metropolitan.

(f) Comprises the statistical regions of East Metropolitan, North Metropolitan, South West Metropolitan and South East Metropolitan.

(f) Comprises all other statistical regions in Western Australia.

Source: ABS, Census of Population and Housing, 2001.

North Metropolitan Perth had the lowest overall supply of health practitioners in Western Australia (1,235 practitioners per 100,000 population) followed by East Metropolitan (1,257 per 100,000). Except for the very high concentration of generalist medical practitioners in Central Metropolitan Perth (742 per 100,000) and South West Metropolitan (143 per 100,000), the distribution was relatively even in the range 85–98 per 100,000. Retail pharmacists were more concentrated in Perth, with Lower Western WA and the balance of Western Australia at 50 and 40 per 100,000 respectively – well below the state average of 64 per 100,000 population. Dentists were relatively evenly distributed among most Perth regions (except Central Metropolitan Perth, with the largest supply, at 162 per 100,000) and Lower Western WA, in the range 30–36 per 100,000, with the Balance of WA having only 23 per 100,000 population.

Western Australia had the lowest supply of ambulance officers and intensive care paramedics of any state and territory at 19 per 100,000 population – this was little more than half the 35 per 100,000 national average, and well behind the ACT and Tasmania (both 28 per 100,000).

Western Australia had an average of 1,201 community service workers per 100,000 population. Community services workers of all occupation groups were relatively evenly distributed among the regions of Western Australia. The exceptions were Central Metropolitan, which had more than twice the state average supply, and North Metropolitan and South West Metropolitan, which had appreciably lower supply than the other regions. The concentration of workers in the ‘other community services’ occupations in Central Metropolitan was the main contributor to the higher overall supply there, raising the state average.

## South Australia

South Australia has the relatively oldest population of any state or territory with 19.6% people aged less than 15 years and 14.7% people aged 65 years or more, compared to the national proportions of 20.5% and 12.6% respectively.

South Australia had the highest supply of health workers overall (2,614 per 100,000, or 11% more than the national average) of all the states and territories, and the fourth highest supply, behind the Australian Capital Territory, the Northern Territory and Tasmania, of community services workers (1,371 per 100,000). The South Australian population has the oldest age profile in Australia and this may mean there is an increased demand for some health services.

**Table 16: Supply of selected health and community services workers per 100,000 population, South Australia, 2001**

Occupation	Capital city <sup>(a)</sup>	Rest of state <sup>(b)</sup>	Total
Generalist medical practitioner	189.7	106.2	167.2
Retail pharmacist	64.5	45.9	59.5
Dentist	48.7	26.2	42.7
Ambulance officer and paramedic	28.4	46.7	33.3
<b>Total health occupations</b>	<b>2,870.9</b>	<b>1,916.1</b>	<b>2,613.5</b>
Child and youth services	503.7	486.8	499.2
Aged or disabled care	382.8	538.3	424.7
<b>Total community services occupations</b>	<b>1,353.2</b>	<b>1,419.2</b>	<b>1,371.0</b>

(a) Comprises the statistical regions of Northern Adelaide, Western Adelaide, Eastern Adelaide and Southern Adelaide.

(b) Comprises all other statistical regions in South Australia.

Source: ABS, Census of Population and Housing, 2001.

It was not possible to distinguish between areas in the inner and outer areas of Adelaide, as many of the boundaries incorporated sections of both. Overall supply of health practitioners was higher in the capital city than the rest of the state, while for community services workers supply was marginally lower in Adelaide than in the rest of the state.

Northern Adelaide was the region with the lowest supply of health practitioners in the state – 1,323 per 100,000 population compared to the state average of 2,614 per 100,000 population. This was largely due to the small number of nurses in the region as the supply of most other health practitioners exceeded the supply in the rural regions.

South Australia had an overall supply of 167 generalist medical practitioners per 100,000 population, with North and Western SA the region having the lowest at 92 per 100,000 population. South Australia had the second lowest supply of retail pharmacists at 60 per 100,000 population with Queensland (also 60). Retail pharmacists were concentrated in Eastern and Western Adelaide (95 and 72 per 100,000 respectively) with all other regions below the state average and the supply decreasing with remoteness to a low of 39 per 100,000 in North and Western SA.

There were 43 dentists per 100,000 population in South Australia – above the national average of 39 per 100,000 population. Dentists were concentrated in Eastern Adelaide with all other regions in the range 23–36 per 100,000.

The supply of ambulance officers and intensive care paramedics in Eastern Adelaide at 76 per 100,000 population was in the top decile nationally. The rural areas were relatively well served with ambulance personnel, being around or above the national average, but Northern Adelaide had one of the lowest supplies in Australia with 11 per 100,000 population.

South Australia had an average of 1,371 community services workers in 2001. The distribution of community services workers was relatively even throughout most regions of South Australia. The exception was Eastern Adelaide, which was more than 50% overall above the state average and ranged from 37% above the average in child and youth services to more than twice the state average supply in family services. The rural region of Southern and Eastern South Australia was 30% below the state average and was below in all community services groups.

## Tasmania

The regional populations in Tasmania were relatively homogenous without any region showing a much different age structure. The proportion of Tasmania's population aged 65 or more years (13.9%) was above the national average and second only to South Australia. Unlike South Australia, Tasmania (21.2%) also had above the national average of those aged less than 15 years.

**Table 17: Supply of selected health and community services workers per 100,000 population, Tasmania, 2001**

Occupation	Capital city	Rest of state	Total
Generalist medical practitioner	303.1	125.5	148.5
Retail pharmacist	135.6	57.0	66.4
Dentist	47.0	19.6	23.0
Ambulance officer and paramedic	58.1	30.6	28.4
<b>Total health occupations</b>	<b>4,901.7</b>	<b>2,213.9</b>	<b>2,401.1</b>
Child and youth services	483.0	465.1	473.9
Aged or disabled care	426.8	512.3	470.4
<b>Total community services occupations</b>	<b>1,147.3</b>	<b>1,404.2</b>	<b>1,425.3</b>

Source: ABS, Census of Population and Housing, 2001.

There were 2,401 health practitioners per 100,000 and 1,425 community services workers per 100,000 overall in Tasmania. The supply of health practitioners was higher in Hobart (4,902 per 100,000) than in the rest of the state (2,214), but the reverse was the case for community services workers (1,147 per 100,000 in Hobart, compared with 1,404 per 100,000 in the rest of Tasmania). Hobart also could not be split into its inner and outer regions for comparison.

Health practitioners were reasonably uniformly distributed across Tasmania compared with the other states and territories.

The Mersey-Lyell region was below the state average of health practitioners (1,847 per 100,000, compared with 2,401 per 100,000) and also across most health occupations except for ambulance officers, where it was just above the state average.

With 1,425 community service workers per 100,000 population, Tasmania was above the national average. Mersey-Lyell was below the state average (below the state average for child and youth services and well below for family services workers), but otherwise the distribution of community services workers was relatively uniform throughout the state.

## Australian Capital Territory

The Australian Capital Territory (ACT) population had close to the national average proportion of people aged less than 15 years, and with 8.5% of the population aged 65 or more years was well below the national average of older people (12.6%). The Australian Capital Territory population was the second youngest nationally in 2001.

**Table 18: Supply of selected health and community services workers per 100,000 population, Australian Capital Territory and Northern Territory, 2001**

Occupation	ACT	Northern Territory		
		Capital city	Rest of state	Total
Generalist medical practitioner	175.5	201.2	118.9	156.3
Retail pharmacist	60.6	56.2	16.6	34.6
Dentist	50.3	43.3	20.5	30.8
Ambulance officer	8.1	17.5	23.4	20.7
Intensive care ambulance paramedic	20.0	16.4	13.6	14.9
Ambulance officer and paramedic	28.1	33.9	37.0	35.6
<b>Total health occupations</b>	<b>2,377.8</b>	<b>2,627.6</b>	<b>1,751.5</b>	<b>2,149.7</b>
Child and youth services	891.9	717.2	597.8	661.4
Aged or disabled care	292.3	172.6	269.9	218.0
<b>Total community services occupations</b>	<b>1,694.2</b>	<b>1,467.2</b>	<b>1,728.6</b>	<b>1,589.3</b>

Source: ABS, Census of Population and Housing, 2001.

The Australian Capital Territory is treated as a single entity and should be compared with capital cities in the other states and territories. It does not have a sizeable rural population, but is surrounded by the South Eastern region of New South Wales, for which it is the centre for specialist medical services. In 2000-01 some 23.4% of public hospital patients and 20.3% of private hospital patients came from New South Wales (AIHW 2001). The supply of health practitioners in the Australian Capital Territory, at 2,378 per 100,000 population, was just above the national average of 2,354 per 100,000 population.



With 1,694 community services workers per 100,000 population, the Australian Capital Territory had the highest overall supply of any state or territory, but was lower than any other inner capital city region except Sydney. The ACT had a relatively large supply of 892 child and youth services workers per 100,000 population compared to the national average of 524 per 100,000. The ACT also had above the national average supply of aged and disabled carers.

## **Northern Territory**

The Northern Territory population had the youngest age profile in Australia, with 25.8% of the population aged less than 15 years and 3.9% aged 65 or more years. Indigenous people made up 28.8% of the Northern Territory population in June 2001 (ABS 2003a).

Overall supply of health practitioners was 2,150 per 100,000 in the Northern Territory, and there were 1,589 community services workers per 100,000. As with Adelaide and Hobart, Darwin could not be split into its inner and outer regions for comparison. Except for ambulance officers, supply of health practitioners and was higher in Darwin than the rest of the Northern Territory. The opposite was true for community services: except for child and youth services workers, supply of community services workers was lower in Darwin than the rest of the Northern Territory.

The supply of most health practitioners in the Northern Territory was below the national average but the territory was relatively well supplied with generalist medical practitioners. With 172 generalist medical practitioners per 100,000, Darwin was well above the national average (153), and the Balance NT region (137 per 100,000) was higher than most ex-metropolitan regions in the other states.

The supply of dentists in Darwin (37 per 100,000) was just under the national average (39), and well above the supply in the Balance NT region (21).

Retail pharmacists were in relatively short supply in the Northern Territory (35 per 100,000 compared with 63 per 100,000 nationally), and the Balance NT at 16 per 100,000 population was about one-quarter the national average and well below the next lowest region which had 26 per 100,000 population.

The supply of ambulance officers and intensive care paramedics in Darwin was lower than the national average (35), and evenly split between ambulance officers and paramedics at 15 and 14 per 100,000 population respectively. The Balance NT was appreciably higher (41 per 100,000).

The Northern Territory was second to the Australian Capital Territory for overall supply of community services workers and, except for aged and disabled carers, was above the national average in all of the groupings shown in this publication. The Northern Territory had above the national average supply of child and youth services workers and below the national average for aged and disabled carers, as could be expected given the relative proportions of the client groups in the territory's population. Relative to population, Darwin had fewer community services workers, with the exception of child and youth services, than the Balance of the Northern Territory.

# Health and community services, occupations and industries tables

Most of the following tables are compiled from census data. For many census questions, there is a relatively small proportion of respondents who either do not supply an answer, or whose response is not clear enough to place in a category. These responses are called 'not stated' and 'not further defined', respectively. When not stated responses are removed from a table for analytical purposes, however, it does make a numerical difference to the totals shown. Readers should refer to the footnotes when totals are not consistent.

The following classifications are used for analysis in this publication:

- The Australian and New Zealand Standard Industry Classification (ANZSIC), at varying degrees of detail, is used for industry breakdowns. The broad health industries included in this report are hospitals and nursing homes, medical and dental services and other health services, and the broad community services industries are child care services and community care services. The broad industry grouping of 'other health services' includes pathology services, optometry and optical dispensing, ambulance services, community health centres, physiotherapy services, chiropractic services and health services not elsewhere classified (n.e.c).
- The Australian Standard Classification for Occupations (ASCO), 2<sup>nd</sup> edition is used for 2001 occupation data. The highest categories (Major and Sub-major Groups, as presented in Table A.4), incorporate occupations in nine skill levels, and range from managers and administrators to labourers and related workers. Individual health and community services occupations sit within those categories in the Minor (as in Table A.26) and Unit Groups. For example, medical administrators are in Major Group 1 (managers and administrators), generalist medical practitioners are in Major Group 2 (professionals), dental therapists are in major Group 3 (associate professionals) and pre-school aides are in the Major Group 6 (intermediate clerical, sales and service workers). For this report, the individual occupations are re-grouped under different headings to facilitate analysis (as presented in Table A.7, for example). For the health occupations, these groups include medical workers, medical imaging workers, dental workers, nursing workers, pharmacist workers, allied health workers, complementary therapies workers and miscellaneous health workers. Community services occupations are grouped into child and youth services, family services workers, disability workers, aged and disabled care workers and other community services workers. Table A.6 presents only those health occupations that are consistent across the 1991, 1996 and 2001 censuses, and for convenience are re-grouped as diagnosis and treatment practitioners, nurses and health-related occupations.
- Geographic area breakdowns include state/territory and region. The Australian Standard Geographic Classification (ASGC) is used for regional breakdowns, based on the postcode of place of employment. ASGC remoteness areas and statistical regions are the two main categories used in this report.
- The ABS Classification of Qualifications relates to highest educational qualification.

The Explanatory notes provide more information about the above classification systems.

**Table A.1: Total health expenditure, constant prices<sup>(a)</sup>, Australia, by area of expenditure, 1995–96 and 1999–00 (\$ million)**

Area of expenditure	1995–96	1999–00	Difference	Per cent change
Total hospitals	16,145	19,085	2,941	18.2
Public (non-psychiatric) hospitals <sup>(b)</sup>	12,187	14,460	2,273	18.6
Public psychiatric hospitals	495	421	-74	-15.0
Private hospitals	3,462	4,204	742	21.4
High-level residential aged care	3,239	4,069	830	25.6
Ambulance	563	1,147	584	103.9
Other institutional, nec	154	—	-154	—
<i>Total institutional</i>	<i>20,099</i>	<i>24,301</i>	<i>4,202</i>	<i>20.9</i>
Medical services	8,616	9,637	1,021	11.9
Other professional services	1,510	2,158	648	42.9
Total pharmaceuticals	5,099	6,448	1,348	26.4
Benefit-paid pharmaceuticals	3,281	4,175	894	27.2
All other pharmaceuticals	1,818	2,273	455	25.0
Aids and appliances	1,144	1,507	364	31.8
Community and public health <sup>(c)</sup>	2,204	2,557	353	16.0
Dental services	2,730	2,788	58	2.1
Administration	1,438	1,714	276	19.2
Research	700	944	244	34.9
<i>Total non-institutional</i>	<i>23,441</i>	<i>27,753</i>	<i>4,312</i>	<i>18.4</i>
<b>Total recurrent expenditure</b>	<b>43,540</b>	<b>52,054</b>	<b>8,514</b>	<b>19.6</b>
Capital outlays	1,795	2,643	848	47.2
Capital consumption	570	934	364	63.9
<i>Total capital</i>	<i>2,365</i>	<i>3,576</i>	<i>1,212</i>	<i>51.2</i>
<b>Total health expenditure</b>	<b>45,905</b>	<b>55,630</b>	<b>9,725</b>	<b>21.2</b>

(a) Constant price health expenditure is expressed in chain volume measures, referenced to the year 1999–00.

(b) For 1995–96, includes expenditure on repatriation hospitals.

(c) For 1995–96, includes expenditure that was previously classified as Other non-institutional nec.

Source: AIHW health expenditure database.

**Table A.2: Health expenditure as proportion of GDP: areas of expenditure, Australia, 1995–96 to 1999–00**

Area of expenditure	1995–96	1996–97	1997–98	1998–99	1999–00	Per cent change 1996–97 to 1999–00
Total hospitals <sup>(a)</sup>	2.94	2.99	3.03	3.07	3.03	1.38
Public non-psychiatric hospitals	2.21	2.25	2.31	2.33	2.30	2.03
Public psychiatric hospitals	0.10	0.08	0.07	0.07	0.07	-13.07
Private hospitals	0.63	0.66	0.65	0.67	0.67	1.33
High-level residential aged care	0.59	0.60	0.62	0.63	0.65	7.74
Ambulance	0.10	0.10	0.12	0.12	0.18	89.85
Other nec	0.03	—	—	—	—	—
<i>Total institutional</i>	<i>3.66</i>	<i>3.69</i>	<i>3.76</i>	<i>3.81</i>	<i>3.86</i>	<i>4.72</i>
Medical services	1.57	1.55	1.52	1.53	1.53	-1.00
Other professional services	0.27	0.30	0.30	0.32	0.34	13.05
Total pharmaceuticals	0.93	0.97	0.99	1.01	1.03	5.82
Benefit-paid pharmaceuticals	0.60	0.62	0.60	0.62	0.66	7.59
All other pharmaceuticals	0.33	0.35	0.39	0.39	0.36	2.71
Aids and appliances	0.22	0.22	0.22	0.22	0.24	9.72
Other non-institutional services	1.13	1.17	1.17	1.12	1.12	-3.99
Community and public health	0.40	0.45	0.45	0.48	0.41	-9.16
Dental services	0.47	0.48	0.46	0.43	0.44	-7.96
Administration	0.26	0.24	0.26	0.22	0.27	13.61
Research	0.13	0.13	0.12	0.12	0.15	16.31
<i>Total non-institutional</i>	<i>4.24</i>	<i>4.34</i>	<i>4.31</i>	<i>4.33</i>	<i>4.41</i>	<i>1.76</i>
<b>Total recurrent expenditure</b>	<b>7.89</b>	<b>8.02</b>	<b>8.08</b>	<b>8.14</b>	<b>8.27</b>	<b>3.12</b>
<i>Total capital</i>	<i>0.48</i>	<i>0.51</i>	<i>0.54</i>	<i>0.60</i>	<i>0.57</i>	<i>12.25</i>
Capital expenditure	0.36	0.41	0.44	0.45	0.42	3.41
Capital consumption	0.11	0.10	0.10	0.14	0.15	48.09
<b>Total health expenditure</b>	<b>8.37</b>	<b>8.53</b>	<b>8.62</b>	<b>8.74</b>	<b>8.84</b>	<b>3.66</b>

(a) Includes repatriation hospitals.

Source: AIHW, Health Expenditure Australia 2001b; ABS, Australian system of national accounts 2001–02, Cat. no. 5204.0.

**Table A.3: Hospital expenditure as proportion of GDP, Australia, 1995–96 to 2000–01**

Expenditure category	1995–96	1996–97	1997–98	1998–99	1999–00	2000–01	Per cent change
							1995–96 to 1999–00
Wages and salaries including on-costs <sup>(a)</sup>	2.08	2.03	2.04	2.02	1.98	2.03	-4.73
Drugs, medical and surgical supplies	0.33	0.33	0.36	0.37	0.40	0.42	18.62
Food supplies	0.04	0.05	0.04	0.04	0.04	0.04	-11.40
Other domestic services	0.08	0.08	0.07	0.08	0.08	0.08	-1.91
Administrative expenses	0.17	0.16	0.17	0.18	0.19	0.19	11.66
Repairs and maintenance	0.08	0.07	0.07	0.07	0.07	0.07	-17.07
Other <sup>(b) (c)</sup>	0.15	0.18	0.21	0.23	0.15	0.16	5.16
<b>Total</b>	<b>2.94</b>	<b>2.90</b>	<b>2.97</b>	<b>3.00</b>	<b>2.91</b>	<b>2.99</b>	-0.98
GDP at current prices (\$m)	502,828	529,886	561,229	591,917	628,621	669,307	25.02

(a) Includes payments to visiting medical officers and superannuation for public hospitals.

(b) Domestic services for day hospitals, repairs and maintenance, interest, depreciation, patient transport, contract services and other.

(c) Public hospital depreciation is reported for 1997–98 and 1998–99 only.

*Note:* Differs from Table A.2 as it includes private acute and psychiatric hospitals and free-standing day hospitals; and excludes expenditure on community and public health, and dental services delivered from hospitals.

*Sources:* AIHW, *Australian hospital statistics*, various years; ABS, *Private Hospitals*, Cat no. 4390.0; ABS, *Australian System of National Accounts 2001–02*, Cat. no. 5204.0.

Table A.4: Persons employed in health industries: occupation, 2001

Occupations	Hospitals (including psych- iatric)	Nursing homes	General practice medical services	Specialist medical services	Dental services	Pathology services	Optometry & optical dispens- ing	Ambul- ance services	Comm- unity health centres	Physio- therapy services	Chiro- practic services	Other health industry, nfd, nec	Total
<b>Managers and administrators</b>													
Managers & administrators nfd	234	66	105	42	41	17	32	11	65	16	9	284	922
General managers	1,436	634	195	110	61	65	56	58	182	15	5	627	3,444
Specialist managers	3,802	1,060	609	467	142	429	154	272	592	43	23	2,488	10,081
Farmers & farm managers	33	12	28	4	8	3	3	—	4	3	3	36	137
<b>Professionals</b>													
Professionals nfd	502	32	77	59	11	18	4	11	115	6	5	306	1,146
Science, building, engineering	3,858	22	292	536	11	3,343	13	9	112	34	3	903	9,136
Business & information	3,154	278	425	251	155	319	106	186	477	23	4	2,195	7,573
Health	115,899	19,554	29,086	11,292	7,908	1,248	2,820	45	8,180	5,187	2,272	37,874	241,365
Education	305	27	72	39	23	15	4	29	105	6	6	373	1,004
Social, arts & miscellaneous	4,716	1,327	572	1,258	89	28	14	91	2,416	67	15	6,811	17,404
<b>Associate professionals</b>													
Associate professionals nfd	39	6	9	4	4	12	—	8	5	—	3	41	131
Science, engineering & related	3,622	26	381	1,008	17	5,937	30	17	149	—	6	1,413	12,606
Business & administration	3,033	490	4,594	1,434	1,846	229	255	131	649	417	286	3,325	16,689
Supervisor (sales & service)	2,542	792	99	61	28	37	274	38	139	8	8	707	4,733
Health & welfare	9,598	3,179	468	289	2,361	44	7	6,300	1,117	116	148	7,203	30,830
Other associate professionals	265	19	34	9	3	36	5	171	94	4	—	256	896
<b>Tradespersons &amp; related workers</b>													
Tradespersons & related nfd	84	38	3	3	3	3	4	—	11	—	—	32	181
Mechanical & fabrication engineer	494	19	32	14	8	10	4	10	15	3	—	116	725
Automotive	9	—	5	3	—	—	—	90	—	—	—	42	149
Electrical & electronics	559	24	31	12	8	20	3	15	27	—	—	163	862
Construction	642	83	16	15	16	6	—	8	38	3	—	158	985
Food	1,360	1,724	26	6	3	—	—	—	65	3	—	224	3,411
Skilled agriculture & horticulture	429	314	66	23	7	3	3	3	38	6	3	159	1,054
Other tradespersons	170	69	10	22	8	7	2,531	—	7	—	—	98	2,922

(continued)

Table A.4: (continued): Persons employed in health industries: occupation, 2001

Occupations	Hospitals (including psych- iatric)	Nursing homes	General practice medical services	Specialist medical services	Dental services	Pathology services	Optometry & optical dispens- ing	Ambul- ance services	Comm- unity health centres	Physio- therapy services	Chiro- practic services	Other health industry, nfd, nec	Total
<b>Advanced clerical &amp; service workers</b>													
Clerical & service, nfd	9	—	—	3	—	—	—	—	3	—	—	6	21
Secretaries & personal assistants	2,600	299	1,322	839	339	121	156	90	269	259	123	1,831	8,248
Other clerical & service	189	77	437	137	261	19	112	227	71	59	53	414	2,056
<b>Intermediate clerical, sales &amp; service workers</b>													
Clerical, sales & service, nfd	44	19	21	8	168	4	5	—	5	18	18	36	346
Clerical workers	19,100	1,514	20,669	5,578	2,894	2,062	2,039	483	1,823	1,672	1,091	12,080	71,005
Sales & related workers	80	4	11	14	7	17	49	6	3	—	—	101	292
Service workers	13,735	24,257	885	388	12,513	26	17	9	1,652	347	939	8,358	63,125
<b>Intermediate production &amp; transport workers</b>													
Production & transport, nfd	4	—	—	3	—	—	—	—	—	—	—	7	14
Plant operators	96	6	3	—	3	3	—	—	3	—	—	32	146
Machine operators	52	10	13	18	—	4	10	3	3	—	—	92	205
Road & rail transport drivers	628	88	74	154	43	1,289	—	36	75	3	—	443	2,833
Other production & transport	787	26	31	16	16	73	37	20	40	—	—	192	1,238
<b>Elementary clerical, sales &amp; service workers</b>													
Cleric, sales & service workers nfd	24	3	3	—	—	3	3	—	3	—	—	16	55
Clerks	1,276	44	275	103	45	82	26	47	85	19	—	408	2,410
Sales workers	815	67	73	26	28	12	401	12	42	3	5	358	1,842
Service workers	3,760	1,469	154	46	44	24	4	23	147	15	—	555	6,241
<b>Labourers &amp; related workers</b>													
Labourers & related workers, nfd	313	171	9	3	5	3	—	3	21	—	—	52	580
Cleaners	6,807	3,238	821	147	200	35	38	18	280	53	46	1,159	12,842
Factory labourers	44	30	7	10	6	9	11	4	11	—	3	73	208
Other labourers & related workers	7,574	4,527	142	65	35	19	12	8	189	6	4	704	13,285
Inadequately described	599	167	116	69	30	54	21	16	87	5	5	481	1,650
Not stated	215	73	44	24	30	19	18	7	31	9	—	283	753
<b>Total</b>	<b>215,536</b>	<b>65,884</b>	<b>62,345</b>	<b>24,612</b>	<b>29,426</b>	<b>15,707</b>	<b>9,281</b>	<b>8,515</b>	<b>19,445</b>	<b>8,428</b>	<b>5,086</b>	<b>93,515</b>	<b>557,781</b>

Source: ABS, *Census of Population and Housing, 2001*.

Table A.5: Persons employed in community services industries: occupation, 2001

Occupation	Community services, nfd	Childcare services	Community care services, nfd	Accommodation for the aged	Residential care services, nec	Non-residential care services, nec	Total community services	Health and community services, nfd	Total health and community services <sup>(a)</sup>
<b>Managers and administrators</b>									
Managers, administrators, nfd	87	82	9	29	72	292	571	158	1,651
General managers	234	108	72	399	199	1,100	2,112	528	6,084
Specialist managers	535	4,547	68	256	397	2,134	7,937	767	18,785
Farmers & farm managers	5	8	—	—	3	41	57	8	202
<b>Professionals</b>									
Professionals, nfd	56	20	19	14	31	222	362	93	1,601
Science, building & engineering	71	13	9	3	9	109	214	150	9,500
Business & information	673	208	106	175	273	2,126	3,561	816	11,950
Health professionals	1,048	276	397	2,084	993	3,935	8,733	8,112	258,210
Education professionals	319	1,806	41	21	138	763	3,088	181	4,273
Social, arts & miscellaneous	2,720	1,175	582	748	2,512	14,887	22,624	2,501	42,529
<b>Associate professionals</b>									
Associate professionals, nfd	12	3	5	3	3	30	56	9	196
Science, engineering, related	54	9	3	6	10	60	142	195	12,943
Business & administration	851	602	111	307	436	2,924	5,231	1,087	23,007
Supervisor (sales & service)	245	237	71	595	380	962	2,490	553	7,776
Health & welfare associates	926	658	406	405	4,019	5,591	12,005	1,643	44,478
Other associate professionals	140	30	12	8	22	119	331	128	1,355
<b>Tradespersons &amp; related workers</b>									
Tradespersons & related, nfd	6	3	—	30	5	23	67	35	283
Mechanical & fabrication	17	6	—	5	12	47	87	40	852
Automotive tradespersons	14	3	—	—	5	22	44	15	208
Electrical & electronics	25	9	3	11	7	43	98	59	1,019
Construction tradespersons	55	12	6	30	23	73	199	101	1,285
Food tradespersons	67	1,249	66	702	181	391	2,656	575	6,642
Skilled agricultural	117	56	20	294	67	270	824	221	2,099
Other tradespersons	40	13	6	19	11	78	167	67	3,156

(continued)



Table A.5: (continued): Persons employed in community services industries: occupation, 2001

Occupation	Community services, nfd	Childcare services	Community care services, nfd	Accommodation for the aged	Residential care services, nec	Non-residential care services, nec	Total community services	Health and community services, nfd	Total health and community services <sup>(a)</sup>
<b>Advanced clerical &amp; service workers</b>									
Clerical & service, nfd	3	3	—	—	3	11	20	3	44
Secretaries & pa's	321	132	47	202	112	1,110	1,924	606	10,778
Other clerical & service	146	356	18	61	103	437	1,121	167	3,344
<b>Intermediate clerical, sales &amp; service workers</b>									
Clerical, sales & service nfd	10	45	—	5	5	50	115	25	486
Clerical workers	1,767	1,196	217	788	706	5,514	10,188	3,385	84,578
Sales & related workers	12	11	—	9	3	115	150	42	484
Service workers	2,343	50,316	1,655	7,504	7,037	27,086	95,941	11,300	170,272
<b>Intermediate production &amp; transport workers</b>									
Production & transport, nfd	—	—	—	—	—	10	10	3	27
Plant operators	32	—	3	6	3	58	102	39	287
Machine operators	14	13	3	3	4	103	140	25	370
Road & rail transport drivers	191	108	19	44	80	708	1,150	262	4,245
Other production, transport	33	10	3	14	19	191	270	87	1,595
<b>Elementary clerical, sales &amp; service workers</b>									
Clerical, sales, service, nfd	6	4	—	—	3	18	31	3	89
Clerks	158	29	11	21	36	339	594	139	3,143
Sales workers	140	102	14	40	76	1,564	1,936	154	3,932
Service workers	246	109	47	370	252	463	1,487	586	8,314
<b>Labourers &amp; related workers</b>									
Labourers & related, nfd	82	4	—	42	17	156	301	105	986
Cleaners	389	473	93	984	341	2,210	4,490	1,559	18,891
Factory labourers	38	3	14	15	60	2,521	2,651	68	2,927
Other labourers & related	388	186	108	1,585	274	1,036	3,577	1,591	18,453
Inadequately described	261	71	48	96	86	534	1,096	502	3,248
Not stated	95	81	12	25	28	193	434	437	1,624
<b>Total</b>	<b>14,992</b>	<b>64,385</b>	<b>4,324</b>	<b>17,958</b>	<b>19,056</b>	<b>80,669</b>	<b>201,384</b>	<b>39,130</b>	<b>798,295</b>

(a) Includes the figures in the 'Totals' column from Table A.4.

Source: ABS, *Census of Population and Housing, 2001*.

**Table A.6: Persons employed in selected health occupations: 1991, 1996, 2001**

Occupation	1991 <sup>(a)</sup>	1996	2001	Per cent change 1991–96	Per cent change 1996–01
<b>Health diagnosis and treatment practitioners</b>					
Medical practitioner					
Specialist practitioner	13,350	14,950	15,878	12.0	6.2
Generalist medical practitioner	25,450	29,056	32,201	14.2	10.8
<i>Total medical practitioners</i>	<i>38,800</i>	<i>44,006</i>	<i>48,079</i>	<i>13.4</i>	<i>9.3</i>
Dental practitioner	6,720	7,601	8,193	13.1	7.8
Pharmacist	10,880	12,310	13,902	13.1	12.9
Physiotherapist	7,120	8,896	10,242	24.9	15.1
Medical imaging professional	4,760	6,748	8,111	41.8	20.2
Occupational therapist	3,660	4,363	5,331	19.2	22.2
Speech pathologist	1,750	2,337	3,011	33.5	28.8
Optometrist	1,820	2,255	2,695	23.9	19.5
Chiropractor & osteopath	1,540	1,988	2,475	29.1	24.5
Podiatrist	1,140	1,462	1,767	28.2	20.9
Other health professional	5,750	7,982	9,844	38.9	23.3
<i>Total</i>	<i>83,940</i>	<i>99,951</i>	<i>161,729</i>	<i>19.1</i>	<i>61.8</i>
<b>Nurses</b>					
Registered	139,380	155,408	171,615	11.5	10.4
Enrolled	39,670	24,559	19,510	-38.1	-20.6
<i>Total nurses</i>	<i>179,050</i>	<i>179,967</i>	<i>191,125</i>	<i>0.5</i>	<i>6.2</i>
<b>Health-related occupations</b>					
Medical scientist	7,430	9,514	11,104	28.0	16.7
Ambulance officer & paramedic	5,546	5,966	6,694	7.6	12.2
Dental assistant	9,590	11,262	13,085	17.4	16.2
<i>Total health-related occupations</i>	<i>22,566</i>	<i>26,742</i>	<i>30,883</i>	<i>18.5</i>	<i>15.5</i>
<b>Total</b>	<b>285,556</b>	<b>306,660</b>	<b>431,816</b>	<b>7.4</b>	<b>40.8</b>

*Note:* This table includes only those occupations that are common across all three censuses. Totals include all occupations, including those not shown.

*Sources:*

(a) ABS, 1991 Characteristics of Persons Employed in Health Occupations, Australia Census of Population and Housing, Cat. no.4346.0.

(b) ABS, Census of Population And Housing, 2001.

**Table A.7: Persons employed in health occupations: industry, 2001**

Industry	Medical					Pharm- acist workers	Allied health workers	Comple- mentary therapy workers	Other health workers	Total health
	Medical workers	imaging workers	Dental workers	Nursing workers	Dental workers					
Health services, nfd	2,482	354	161	18,915	111	1,546	266	1,506	25,341	
Hospitals & nursing homes, nfd	63	8	—	1,075	3	41	—	42	1,232	
Hospitals (excl. psychiatric)	13,542	2,377	242	112,554	1,390	6,719	10	10,805	147,639	
Psychiatric hospitals	167	4	6	1,224	9	197	—	39	1,646	
Nursing homes	72	3	7	41,047	12	1,741	25	125	43,032	
Medical & dental services, nfd	362	15	37	278	—	21	12	38	763	
GP medical services	22,599	227	79	6,521	75	606	163	820	31,090	
Specialist medical services	6,106	1,470	74	3,420	4	1,274	86	1,496	13,930	
Dental services	66	35	22,240	327	—	57	3	29	22,757	
Other health services, nfd	35	19	—	2,066	—	90	17	57	2,284	
Pathology services	630	24	7	579	6	76	3	8,868	10,193	
Optometry & optical dispensing	38	3	3	36	6	2,746	3	28	2,863	
Ambulance services	16	—	—	41	—	—	—	6,323	6,380	
Community health centres	662	113	66	7,894	35	1,151	37	576	10,534	
Physiotherapy services	40	—	3	53	—	5,401	21	147	5,665	
Chiropractic services	18	3	—	29	—	893	2,221	145	3,309	
Health services, nec	1,051	3,193	23	5,039	23	8,660	4,360	5,081	27,430	
<i>Total health services</i>	<i>47,949</i>	<i>7,848</i>	<i>22,948</i>	<i>201,098</i>	<i>1,674</i>	<i>31,219</i>	<i>7,227</i>	<i>36,125</i>	<i>356,088</i>	
Community services, nfd	145	12	20	1,216	15	223	9	129	1,769	
Child care services	20	—	—	715	—	52	3	29	819	
Community care services, nfd	17	3	—	701	—	104	6	24	855	
Accommodation for the aged	20	—	3	5,763	3	409	5	33	6,236	
Residential care services, nfd	43	—	—	1,699	—	245	—	37	2,024	
Non-residential care services, nec	258	7	9	7,198	43	1,736	44	280	9,575	
<i>Total community services</i>	<i>503</i>	<i>22</i>	<i>32</i>	<i>17,292</i>	<i>61</i>	<i>2,769</i>	<i>67</i>	<i>532</i>	<i>21,278</i>	
Health & community services, nfd	570	64	41	11,684	23	980	122	458	13,942	
<i>Total health &amp; community services</i>	<i>49,022</i>	<i>7,934</i>	<i>23,021</i>	<i>230,074</i>	<i>1,758</i>	<i>34,968</i>	<i>7,416</i>	<i>37,115</i>	<i>391,308</i>	
Government administration	627	30	37	2,424	85	839	9	4,759	8,810	
Defence	223	16	179	650	38	82	—	145	1,333	
Education	310	12	64	1,557	50	1,300	57	2,085	5,435	
Other industries (inc. not stated)	1,677	149	2,583	9,700	11,980	2,265	1,051	14,501	43,906	
<b>Total</b>	<b>51,859</b>	<b>8,141</b>	<b>25,884</b>	<b>244,405</b>	<b>13,911</b>	<b>39,454</b>	<b>8,533</b>	<b>58,605</b>	<b>450,792</b>	

Source: ABS, Census of Population And Housing, 2001.

**Table A.8: Persons employed in community services occupations: industry of employment, 2001**

<b>Industry</b>	<b>Child and youth services <sup>(a)</sup></b>	<b>Family services</b>	<b>Disability workers</b>	<b>Aged or disabled care</b>	<b>Other community services</b>	<b>Total</b>
Health services, nfd	120	184	143	1,288	912	2,647
Hospitals & nursing homes, nfd	—	5	3	25	18	51
Hospitals (excl. psychiatric)	194	267	62	491	2,271	3,285
Psychiatric hospitals	—	15	13	45	114	187
Nursing homes	31	45	87	4,281	412	4,856
Medical & dental services, nfd	6	3	3	4	4	20
GP medical services	124	25	9	87	201	446
Specialist medical services	6	57	40	96	387	615
Dental services	15	10	3	19	35	82
Other health services, nfd	6	—	12	144	23	185
Pathology services	6	—	—	—	3	9
Optometry & optical dispensing	6	—	3	—	—	9
Ambulance services	—	3	3	6	24	36
Community health centres	209	257	131	643	1,584	2,824
Physiotherapy services	12	—	3	8	15	38
Chiropractic services	11	—	3	3	—	17
Health services, nec	125	196	155	515	957	1,948
<i>Total health services</i>	<i>900</i>	<i>1,067</i>	<i>673</i>	<i>7,655</i>	<i>6,960</i>	<i>17,255</i>
Community services, nfd	725	527	276	1,171	1,724	4,423
Child care services	51,013	250	92	228	827	52,410
Community care services, nfd	139	138	222	1,127	355	1,981
Accommodation for the aged	23	37	38	3,614	303	4,015
Residential care services, nfd	1,698	992	2,603	4,984	1,547	11,824
Non-residential care services, nec	2,466	4,485	2,878	19,938	7,416	37,183
<i>Total community services</i>	<i>56,064</i>	<i>6,429</i>	<i>6,109</i>	<i>31,062</i>	<i>12,172</i>	<i>111,836</i>
Health & community services, nfd	481	372	340	5,877	1,264	8,334
<i>Total health &amp; community services</i>	<i>57,445</i>	<i>7,868</i>	<i>7,122</i>	<i>44,594</i>	<i>20,396</i>	<i>137,425</i>
Government administration	2,051	2,329	1,207	2,141	13,859	21,587
Defence	14	10	6	6	51	87
Education	31,119	208	21,030	513	1,191	54,061
Other industries (incl. not stated)	11,072	1,263	1,530	4,538	5,493	23,896
<b>Total</b>	<b>101,701</b>	<b>11,678</b>	<b>30,895</b>	<b>51,792</b>	<b>40,990</b>	<b>237,056</b>

(a) Does not include childcare workers nfd.

Source: ABS, Census of Population and Housing, 2001.

**Table A.9: Persons with a highest qualification in a health field: age and employment status and age, 2001**

Field of study	Age 15–64 years				Age 65+			Total
	Em- ployed	Unem- ployed	Not in the labour force	Total	Em- ployed	Not em- ployed	Total	
<b>Health, nfd</b>								
Health, nfd	20,639	710	3,053	24,429	307	948	1,266	<b>25,695</b>
<b>Medical studies</b>								
Medical studies, nfd	2,089	53	351	2,502	175	356	537	<b>3,039</b>
General medicine	34,879	529	2,903	38,341	2,067	3,170	5,260	<b>43,601</b>
Surgery	1,694	15	113	1,822	382	319	704	<b>2,526</b>
Psychiatry	1,332	18	117	1,467	143	166	315	<b>1,782</b>
Obstetrics & gynaecology	527	—	38	565	72	154	226	<b>791</b>
Paediatrics	276	6	25	307	9	16	25	<b>332</b>
Anaesthesiology	1,249	3	69	1,321	67	138	205	<b>1,526</b>
Pathology	478	9	66	553	28	75	103	<b>656</b>
Radiology	778	9	75	865	51	124	175	<b>1,040</b>
Internal medicine	1,881	29	173	2,086	222	284	512	<b>2,598</b>
General practice	1,156	12	47	1,218	89	101	190	<b>1,408</b>
Medical studies, nec	923	12	77	1,012	77	114	191	<b>1,203</b>
<i>Total</i>	<i>47,262</i>	<i>695</i>	<i>4,054</i>	<i>52,059</i>	<i>3,382</i>	<i>5,017</i>	<i>8,443</i>	<b><i>60,502</i></b>
<b>Nursing</b>								
Nursing, nfd	465	9	183	657	26	379	417	<b>1,074</b>
General nursing	207,344	4,016	49,464	261,256	3,167	33,151	37,074	<b>298,330</b>
Midwifery	13,189	147	3,836	17,199	308	3,650	4,031	<b>21,230</b>
Mental health nursing	2,176	43	540	2,774	35	525	570	<b>3,344</b>
Community nursing	425	18	110	553	3	48	51	<b>604</b>
Critical care nursing	1,546	6	120	1,672	—	19	19	<b>1,691</b>
Aged care nursing	1,631	78	332	2,041	27	74	104	<b>2,145</b>
Palliative care nursing	69	—	6	75	—	3	3	<b>78</b>
Mothercraft nursing	2,281	70	1,249	3,612	81	997	1,097	<b>4,709</b>
Nursing, nec	1,058	27	264	1,349	13	156	175	<b>1,524</b>
<i>Total</i>	<i>230,184</i>	<i>4,414</i>	<i>56,104</i>	<i>291,188</i>	<i>3,660</i>	<i>39,002</i>	<i>43,541</i>	<b><i>334,729</i></b>
<b>Dental studies</b>								
Dental studies, nfd	1,555	50	307	1,918	24	72	96	<b>2,014</b>
Dentistry	8,976	140	1,043	10,176	484	1,615	2,111	<b>12,287</b>
Dental assisting	10,244	244	2,957	13,475	38	357	408	<b>13,883</b>
Dental technology	2,715	63	351	3,132	109	584	711	<b>3,843</b>
Dental studies, nec	1,908	43	428	2,379	3	13	16	<b>2,395</b>
<i>Total</i>	<i>25,398</i>	<i>540</i>	<i>5,086</i>	<i>31,080</i>	<i>658</i>	<i>2,641</i>	<i>3,342</i>	<b><i>34,422</i></b>
<b>Pharmacy</b>								
Pharmacy	14,849	255	2,276	17,416	1,081	2,964	4,080	<b>21,496</b>
<b>Optical science</b>								
Optical science, nfd	18	—	3	21	—	6	6	<b>27</b>
Optometry	2,686	21	209	2,919	81	249	333	<b>3,252</b>
Optical technology	2,922	86	380	3,394	58	318	379	<b>3,773</b>
Optical science, nec	6	—	—	6	—	—	—	<b>6</b>
<i>Total</i>	<i>5,632</i>	<i>107</i>	<i>592</i>	<i>6,340</i>	<i>139</i>	<i>573</i>	<i>718</i>	<b><i>7,058</i></b>

(continued)

**Table A.9 (continued): Persons with a highest qualification in a health field: employment status and age, 2001**

Field of study	Age 15–64 years				Age 65+			
	Em- ployed	Unem- ployed	Not in the labour force	Total	Em- ployed	Not em- ployed	Total	Total
<b>Public health</b>								
Public health, nfd	1,823	47	213	2,083	17	124	144	<b>2,227</b>
Occupational health & safety	5,674	251	565	6,493	37	217	254	<b>6,747</b>
Environmental health	1,785	44	235	2,064	31	338	375	<b>2,439</b>
Indigenous health	306	27	99	432	3	9	12	<b>444</b>
Health promotion	1,520	42	244	1,806	10	44	54	<b>1,860</b>
Community health	2,295	104	431	2,836	22	110	132	<b>2,968</b>
Epidemiology	318	3	40	361	3	3	6	<b>367</b>
Public health, nec	167	9	22	198	—	15	15	<b>213</b>
<i>Total</i>	<b>13,888</b>	<b>527</b>	<b>1,849</b>	<b>16,273</b>	<b>123</b>	<b>860</b>	<b>992</b>	<b>17,265</b>
<b>Radiography</b>								
Radiography	7,592	71	920	8,592	85	583	674	<b>9,266</b>
<b>Rehabilitation therapies</b>								
Rehabilitation therapies, nfd	535	18	74	627	6	25	31	<b>658</b>
Physiotherapy	10,862	115	1,654	2,655	229	1,285	1,534	<b>14,189</b>
Occupational therapy	6,077	74	1,100	7,260	52	308	363	<b>7,623</b>
Chiropractic & osteopathy	2,257	18	190	2,471	92	134	229	<b>2,700</b>
Speech pathology	3,329	36	511	3,879	32	115	150	<b>4,029</b>
Audiology	996	12	109	1,120	12	52	64	<b>1,184</b>
Massage therapy	6,569	527	1,857	8,972	55	118	179	<b>9,151</b>
Podiatry	1,641	21	206	1,868	62	527	600	<b>2,468</b>
Rehabilitation therapies, nec	2,275	111	427	2,813	36	136	172	<b>2,985</b>
<i>Total</i>	<b>34,541</b>	<b>932</b>	<b>6,128</b>	<b>41,665</b>	<b>576</b>	<b>2,700</b>	<b>3,322</b>	<b>44,987</b>
<b>Complementary therapies</b>								
Complementary therapies, nfd	1,363	131	417	1,911	15	44	59	<b>1,970</b>
Naturopathy	2,726	183	665	3,583	37	94	134	<b>3,717</b>
Acupuncture	632	28	139	799	10	28	38	<b>837</b>
Traditional Chinese medicine	498	30	123	657	9	25	34	<b>691</b>
Complementary therapies, nec	1,042	85	338	1,471	17	36	59	<b>1,530</b>
<i>Total</i>	<b>6,261</b>	<b>457</b>	<b>1,682</b>	<b>8,421</b>	<b>88</b>	<b>227</b>	<b>324</b>	<b>8,745</b>
<b>Other health</b>								
Other health, nfd	32	—	9	41	—	3	3	<b>44</b>
Nutrition & dietetics	3,638	127	921	4,704	34	269	306	<b>5,010</b>
Human movement	4,090	130	422	4,645	12	12	24	<b>4,669</b>
Paramedical studies	3,573	83	375	4,034	37	259	299	<b>4,333</b>
First aid	620	156	296	1,078	6	66	72	<b>1,150</b>
Health, nec	547	12	104	663	9	31	40	<b>703</b>
<i>Total</i>	<b>12,500</b>	<b>508</b>	<b>2,127</b>	<b>15,165</b>	<b>98</b>	<b>640</b>	<b>744</b>	<b>15,909</b>
<b>Teacher education</b>								
Special education teacher	6,748	71	1,231	8,050	85	571	659	<b>8,709</b>
Nursing education teacher	733	9	192	934	20	248	274	<b>1,208</b>
<b>Total</b>	<b>420,212</b>	<b>9,234</b>	<b>84,255</b>	<b>514,496</b>	<b>10,237</b>	<b>56,651</b>	<b>67,994</b>	<b>582,490</b>

Note: Employment classification 'not stated' included in 'Total' figures. Those employed in this table are not necessarily employed in a health occupation.

Source: ABS, Census of Population and Housing, 2001.

**Table A.10: Persons employed in health occupations: sex, states and territories, 2001**

<b>Occupation</b>	<b>NSW</b>	<b>Vic</b>	<b>Qld</b>	<b>WA</b>	<b>SA</b>	<b>Tas</b>	<b>ACT</b>	<b>NT</b>	<b>Total</b>
<b>Males</b>									
<b>Medical workers</b>									
Medical administrator	489	268	236	109	87	23	42	25	1,279
Generalist medical practitioner	6,674	4,732	3,277	1,714	1,639	442	308	175	18,961
Medical practitioner in training	495	389	246	137	106	44	53	13	1,483
Anaesthetist	509	420	295	163	159	38	25	12	1,621
Dermatologist	47	38	30	13	11	—	—	3	142
Emergency medicine specialist	73	60	38	20	16	3	3	—	213
Obstetrician and gynaecologist	207	133	113	46	44	10	10	3	566
Ophthalmologist	113	86	64	34	34	3	3	—	337
Paediatrician	183	90	94	40	40	12	6	6	471
Pathologist	215	124	108	58	65	13	14	6	603
Specialist physician	498	390	252	142	150	36	30	9	1,507
Psychiatrist	392	409	198	116	114	23	15	15	1,282
Radiologist	350	261	184	113	85	32	17	—	1,042
Surgeon	1,017	772	522	275	287	68	49	18	3,008
Specialist medical practitioner, nec	119	61	50	18	39	12	12	3	314
Specialist medical practitioner, nfd	217	159	95	40	58	—	18	—	587
Medical practitioner, nfd	41	80	47	19	21	6	3	—	217
<i>Total</i>	<i>11,639</i>	<i>8,472</i>	<i>5,849</i>	<i>3,057</i>	<i>2,955</i>	<i>765</i>	<i>608</i>	<i>288</i>	<i>33,633</i>
<b>Medical imaging workers</b>									
Medical diagnostic radiographer	652	453	359	182	121	37	36	15	1,855
Radiation therapist	55	47	41	15	18	12	—	—	188
Nuclear medicine technologist	44	43	13	9	12	6	—	—	127
Sonographer	115	98	65	23	21	6	—	3	331
<i>Total</i>	<i>866</i>	<i>641</i>	<i>478</i>	<i>229</i>	<i>172</i>	<i>61</i>	<i>36</i>	<i>18</i>	<i>2,501</i>
<b>Dental workers</b>									
Dentist	1,916	1,231	1,011	558	479	79	105	38	5,417
Dental specialist	207	147	121	69	66	9	22	3	644
Dental therapist	3	—	16	3	—	3	—	—	25
Dental hygienist	—	—	—	9	3	—	—	—	12
Dental technician	723	593	465	290	184	58	44	15	2,372
Dental associate professional, nfd	—	—	—	—	—	—	—	—	—
Dental assistant	69	19	41	21	15	3	3	—	171
<i>Total</i>	<i>2,918</i>	<i>1,990</i>	<i>1,654</i>	<i>950</i>	<i>747</i>	<i>152</i>	<i>174</i>	<i>56</i>	<i>8,641</i>
<b>Nursing workers</b>									
Director of nursing	126	55	57	18	30	9	—	3	298
Nurse manager	382	276	82	68	42	16	6	3	875
Nurse educator	63	41	32	16	16	3	6	9	186
Nurse researcher	18	19	3	6	3	—	3	—	52
Registered nurse	3,678	2,652	2,149	809	1,036	293	116	112	10,845
Registered midwife	68	13	19	4	15	12	3	—	134
Registered mental health nurse	581	685	370	299	255	67	15	16	2,288
Reg developmental disability nurse	83	79	3	—	17	6	—	—	188
Nursing professional, nfd	16	28	3	—	3	—	3	3	56
Enrolled nurse	693	301	340	89	178	37	32	27	1,697
Personal care assistant	1,982	1,418	1,757	1,048	485	231	99	85	7,105
Nursing assistant	1,352	463	749	242	129	70	40	9	3,054
<i>Total</i>	<i>9,042</i>	<i>6,030</i>	<i>5,564</i>	<i>2,599</i>	<i>2,209</i>	<i>744</i>	<i>323</i>	<i>267</i>	<i>26,778</i>

(continued)

**Table A.10 (continued): Persons employed in health occupations: sex, states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Males</b>									
<b>Pharmacist workers</b>									
Hospital pharmacist	97	110	72	56	30	9	6	—	380
Industrial pharmacist	66	99	30	19	10	—	6	—	230
Retail pharmacist	1,992	1,558	1,185	617	461	161	75	26	6,075
<i>Total</i>	<i>2,155</i>	<i>1,767</i>	<i>1,287</i>	<i>692</i>	<i>501</i>	<i>170</i>	<i>87</i>	<i>26</i>	<i>6,685</i>
<b>Allied health workers</b>									
Occupational therapist	106	99	53	57	34	9	3	3	364
Optometrist	576	367	325	152	105	33	20	11	1,589
Physiotherapist	888	759	423	289	292	47	51	15	2,764
Speech pathologist	21	34	16	9	19	6	—	3	108
Podiatrist	186	183	98	88	91	14	20	—	680
Dietitian	63	41	32	12	18	3	9	3	181
Audiologist	60	50	23	15	11	3	3	3	168
Orthoptist	25	21	9	3	—	—	—	—	58
Orthotist	89	77	37	26	29	12	9	3	282
Health professional, nec	66	50	45	7	15	6	7	3	199
Clinical psychologist	748	570	309	233	168	38	57	22	2,145
Therapy aide	79	44	52	55	16	12	3	—	261
<i>Total</i>	<i>2,907</i>	<i>2,295</i>	<i>1,422</i>	<i>946</i>	<i>798</i>	<i>183</i>	<i>182</i>	<i>66</i>	<i>8,799</i>
<b>Complementary therapies</b>									
Chiropractor	512	426	254	130	153	12	20	3	1,510
Osteopath	103	81	19	10	3	6	13	—	235
Naturopath	157	177	154	63	44	12	10	3	620
Acupuncturist	169	64	99	14	19	3	9	—	377
Natural therapy professional, nec	93	78	34	19	15	—	—	—	239
Natural remedy consultant	152	237	99	69	33	21	6	6	623
<i>Total</i>	<i>1,186</i>	<i>1,063</i>	<i>659</i>	<i>305</i>	<i>267</i>	<i>54</i>	<i>58</i>	<i>12</i>	<i>3,604</i>
<b>Other health</b>									
Medical scientist	1,190	1,137	609	409	396	82	79	18	3,920
Biomedical engineer	162	143	67	32	45	6	12	—	467
Health information manager	42	27	25	3	6	—	6	—	109
Occupational health & safety officer	539	458	384	201	161	56	40	24	1,863
Environmental health officer	655	312	600	235	98	55	29	36	2,020
Medical technical officer	998	970	646	357	270	78	46	42	3,407
Ambulance officer	1,566	333	346	76	132	41	10	26	2,530
Intensive care ambulance paramedic	364	1,028	923	183	227	56	39	15	2,835
Indigenous health worker	31	15	57	62	35	3	3	74	280
Massage therapist	462	346	243	71	99	26	37	6	1,290
Primary products inspector	680	435	533	290	170	91	28	46	2,273
Anatomist or physiologist	73	32	53	45	12	3	15	6	239
Safety inspector	1,094	741	901	564	292	92	53	43	3,780
Admissions clerk	119	70	73	19	23	15	6	6	331
Weight loss consultant	9	—	3	—	3	—	3	—	18
<i>Total</i>	<i>7,984</i>	<i>6,047</i>	<i>5,463</i>	<i>2,547</i>	<i>1,969</i>	<i>604</i>	<i>406</i>	<i>342</i>	<i>25,362</i>
<b>Total males</b>	<b>38,697</b>	<b>28,305</b>	<b>22,376</b>	<b>11,325</b>	<b>9,618</b>	<b>2,733</b>	<b>1,874</b>	<b>1,075</b>	<b>116,003</b>

(continued)



**Table A.10 (continued): Persons employed in health occupations: sex, states and territories, 2001**

<b>Occupation</b>	<b>NSW</b>	<b>Vic</b>	<b>Qld</b>	<b>WA</b>	<b>SA</b>	<b>Tas</b>	<b>ACT</b>	<b>NT</b>	<b>Total</b>
<b>Females</b>									
<b>Medical workers</b>									
Medical administrator	956	614	388	204	128	51	69	41	2,451
Generalist medical practitioner	3,456	2,512	1,831	951	849	241	209	116	10,165
Medical practitioner in training	435	322	185	114	105	42	39	21	1,263
Anaesthetist	170	125	103	52	48	15	3	3	519
Dermatologist	44	14	23	4	12	—	—	—	97
Emergency medicine specialist	41	23	17	12	10	—	—	3	106
Obstetrician and gynaecologist	63	62	30	18	31	10	3	9	226
Ophthalmologist	43	30	12	—	6	—	—	—	91
Paediatrician	117	81	48	38	19	9	—	12	324
Pathologist	226	93	128	40	35	9	19	3	553
Specialist physician	158	120	65	38	38	3	11	—	433
Psychiatrist	208	221	117	83	79	12	6	3	729
Radiologist	112	73	45	45	33	15	6	3	332
Surgeon	82	84	48	17	27	3	3	3	267
Specialist medical practitioner, nec	68	49	26	22	20	3	9	—	197
Specialist medical practitioner, nfd	113	80	55	32	25	3	3	—	311
Medical practitioner, nfd	33	40	24	3	6	—	—	3	109
<i>Total</i>	<i>6,325</i>	<i>4,543</i>	<i>3,145</i>	<i>1,673</i>	<i>1,471</i>	<i>416</i>	<i>380</i>	<i>220</i>	<i>18,173</i>
<b>Medical imaging workers</b>									
Medical diagnostic radiographer	1,254	824	621	362	371	94	50	26	3,602
Radiation therapist	176	174	125	43	56	22	3	—	599
Nuclear medicine technologist	113	96	37	30	26	3	—	—	305
Sonographer	470	207	215	97	63	19	30	3	1,104
<i>Total</i>	<i>2,013</i>	<i>1,301</i>	<i>998</i>	<i>532</i>	<i>516</i>	<i>138</i>	<i>83</i>	<i>29</i>	<i>5,610</i>
<b>Dental workers</b>									
Dentist	678	497	326	202	159	30	52	21	1,965
Dental specialist	52	47	29	16	14	6	3	—	167
Dental therapist	193	135	352	278	118	50	15	13	1,154
Dental hygienist	91	84	58	62	107	—	16	3	421
Dental technician	182	137	123	69	40	19	15	6	591
Dental associate professional, nfd	—	9	—	—	—	—	—	—	9
Dental assistant	4,144	3,008	2,686	1,375	1,155	234	241	71	12,914
<i>Total</i>	<i>5,340</i>	<i>3,917</i>	<i>3,574</i>	<i>2,002</i>	<i>1,593</i>	<i>339</i>	<i>342</i>	<i>114</i>	<i>17,221</i>
<b>Nursing workers</b>									
Director of nursing	929	552	466	151	181	63	16	19	2,377
Nurse manager	2,193	2,483	730	484	342	181	74	40	6,527
Nurse educator	646	485	251	169	89	29	33	31	1,733
Nurse researcher	174	206	81	85	79	22	12	3	662
Registered nurse	41,403	35,594	24,547	11,816	11,345	3,550	1,912	1,172	131,339
Registered midwife	3,363	2,988	1,987	1,249	1,211	348	203	169	11,518
Registered mental health nurse	1,151	1,169	730	476	466	111	72	24	4,199
Reg developmental disability nurse	244	122	18	11	15	6	—	—	416
Nursing professional, nfd	120	278	56	50	35	28	13	6	586
Enrolled nurse	5,729	3,889	3,040	1,868	2,520	374	230	160	17,810
Personal care assistant	3,994	7,622	2,743	2,453	2,701	945	170	151	20,779
Nursing assistant	9,242	2,034	5,102	2,037	795	280	220	22	19,732
<i>Total</i>	<i>69,188</i>	<i>57,422</i>	<i>39,751</i>	<i>20,849</i>	<i>19,779</i>	<i>5,937</i>	<i>2,955</i>	<i>1,797</i>	<i>217,678</i>

(continued)

**Table A.10 (continued): Persons employed in health occupations: sex, states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Females</b>									
<b>Pharmacist workers</b>									
Hospital pharmacist	336	273	158	93	78	36	24	3	1,001
Industrial pharmacist	69	123	29	6	16	—	3	—	246
Retail pharmacist	2,217	1,481	973	573	432	152	104	35	5,967
<i>Total</i>	<i>2,622</i>	<i>1,877</i>	<i>1,160</i>	<i>672</i>	<i>526</i>	<i>188</i>	<i>131</i>	<i>38</i>	<i>7,214</i>
<b>Allied health workers</b>									
Occupational therapist	1,634	1,265	782	689	350	113	88	46	4,967
Optometrist	410	300	198	91	58	22	20	7	1,106
Physiotherapist	2,552	1,763	1,291	821	657	177	158	59	7,478
Speech pathologist	874	771	547	314	264	63	43	27	2,903
Podiatrist	300	361	151	97	127	33	15	3	1,087
Dietitian	707	449	268	146	134	26	61	22	1,813
Audiologist	195	198	107	55	41	13	15	3	627
Orthoptist	177	146	24	12	9	3	12	—	383
Orthotist	12	45	12	9	10	6	3	—	97
Health professional, nec	788	525	586	50	235	93	24	9	2,310
Clinical psychologist	1,890	1,652	791	561	288	88	126	31	5,427
Therapy aide	541	588	382	550	274	85	17	23	2,460
<i>Total</i>	<i>10,080</i>	<i>8,063</i>	<i>5,139</i>	<i>3,395</i>	<i>2,447</i>	<i>722</i>	<i>582</i>	<i>230</i>	<i>30,658</i>
<b>Complementary therapies</b>									
Chiropractor	198	174	74	36	53	9	6	3	553
Osteopath	57	90	12	9	3	6	—	—	177
Naturopath	568	453	453	177	166	36	28	9	1,890
Acupuncturist	135	53	95	9	17	—	6	—	315
Natural therapy professional, nec	100	72	50	33	21	—	6	3	285
Natural remedy consultant	548	481	291	219	112	28	21	9	1,709
<i>Total</i>	<i>1,606</i>	<i>1,323</i>	<i>975</i>	<i>483</i>	<i>372</i>	<i>79</i>	<i>67</i>	<i>24</i>	<i>4,929</i>
<b>Other health</b>									
Medical scientist	2,205	2,411	1,094	705	519	106	109	35	7,184
Biomedical engineer	16	21	3	—	3	—	3	—	46
Health information manager	236	336	104	32	24	9	18	3	762
Occupational health & safety officer	470	426	329	114	149	37	52	19	1,596
Environmental health officer	331	255	363	153	79	40	24	31	1,276
Medical technical officer	3,344	2,365	2,180	1,328	905	158	162	96	10,538
Ambulance officer	423	61	80	41	59	20	10	9	703
Intensive care ambulance paramedic	61	203	203	54	70	10	14	11	626
Indigenous health worker	106	36	142	113	70	10	—	158	635
Massage therapist	1,246	920	763	260	244	66	91	28	3,618
Primary products inspector	174	120	125	76	34	21	30	21	601
Anatomist or physiologist	89	54	58	46	16	6	9	—	278
Safety inspector	215	187	164	117	60	19	9	12	783
Admissions clerk	1,123	1,198	408	554	301	121	59	44	3,808
Weight loss consultant	229	196	146	89	56	13	16	6	751
<i>Total</i>	<i>10,268</i>	<i>8,789</i>	<i>6,162</i>	<i>3,682</i>	<i>2,589</i>	<i>636</i>	<i>606</i>	<i>473</i>	<i>33,205</i>
<b>Total females</b>	<b>107,442</b>	<b>87,235</b>	<b>60,904</b>	<b>33,288</b>	<b>29,293</b>	<b>8,455</b>	<b>5,146</b>	<b>2,925</b>	<b>334,688</b>

(continued)

**Table A.10 (continued): Persons employed in health occupations: sex, states and territories, 2001**

<b>Occupation</b>	<b>NSW</b>	<b>Vic</b>	<b>Qld</b>	<b>WA</b>	<b>SA</b>	<b>Tas</b>	<b>ACT</b>	<b>NT</b>	<b>Total</b>
<b>Persons</b>									
<b>Medical workers</b>									
Medical administrator	1,445	882	624	313	215	74	111	66	3,730
Generalist medical practitioner	10,130	7,244	5,108	2,665	2,488	683	517	291	29,126
Medical practitioner in training	930	711	431	251	211	86	92	34	2,746
Anaesthetist	679	545	398	215	207	53	28	15	2,140
Dermatologist	91	52	53	17	23	—	—	3	239
Emergency medicine specialist	114	83	55	32	26	3	3	3	319
Obstetrician and gynaecologist	270	195	143	64	75	20	13	12	792
Ophthalmologist	156	116	76	34	40	3	3	—	428
Paediatrician	300	171	142	78	59	21	6	18	795
Pathologist	441	217	236	98	100	22	33	9	1,156
Specialist physician	656	510	317	180	188	39	41	9	1,940
Psychiatrist	600	630	315	199	193	35	21	18	2,011
Radiologist	462	334	229	158	118	47	23	3	1,374
Surgeon	1,099	856	570	292	314	71	52	21	3,275
Specialist medical practitioner, nec	187	110	76	40	59	15	21	3	511
Specialist medical practitioner, nfd	74	120	71	22	27	6	3	3	898
Medical practitioner, nfd	330	239	150	72	83	3	21	—	326
<i>Total</i>	<i>17,964</i>	<i>13,015</i>	<i>8,994</i>	<i>4,730</i>	<i>4,426</i>	<i>1,181</i>	<i>988</i>	<i>508</i>	<i>51,806</i>
<b>Medical imaging workers</b>									
Medical diagnostic radiographer	1,906	1,277	980	544	492	131	86	41	5,457
Radiation therapist	231	221	166	58	74	34	3	—	787
Nuclear medicine technologist	157	139	50	39	38	9	—	—	432
Sonographer	585	305	280	120	84	25	30	6	1,435
<i>Total</i>	<i>2,879</i>	<i>1,942</i>	<i>1,476</i>	<i>761</i>	<i>688</i>	<i>199</i>	<i>119</i>	<i>47</i>	<i>8,111</i>
<b>Dental workers</b>									
Dentist	2,594	1,728	1,337	760	638	109	157	59	7,382
Dental specialist	259	194	150	85	80	15	25	3	811
Dental therapist	196	135	368	281	118	53	15	13	1,179
Dental hygienist	91	84	58	71	110	—	16	3	433
Dental technician	905	730	588	359	224	77	59	21	2,963
Dental associate professional, nfd	—	9	—	—	—	—	—	—	9
Dental assistant	4,213	3,027	2,727	1,396	1,170	237	244	71	13,085
<i>Total</i>	<i>8,258</i>	<i>5,907</i>	<i>5,228</i>	<i>2,952</i>	<i>2,340</i>	<i>491</i>	<i>516</i>	<i>170</i>	<i>25,862</i>
<b>Nursing workers</b>									
Director of nursing	1,055	607	523	169	211	72	16	22	2,675
Nurse manager	2,575	2,759	812	552	384	197	80	43	7,402
Nurse educator	709	526	283	185	105	32	39	40	1,919
Nurse researcher	192	225	84	91	82	22	15	3	714
Registered nurse	45,081	38,246	26,696	12,625	12,381	3,843	2,028	1,284	142,184
Registered midwife	3,431	3,001	2,006	1,253	1,226	360	206	169	11,652
Registered mental health nurse	1,732	1,854	1,100	775	721	178	87	40	6,487
Reg developmental disability nurse	327	201	21	11	32	12	—	—	604
Nursing professional, nfd	136	306	59	50	38	28	16	9	642
Enrolled nurse	6,422	4,190	3,380	1,957	2,698	411	262	187	19,507
Personal care assistant	5,976	9,040	4,500	3,501	3,186	1,176	269	236	27,884
Nursing assistant	10,594	2,497	5,851	2,279	924	350	260	31	22,786
<i>Total</i>	<i>78,230</i>	<i>63,452</i>	<i>45,315</i>	<i>23,448</i>	<i>21,988</i>	<i>6,681</i>	<i>3,278</i>	<i>2,064</i>	<i>244,456</i>

(continued)

**Table A.10 (continued): Persons employed in health occupations: sex, states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Persons</b>									
<b>Pharmacist workers</b>									
Hospital pharmacist	433	383	230	149	108	45	30	3	1,381
Industrial pharmacist	135	222	59	25	26	—	9	—	476
Retail pharmacist	4,209	3,039	2,158	1,190	893	313	179	61	12,042
<i>Total</i>	<i>4,777</i>	<i>3,644</i>	<i>2,447</i>	<i>1,364</i>	<i>1,027</i>	<i>358</i>	<i>218</i>	<i>64</i>	<i>13,899</i>
<b>Allied health workers</b>									
Occupational therapist	1,740	1,364	835	746	384	122	91	49	5,331
Optometrist	986	667	523	243	163	55	40	18	2,695
Physiotherapist	3,440	2,522	1,714	1,110	949	224	209	74	10,242
Speech pathologist	895	805	563	323	283	69	43	30	3,011
Podiatrist	486	544	249	185	218	47	35	3	1,767
Dietitian	770	490	300	158	152	29	70	25	1,994
Audiologist	255	248	130	70	52	16	18	6	795
Orthoptist	202	167	33	15	9	3	12	—	441
Orthotist	101	122	49	35	39	18	12	3	379
Health professional, nec	854	575	631	57	250	99	31	12	2,509
Clinical psychologist	2,638	2,222	1,100	794	456	126	183	53	7,572
Therapy aide	620	632	434	605	290	97	20	23	2,721
<i>Total</i>	<i>12,987</i>	<i>10,358</i>	<i>6,561</i>	<i>4,341</i>	<i>3,245</i>	<i>905</i>	<i>764</i>	<i>296</i>	<i>39,457</i>
<b>Complementary therapies</b>									
Chiropractor	710	600	328	166	206	21	26	6	2,063
Osteopath	160	171	31	19	6	12	13	—	412
Naturopath	725	630	607	240	210	48	38	12	2,510
Acupuncturist	304	117	194	23	36	3	15	—	692
Natural therapy professional, nec	193	150	84	52	36	—	6	3	524
Natural remedy consultant	700	718	390	288	145	49	27	15	2,332
<i>Total</i>	<i>2,792</i>	<i>2,386</i>	<i>1,634</i>	<i>788</i>	<i>639</i>	<i>133</i>	<i>125</i>	<i>36</i>	<i>8,533</i>
<b>Other health</b>									
Medical scientist	3,395	3,548	1,703	1,114	915	188	188	53	11,104
Biomedical engineer	178	164	70	32	48	6	15	—	513
Health information manager	278	363	129	35	30	9	24	3	871
Occupational health & safety officer	1,009	884	713	315	310	93	92	43	3,459
Environmental health officer	986	567	963	388	177	95	53	67	3,296
Medical technical officer	4,342	3,335	2,826	1,685	1,175	236	208	138	13,945
Ambulance officer	1,989	394	426	117	191	61	20	35	3,233
Intensive care ambulance paramedic	425	1,231	1,126	237	297	66	53	26	3,461
Indigenous health worker	137	51	199	175	105	13	3	232	915
Massage therapist	1,708	1,266	1,006	331	343	92	128	34	4,908
Primary products inspector	854	555	658	366	204	112	58	67	2,874
Anatomist or physiologist	162	86	111	91	28	9	24	6	517
Safety inspector	1,309	928	1,065	681	352	111	62	55	4,563
Admissions clerk	1,242	1,268	481	573	324	136	65	50	4,139
Weight loss consultant	238	196	149	89	59	13	19	6	769
<i>Total</i>	<i>18,252</i>	<i>14,836</i>	<i>11,625</i>	<i>6,229</i>	<i>4,558</i>	<i>1,240</i>	<i>1,012</i>	<i>815</i>	<i>58,567</i>
<b>Total persons</b>	<b>146,139</b>	<b>115,540</b>	<b>83,280</b>	<b>44,613</b>	<b>38,911</b>	<b>11,188</b>	<b>7,020</b>	<b>4,000</b>	<b>450,691</b>

Note: Does not include those whose sex was not stated.

Source: ABS, Census of Population and Housing, 2001.

**Table A.11: Persons employed in community services occupations: sex, states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Males</b>									
<b>Child and youth services</b>									
Child care co-ordinator	152	101	172	45	30	12	3	3	518
Pre-primary school teacher	129	38	54	16	29	9	3	6	284
Youth worker	975	620	499	268	305	58	57	38	2,820
Pre-school aide	15	12	16	3	9	—	—	—	55
Child care worker	547	388	467	130	179	45	164	22	1,942
Family day care worker	14	30	27	17	18	16	—	—	122
Nanny	48	35	16	9	7	3	3	—	121
Hostel parent	82	45	104	64	20	6	—	28	349
Child or youth residential care assistant	13	49	6	21	9	13	3	—	114
Children's care workers, nfd	119	100	77	26	20	12	20	3	377
<i>Total</i>	<i>2,094</i>	<i>1,418</i>	<i>1,438</i>	<i>599</i>	<i>626</i>	<i>174</i>	<i>253</i>	<i>100</i>	<i>6,702</i>
<b>Family services</b>									
Welfare worker	819	803	235	145	134	41	25	24	2,226
Family counsellor	72	66	43	32	15	10	6	3	247
Family support worker	33	33	28	37	14	6	6	72	229
<i>Total</i>	<i>924</i>	<i>902</i>	<i>306</i>	<i>214</i>	<i>163</i>	<i>57</i>	<i>37</i>	<i>99</i>	<i>2,702</i>
<b>Disability workers</b>									
Special needs teacher	460	246	301	78	107	17	13	13	1,235
Teacher of the hearing-impaired	44	22	12	6	6	3	3	—	96
Teacher of the sight-impaired	31	—	9	6	3	—	3	—	52
Special education teacher, nec	38	17	29	32	28	3	12	28	187
Residential care officer	335	96	287	25	9	43	9	6	810
Disabilities services officer	374	566	144	425	203	40	51	3	1,806
Integration aide	90	246	81	28	30	26	15	9	525
<i>Total</i>	<i>1,372</i>	<i>1,193</i>	<i>863</i>	<i>600</i>	<i>386</i>	<i>132</i>	<i>106</i>	<i>59</i>	<i>4,711</i>
<b>Aged or disabled care</b>									
Aged or disabled person carer	1,989	1,988	1,546	672	953	437	189	99	7,873
<b>Other community services</b>									
Welfare centre manager	110	76	54	26	27	18	18	7	336
Social worker	419	515	234	188	278	44	28	9	1,715
Community worker	1,058	881	717	451	309	95	77	134	3,722
Rehabilitation counsellor	105	63	30	39	43	21	4	6	311
Drug & alcohol counsellor	186	122	46	48	19	3	9	12	445
Welfare associate professional, nfd	42	21	24	28	17	13	6	—	151
Parole or probation officer	218	43	51	48	41	17	12	15	445
Refuge worker	9	12	9	9	3	—	—	—	42
Social security inspector	776	651	525	258	261	150	55	39	2,715
<i>Total</i>	<i>2,923</i>	<i>2,384</i>	<i>1,690</i>	<i>1,095</i>	<i>998</i>	<i>361</i>	<i>209</i>	<i>222</i>	<i>9,882</i>
<b>Total</b>	<b>9,302</b>	<b>7,885</b>	<b>5,843</b>	<b>3,180</b>	<b>3,126</b>	<b>1,161</b>	<b>794</b>	<b>579</b>	<b>31,870</b>

(continued)

**Table A.11 (continued): Persons employed in community services occupations: sex, states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Females</b>									
<b>Child and youth services</b>									
Child care co-ordinator	1,748	1,337	1,670	437	367	113	157	95	5,924
Pre-primary school teacher	5,663	2,820	2,379	1,386	942	304	279	113	13,886
Youth worker	1,140	850	533	298	324	88	63	61	3,357
Pre-school aide	702	1,862	1,401	336	113	29	122	75	4,640
Child care worker	13,834	9,696	10,254	3,732	3,300	838	1,100	492	43,246
Family day care worker	3,227	2,523	2,479	733	961	444	358	136	10,861
Nanny	1,890	1,367	1,023	413	266	84	120	19	5,182
Hostel parent	292	172	278	215	77	19	10	37	1,100
Child or youth residential care assistant	105	141	40	42	18	9	3	3	361
Children's care workers, nfd	1,780	2,015	1,150	500	504	149	195	144	6,437
<i>Total</i>	<i>30,381</i>	<i>22,783</i>	<i>21,207</i>	<i>8,092</i>	<i>6,872</i>	<i>2,077</i>	<i>2,407</i>	<i>1,175</i>	<i>94,994</i>
<b>Family services</b>									
Welfare worker	2,521	2,264	888	451	354	129	98	58	6,763
Family counsellor	347	283	164	110	73	33	27	21	1,058
Family support worker	311	295	191	135	110	46	32	38	1,158
<i>Total</i>	<i>3,179</i>	<i>2,842</i>	<i>1,243</i>	<i>696</i>	<i>537</i>	<i>208</i>	<i>157</i>	<i>117</i>	<i>8,979</i>
<b>Disability workers</b>									
Special needs teacher	2,958	1,745	2,317	577	515	107	122	93	8,434
Teacher of the hearing-impaired	307	198	76	67	53	21	21	9	752
Teacher of the sight-impaired	94	42	26	10	13	9	3	9	206
Special education teacher, nec	125	88	92	66	50	12	22	92	547
Residential care officer	829	287	633	61	43	119	40	9	2,021
Disabilities services officer	1,022	1,604	280	883	432	97	85	10	4,413
Integration aide	1,994	4,729	1,326	913	504	171	127	98	9,862
<i>Total</i>	<i>7,329</i>	<i>8,693</i>	<i>4,750</i>	<i>2,577</i>	<i>1,610</i>	<i>536</i>	<i>420</i>	<i>320</i>	<i>26,235</i>
<b>Aged or disabled care</b>									
Aged or disabled person carer	10,533	12,255	8,164	4,718	5,450	1,790	684	317	43,911
<b>Other community services</b>									
Welfare centre manager	194	133	69	35	32	11	23	—	497
Social worker	2,050	2,281	1,066	723	905	185	140	65	7,415
Community worker	4,326	3,596	2,126	1,343	1,140	345	264	244	13,384
Rehabilitation counsellor	518	224	134	98	132	53	33	16	1,208
Drug & alcohol counsellor	243	216	48	74	19	—	8	25	633
Welfare associate professional, nfd	61	67	39	66	57	41	27	7	365
Parole or probation officer	262	133	73	95	32	24	18	28	665
Refuge worker	114	19	33	101	12	11	12	28	330
Social security inspector	1,993	1,387	1,376	722	603	288	97	121	6,587
<i>Total</i>	<i>9,761</i>	<i>8,056</i>	<i>4,964</i>	<i>3,257</i>	<i>2,932</i>	<i>958</i>	<i>622</i>	<i>534</i>	<i>31,084</i>
<b>Total</b>	<b>61,183</b>	<b>54,629</b>	<b>40,328</b>	<b>19,340</b>	<b>17,401</b>	<b>5,569</b>	<b>4,290</b>	<b>2,463</b>	<b>205,203</b>

(continued)

**Table A.11 (continued): Persons employed in community services occupations: sex, states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Persons</b>									
<b>Child and youth services</b>									
Child care co-ordinator	1,900	1,438	1,842	482	397	125	160	98	6,442
Pre-primary school teacher	5,792	2,858	2,433	1,402	971	313	282	119	14,170
Youth worker	2,115	1,470	1,032	566	629	146	120	99	6,177
Pre-school aide	717	1,874	1,417	339	122	29	122	75	4,695
Child care worker	14,381	10,084	10,721	3,862	3,479	883	1,264	514	45,188
Family day care worker	3,241	2,553	2,506	750	979	460	358	136	10,983
Nanny	1,938	1,402	1,039	422	273	87	123	19	5,303
Hostel parent	374	217	382	279	97	25	10	65	1,449
Child or youth residential care assistant	118	190	46	63	27	22	6	3	475
Children's care workers, nfd	1,899	2,115	1,227	526	524	161	215	147	6,814
<i>Total</i>	<i>32,475</i>	<i>24,201</i>	<i>22,645</i>	<i>8,691</i>	<i>7,498</i>	<i>2,251</i>	<i>2,660</i>	<i>1,275</i>	<i>101,696</i>
<b>Family services</b>									
Welfare worker	3,340	3,067	1,123	596	488	170	123	82	8,989
Family counsellor	419	349	207	142	88	43	33	24	1,305
Family support worker	344	328	219	172	124	52	38	110	1,387
<i>Total</i>	<i>4,103</i>	<i>3,744</i>	<i>1,549</i>	<i>910</i>	<i>700</i>	<i>265</i>	<i>194</i>	<i>216</i>	<i>11,681</i>
<b>Disability workers</b>									
Special needs teacher	3,418	1,991	2,618	655	622	124	135	106	9,669
Teacher of the hearing-impaired	351	220	88	73	59	24	24	9	848
Teacher of the sight-impaired	125	42	35	16	16	9	6	9	258
Special education teacher, nec	163	105	121	98	78	15	34	120	734
Residential care officer	1,164	383	920	86	52	162	49	15	2,831
Disabilities services officer	1,396	2,170	424	1,308	635	137	136	13	6,219
Integration aide	2,084	4,975	1,407	941	534	197	142	107	10,387
<i>Total</i>	<i>8,701</i>	<i>9,886</i>	<i>5,613</i>	<i>3,177</i>	<i>1,996</i>	<i>668</i>	<i>526</i>	<i>379</i>	<i>30,946</i>
<b>Aged or disabled care</b>									
Aged or disabled person carer	12,522	14,243	9,710	5,390	6,403	2,227	873	416	51,784
<b>Other community services</b>									
Welfare centre manager	304	209	123	61	59	29	41	7	833
Social worker	2,469	2,796	1,300	911	1,183	229	168	74	9,130
Community worker	5,384	4,477	2,843	1,794	1,449	440	341	378	17,106
Rehabilitation counsellor	623	287	164	137	175	74	37	22	1,519
Drug & alcohol counsellor	429	338	94	122	38	3	17	37	1,078
Welfare associate professional, nfd	103	88	63	94	74	54	33	7	516
Parole or probation officer	480	176	124	143	73	41	30	43	1,110
Refuge worker	123	31	42	110	15	11	12	28	372
Social security inspector	2,769	2,038	1,901	980	864	438	152	160	9,302
<i>Total</i>	<i>12,684</i>	<i>10,440</i>	<i>6,654</i>	<i>4,352</i>	<i>3,930</i>	<i>1,319</i>	<i>831</i>	<i>756</i>	<i>40,966</i>
<b>Total</b>	<b>70,485</b>	<b>62,514</b>	<b>46,171</b>	<b>22,520</b>	<b>20,527</b>	<b>6,730</b>	<b>5,084</b>	<b>3,042</b>	<b>237,073</b>

Note: Does not include those whose sex was not stated.

Source: ABS, Census Of Population And Housing, 2001.

**Table A.12: Persons employed in health occupations per 100,000 population: states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Persons</b>									
<b>Medical workers</b>									
Medical administrator	23	19	18	17	14	14	37	34	20
Medical practitioner, nfd	1	2	2	1	2	2	1	—	2
Generalist medical practitioner	157	153	143	144	167	149	176	156	153
Medical practitioner in training	15	15	12	13	15	21	27	22	14
Specialist medical practitioner, nfd	5	5	5	4	6	2	6	2	5
Anaesthetist	11	11	11	12	14	13	10	6	11
Dermatologist	2	1	1	1	2	—	1	—	1
Emergency medicine specialist	2	2	2	2	2	1	2	2	2
Obstetrician & gynaecologist	4	4	4	4	5	5	4	5	4
Ophthalmologist	2	3	2	2	3	2	3	3	2
Paediatrician	5	4	4	4	5	3	5	9	4
Pathologist	7	5	6	5	7	5	12	2	6
Specialist physician	10	11	9	10	13	8	14	7	10
Psychiatrist	9	13	9	11	13	8	8	7	11
Radiologist	7	7	7	8	8	9	8	3	7
Surgeon	17	18	16	16	21	15	17	12	17
Specialist medical practitioner, nec	3	2	2	2	4	1	6	3	3
<i>Total</i>	279	274	251	255	299	256	336	274	272
<b>Medical imaging workers</b>									
Medical diagnostic radiographer	30	27	27	29	33	29	30	23	29
Radiation therapist	4	5	5	3	5	7	5	—	4
Nuclear medicine technologist	3	3	2	3	3	2	3	—	2
Sonographer	9	6	8	6	6	5	10	4	7
<i>Total</i>	45	41	41	41	46	42	48	27	43
<b>Dental workers</b>									
Dentist	41	37	37	41	43	23	50	31	39
Dental specialist	4	4	5	5	6	3	8	—	4
Dental associate professional, nfd	—	—	—	—	—	—	—	—	—
Dental therapist	3	3	10	15	8	11	5	7	6
Dental hygienist	2	2	2	4	7	—	6	3	2
Dental technician	14	15	16	19	15	17	18	7	15
Dental assistants	65	63	75	74	79	52	87	43	68
<i>Total</i>	128	124	145	157	157	106	174	90	135
<b>Nursing workers</b>									
Director of nursing	17	13	15	9	14	15	7	14	14
Nursing professional, nfd	2	6	2	3	2	5	4	3	3
Nurse manager	40	59	23	30	26	42	25	21	39
Nurse educator	11	11	8	10	7	7	11	16	10
Nurse researcher	3	5	2	5	6	4	3	2	4
Registered nurse	688	799	743	679	831	821	692	706	740
Registered midwife	52	64	56	69	82	76	71	96	61
Registered mental health nurse	27	39	31	42	49	38	32	25	34
Registered developmental disability Nurse	5	4	1	1	2	2	—	—	3
Enrolled nurse	100	88	95	105	181	88	89	100	102
Personal care assistant	91	187	125	186	214	251	93	122	144
Nursing assistant	160	52	162	121	61	74	87	14	117
<i>Total</i>	1,196	1,327	1,262	1,259	1,475	1,423	1,113	1,117	1,272

(continued)



**Table A.12 (continued): Persons employed in health occupations per 100,000 population: states and territories, 2001**

Occupation	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Persons</b>									
<b>Pharmacist workers</b>									
Hospital pharmacist	7	8	7	8	8	10	10	3	7
Industrial pharmacist	2	5	2	1	2	—	4	—	3
Retail pharmacist	66	64	60	64	60	66	61	35	63
<i>Total</i>	<i>74</i>	<i>77</i>	<i>68</i>	<i>74</i>	<i>69</i>	<i>76</i>	<i>75</i>	<i>38</i>	<i>73</i>
<b>Allied health workers</b>									
Occupational therapist	27	29	24	40	26	26	28	27	28
Optometrist	15	14	15	13	11	13	14	10	14
Physiotherapist	54	53	48	60	64	49	65	42	54
Speech pathologist	14	17	16	17	19	15	12	13	16
Podiatrist	8	12	7	10	14	10	11	2	9
Dietitian	12	10	8	8	10	7	24	14	11
Audiologist	4	5	4	4	4	3	5	5	4
Orthoptist	3	4	1	1	—	1	3	—	2
Orthotist	2	3	1	2	2	3	2	2	2
Health professional, nec	13	12	18	3	17	21	11	4	13
Clinical psychologist	41	47	31	43	31	27	58	30	40
Therapy aide	10	13	12	32	20	22	7	9	14
<i>Total</i>	<i>203</i>	<i>218</i>	<i>183</i>	<i>234</i>	<i>218</i>	<i>198</i>	<i>238</i>	<i>157</i>	<i>207</i>
<b>Complementary therapies</b>									
Chiropractor	11	13	9	9	14	5	9	5	11
Osteopath	3	4	1	1	—	3	4	2	2
Naturopath	11	13	17	13	14	10	14	6	13
Acupuncturist	5	2	5	1	2	1	4	—	4
Natural therapy professional, nec	3	3	2	3	2	1	3	—	3
Natural remedy consultant	11	15	11	15	9	10	10	9	12
<i>Total</i>	<i>43</i>	<i>50</i>	<i>45</i>	<i>42</i>	<i>42</i>	<i>30</i>	<i>44</i>	<i>21</i>	<i>44</i>
<b>Other health</b>									
Anatomist or physiologist	3	2	3	5	2	2	7	3	3
Medical scientist	53	75	48	60	62	42	64	30	59
Biomedical engineer	3	4	2	2	3	2	3	3	3
Health information manager	4	8	4	2	2	3	7	3	5
Occupational health & safety officer	16	19	20	17	21	20	31	25	18
Environmental health officer	15	12	27	21	12	20	20	35	17
Medical technical officer	67	70	79	91	80	50	72	68	73
Ambulance officer	31	8	12	6	13	13	8	21	17
Intensive care ambulance paramedic	6	26	32	12	20	15	20	15	18
Indigenous health worker	2	1	6	9	7	3	1	118	5
Massage therapist	26	27	28	18	23	21	43	19	26
Primary products inspector	13	12	18	19	14	25	25	29	15
Safety inspector	20	20	30	37	24	23	25	30	24
Admission clerk	19	27	14	31	22	29	23	25	22
Weight loss consultant	4	4	4	5	4	4	5	4	4
<i>Total</i>	<i>282</i>	<i>313</i>	<i>326</i>	<i>335</i>	<i>308</i>	<i>270</i>	<i>352</i>	<i>426</i>	<i>307</i>
<b>Total</b>	<b>2,249</b>	<b>2,424</b>	<b>2,320</b>	<b>2,397</b>	<b>2,614</b>	<b>2,401</b>	<b>2,378</b>	<b>2,150</b>	<b>2,353</b>

Source: ABS, Census Of Population And Housing, 2001.

**Table A.13: Persons employed in community services occupations per 100,000 population: states and territories, 2001**

<b>Occupation</b>	<b>NSW</b>	<b>Vic</b>	<b>Qld</b>	<b>WA</b>	<b>SA</b>	<b>Tas</b>	<b>ACT</b>	<b>NT</b>	<b>Total</b>
<b>Child and youth services</b>									
Child care co-ordinators	30	31	52	26	27	26	53	51	34
Pre-primary school teachers	90	60	68	76	65	67	92	63	74
Youth worker	32	31	28	30	42	33	45	50	32
Pre-school aide	11	40	40	18	8	6	39	40	25
Child care worker	219	210	296	205	233	189	430	266	234
Family day care worker	50	53	70	40	66	98	116	70	57
Nanny	27	26	27	21	17	15	40	10	25
Hostel parent	5	4	10	14	6	5	5	34	7
Child or youth residential care assistant	2	4	1	4	2	4	4	2	3
Children's care workers, nfd	27	42	31	27	34	33	69	75	33
<i>Total</i>	<i>493</i>	<i>500</i>	<i>623</i>	<i>461</i>	<i>499</i>	<i>474</i>	<i>892</i>	<i>661</i>	<i>524</i>
<b>Family services</b>									
Welfare worker	52	64	31	32	33	36	39	41	47
Family counsellor	6	7	6	8	6	10	14	9	7
Family support worker	5	7	6	9	9	12	12	54	7
<i>Total</i>	<i>63</i>	<i>79</i>	<i>42</i>	<i>49</i>	<i>47</i>	<i>58</i>	<i>64</i>	<i>104</i>	<i>61</i>
<b>Disability workers</b>									
Special needs teacher	53	42	74	35	42	25	47	55	51
Teacher of the hearing-impaired	5	5	3	4	4	5	6	3	4
Teacher of the sight-impaired	2	1	1	1	1	2	2	2	1
Special education teachers, nec	3	2	3	5	5	2	6	64	4
Residential care officer	18	8	25	4	4	35	15	6	15
Disabilities services officer	21	46	12	71	43	30	49	7	33
Integration aide	32	106	39	51	36	41	45	57	55
<i>Total</i>	<i>135</i>	<i>209</i>	<i>157</i>	<i>171</i>	<i>133</i>	<i>140</i>	<i>171</i>	<i>196</i>	<i>162</i>
<b>Aged or disabled care</b>									
Aged or disabled person carer	189	291	266	285	425	470	292	218	265
<b>Other community services</b>									
Welfare centre manager	5	4	3	3	4	6	12	8	4
Social workers	38	58	37	49	80	48	55	41	48
Community worker	83	95	79	96	98	95	116	201	90
Rehabilitation counsellor	10	6	5	7	12	16	14	14	8
Drug and alcohol counsellor	6	7	3	7	3	2	9	16	6
Welfare associate professionals, nfd	2	2	2	5	5	11	11	10	3
Parole or probation officer	8	4	4	8	5	8	10	21	6
Refuge worker	2	1	1	6	1	3	2	13	2
Social security inspector	44	43	53	53	59	94	47	86	49
<i>Total</i>	<i>197</i>	<i>220</i>	<i>187</i>	<i>234</i>	<i>266</i>	<i>283</i>	<i>275</i>	<i>409</i>	<i>215</i>
<b>Total</b>	<b>1,077</b>	<b>1,298</b>	<b>1,275</b>	<b>1,201</b>	<b>1,371</b>	<b>1,425</b>	<b>1,694</b>	<b>1,589</b>	<b>1,228</b>

Source: ABS, Census Of Population And Housing, 2001.

**Table A.14: Persons employed in health occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Males</b>							
<b>Medical workers</b>							
Medical administrator	10	132	409	542	161	25	1,279
Generalist medical practitioner	182	3,630	5,009	5,351	3,013	1,779	18,964
Medical practitioner in training	130	874	298	138	30	13	1,483
Anaesthetist	3	265	547	459	281	66	1,621
Dermatologist	—	20	46	45	16	15	142
Emergency medicine specialist	—	76	115	13	9	—	213
Obstetrician and gynaecologist	—	42	128	192	150	54	566
Ophthalmologist	—	36	107	82	62	50	337
Paediatrician	—	92	139	153	73	14	471
Pathologist	27	59	172	170	114	61	603
Specialist physician	6	161	480	449	287	124	1,507
Psychiatrist	—	149	362	367	274	130	1,282
Radiologist	9	129	350	285	205	64	1,042
Surgeon	9	429	818	714	726	312	3,008
Medical practitioner, nfd	6	82	57	46	19	7	217
Specialist medical practitioner, nfd	3	113	148	159	92	72	587
Specialist medical practitioner, nec	—	77	84	71	49	33	314
<i>Total</i>	<i>385</i>	<i>6,366</i>	<i>9,269</i>	<i>9,236</i>	<i>5,561</i>	<i>2,819</i>	<i>33,636</i>
<b>Medical imaging workers</b>							
Medical diagnostic radiographer	224	526	535	382	169	19	1,855
Radiation therapist	36	84	46	19	3	—	188
Nuclear medicine technologist	23	60	34	10	—	—	127
Sonographer	19	105	141	54	9	3	331
<i>Total</i>	<i>302</i>	<i>775</i>	<i>756</i>	<i>465</i>	<i>181</i>	<i>22</i>	<i>2,501</i>
<b>Dental workers</b>							
Dentist	126	1,030	1,498	1,580	858	325	5,417
Dental specialist	6	48	209	224	117	40	644
Dental therapist & hygienist	3	18	13	—	3	—	37
Dental technician	213	490	774	583	212	100	2,372
Dental assistant	67	49	31	12	6	6	171
<i>Total</i>	<i>415</i>	<i>1,635</i>	<i>2,525</i>	<i>2,399</i>	<i>1,196</i>	<i>471</i>	<i>8,641</i>
<b>Nursing workers</b>							
Director of nursing	—	30	117	118	27	6	298
Nurse manager	3	171	343	287	67	4	875
Nurse educator & nurse researcher	9	68	105	50	6	—	238
Registered nurse	802	3,383	3,470	2,473	641	76	10,845
Registered midwife	9	22	63	29	11	—	134
Registered mental health nurse	32	346	795	870	228	17	2,288
Registered developmental disability nurse	—	14	65	85	18	6	188
Nursing professional, nfd	—	13	14	17	9	3	56
Enrolled nurse	167	516	556	343	102	13	1,697
Personal care assistant	768	1,466	1,934	1,881	942	114	7,105
Nursing assistant	477	770	811	688	274	34	3,054
<i>Total</i>	<i>2,267</i>	<i>6,799</i>	<i>8,273</i>	<i>6,841</i>	<i>2,325</i>	<i>273</i>	<i>26,778</i>

(continued)

**Table A.14 (continued): Persons employed in health occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Males</b>							
<b>Pharmacist workers</b>							
Hospital pharmacist	35	68	78	80	80	39	380
Industrial pharmacist	15	98	59	37	18	3	230
Retail pharmacist	427	1,184	1,201	1,113	1,555	595	6,075
<i>Total</i>	<i>477</i>	<i>1,350</i>	<i>1,338</i>	<i>1,230</i>	<i>1,653</i>	<i>637</i>	<i>6,685</i>
<b>Allied health workers</b>							
Occupational therapist	69	150	80	56	9	—	364
Optometrist	99	432	568	313	115	62	1,589
Physiotherapist	331	1,130	824	373	84	22	2,764
Speech pathologist	8	43	26	12	19	—	108
Podiatrist	71	270	205	86	26	22	680
Dietitian	26	64	41	35	12	3	181
Audiologist	3	62	37	42	17	7	168
Orthoptist	9	37	9	—	—	3	58
Orthotist	16	56	100	67	43	—	282
Health professional, nec	10	30	49	63	27	20	199
Clinical psychologist	21	345	559	782	346	92	2,145
Therapy aide	70	60	61	43	27	—	261
<i>Total</i>	<i>733</i>	<i>2,679</i>	<i>2,559</i>	<i>1,872</i>	<i>725</i>	<i>231</i>	<i>8,799</i>
<b>Complementary therapies</b>							
Chiropractor	34	435	450	320	196	75	1,510
Osteopath	7	77	62	60	22	7	235
Naturopath	8	109	151	224	93	35	620
Acupuncturist	6	59	124	131	46	11	377
Natural therapy professional, nec	3	28	78	74	44	12	239
Natural remedy consultant	29	85	151	192	136	30	623
<i>Total</i>	<i>87</i>	<i>793</i>	<i>1,016</i>	<i>1,001</i>	<i>537</i>	<i>170</i>	<i>3,604</i>
<b>Other health</b>							
Medical scientist	275	992	1,271	1,001	347	34	3,920
Biomedical engineer	30	116	150	115	56	—	467
Health information manager	15	33	26	26	6	3	109
Occupational health and safety officer	60	369	583	619	219	13	1,863
Environmental health officer	128	423	610	560	266	36	2,023
Medical technical officer	503	955	919	723	272	35	3,407
Ambulance officer	71	636	845	687	271	20	2,530
Intensive care ambulance paramedic	34	711	1,232	682	169	7	2,835
Indigenous health worker	26	96	84	55	16	3	280
Massage therapist	73	322	323	373	166	33	1,290
Primary products inspector	113	410	608	737	372	33	2,273
Anatomist or physiologist	47	94	53	24	21	—	239
Safety inspector	90	423	1,112	1,385	684	86	3,780
Admissions clerk	38	94	95	69	31	4	331
Weight loss consultant	3	—	6	6	—	3	18
<i>Total</i>	<i>1,506</i>	<i>5,674</i>	<i>7,917</i>	<i>7,062</i>	<i>2,896</i>	<i>310</i>	<i>25,365</i>
<b>Total males</b>	<b>6,172</b>	<b>26,071</b>	<b>33,653</b>	<b>30,106</b>	<b>15,074</b>	<b>4,933</b>	<b>116,009</b>

(continued)

**Table A.14 (continued): Persons employed in health occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Females</b>							
<b>Medical workers</b>							
Medical administrator	53	396	856	859	262	25	2,451
Generalist medical practitioner	185	3,082	3,548	2,373	749	228	10,165
Medical practitioner in training	115	806	230	85	24	3	1,263
Anaesthetist	—	178	187	101	44	9	519
Dermatologist	3	18	39	28	6	3	97
Emergency medicine specialist	3	61	36	6	—	—	106
Obstetrician and gynaecologist	—	73	97	46	10	—	226
Ophthalmologist	6	25	28	23	6	3	91
Paediatrician	—	125	136	44	13	6	324
Pathologist	37	135	167	145	57	12	553
Specialist physician	12	109	198	83	25	6	433
Psychiatrist	6	151	232	213	102	25	729
Radiologist	19	98	112	76	21	6	332
Surgeon	—	102	102	39	21	3	267
Medical practitioner, nfd	3	65	26	9	6	—	109
Specialist medical practitioner, nfd	6	102	117	63	20	3	311
Specialist medical practitioner, nec	6	67	60	45	12	7	197
<i>Total</i>	<i>454</i>	<i>5,593</i>	<i>6,171</i>	<i>4,238</i>	<i>1,378</i>	<i>339</i>	<i>18,173</i>
<b>Medical imaging workers</b>							
Medical diagnostic radiographer	480	1,003	971	892	238	18	3,602
Radiation therapist	96	221	154	109	19	—	599
Nuclear medicine technologist	60	135	56	51	3	—	305
Sonographer	32	432	397	208	35	—	1,104
<i>Total</i>	<i>668</i>	<i>1,791</i>	<i>1,578</i>	<i>1,260</i>	<i>295</i>	<i>18</i>	<i>5,610</i>
<b>Dental workers</b>							
Dentist	134	717	658	353	83	20	1,965
Dental specialist	18	54	60	32	3	—	167
Dental therapist & hygienist	99	488	748	228	12	—	1,575
Dental technician	100	192	194	80	17	8	591
Dental assistant	4,597	3,775	2,850	1,381	274	37	12,914
<i>Total</i>	<i>4,948</i>	<i>5,226</i>	<i>4,510</i>	<i>2,074</i>	<i>389</i>	<i>65</i>	<i>17,212</i>
<b>Nursing workers</b>							
Director of nursing	3	144	630	1,079	484	37	2,377
Nurse manager	34	938	2,120	2,508	868	59	6,527
Nurse educator & nurse researcher	21	491	943	680	245	15	2,395
Registered nurse	7,370	28,677	41,107	39,004	13,850	1,342	131,350
Registered midwife	146	2,391	4,980	3,127	826	48	11,518
Registered mental health nurse	126	815	1,507	1,341	374	36	4,199
Registered developmental disability nurse	3	86	171	111	42	3	416
Nursing professional, nfd	21	98	211	196	54	6	586
Enrolled nurse	1,043	3,556	6,776	5,128	1,230	80	17,813
Personal care assistant	2,086	2,926	5,719	7,088	2,764	196	20,779
Nursing assistant	2,756	3,698	5,532	5,635	1,973	141	19,735
<i>Total</i>	<i>13,609</i>	<i>43,820</i>	<i>69,696</i>	<i>65,897</i>	<i>22,710</i>	<i>1,963</i>	<i>217,695</i>

(continued)

**Table A.14 (continued): Persons employed in health occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Females</b>							
<b>Pharmacist workers</b>							
Hospital pharmacist	131	280	254	238	91	7	1,001
Industrial pharmacist	32	117	73	21	3	—	246
Retail pharmacist	826	1,800	1,429	1,127	608	180	5,970
<i>Total</i>	<i>989</i>	<i>2,197</i>	<i>1,756</i>	<i>1,386</i>	<i>702</i>	<i>187</i>	<i>7,217</i>
<b>Allied health workers</b>							
Occupational therapist	803	1,910	1,264	756	211	23	4,967
Optometrist	160	489	292	145	11	9	1,106
Physiotherapist	660	2,240	2,270	1,602	604	102	7,478
Speech pathologist	433	1,147	806	394	99	24	2,903
Podiatrist	131	429	284	136	74	33	1,087
Dietitian	165	729	472	341	91	15	1,813
Audiologist	44	269	162	120	23	9	627
Orthoptist	66	158	90	49	16	4	383
Orthotist	22	44	22	9	—	—	97
Health professional, nec	111	312	536	861	433	57	2,310
Clinical psychologist	205	1,658	1,313	1,543	603	105	5,427
Therapy aide	389	442	665	696	255	13	2,460
<i>Total</i>	<i>3,189</i>	<i>9,827</i>	<i>8,176</i>	<i>6,652</i>	<i>2,420</i>	<i>394</i>	<i>30,658</i>
<b>Complementary therapies</b>							
Chiropractor	36	279	158	46	27	7	553
Osteopath	23	91	33	21	9	—	177
Naturopath	102	489	529	542	193	35	1,890
Acupuncturist	17	63	96	102	28	9	315
Natural therapy professional, nec	3	31	96	109	37	9	285
Natural remedy consultant	110	308	513	562	188	28	1,709
<i>Total</i>	<i>291</i>	<i>1,261</i>	<i>1,425</i>	<i>1,382</i>	<i>482</i>	<i>88</i>	<i>4,929</i>
<b>Other health</b>							
Medical scientist	813	2,538	2,114	1,326	358	35	7,184
Biomedical engineer	6	19	18	—	3	—	46
Health information manager	112	260	235	125	30	—	762
Occupational health and safety officer	119	537	493	360	87	—	1,596
Environmental health officer	181	432	331	245	77	10	1,276
Medical technical officer	1,303	2,658	3,260	2,598	664	55	10,538
Ambulance officer	86	372	190	48	4	3	703
Intensive care ambulance paramedic	30	355	195	37	9	—	626
Indigenous health worker	58	164	209	143	55	6	635
Massage therapist	438	979	1,108	824	245	24	3,618
Primary products inspector	90	251	172	71	17	—	601
Anatomist or physiologist	92	114	39	20	13	—	278
Safety inspector	46	295	232	177	33	3	786
Admissions clerk	233	630	1,190	1,247	484	24	3,808
Weight loss consultant	57	169	244	174	93	14	751
<i>Total</i>	<i>3,664</i>	<i>9,773</i>	<i>10,030</i>	<i>7,395</i>	<i>2,172</i>	<i>174</i>	<i>33,208</i>
<b>Total females</b>	<b>27,812</b>	<b>79,488</b>	<b>103,342</b>	<b>90,284</b>	<b>30,548</b>	<b>3,228</b>	<b>334,702</b>

(continued)

**Table A.14 (continued): Persons employed in health occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Persons</b>							
<b>Medical workers</b>							
Medical administrator	63	528	1,265	1,401	423	50	3,730
Generalist medical practitioner	367	6,712	8,557	7,724	3,762	2,007	29,129
Medical practitioner in training	245	1,680	528	223	54	16	2,746
Anaesthetist	3	443	734	560	325	75	2,140
Dermatologist	3	38	85	73	22	18	239
Emergency medicine specialist	3	137	151	19	9	—	319
Obstetrician and gynaecologist	—	115	225	238	160	54	792
Ophthalmologist	6	61	135	105	68	53	428
Paediatrician	—	217	275	197	86	20	795
Pathologist	64	194	339	315	171	73	1,156
Specialist physician	18	270	678	532	312	130	1,940
Psychiatrist	6	300	594	580	376	155	2,011
Radiologist	28	227	462	361	226	70	1,374
Surgeon	9	531	920	753	747	315	3,275
Medical practitioner, nfd	9	147	83	55	25	7	326
Specialist medical practitioner, nfd	9	215	265	222	112	75	898
Specialist medical practitioner, nec	6	144	144	116	61	40	511
<i>Total</i>	<i>839</i>	<i>11,959</i>	<i>15,440</i>	<i>13,474</i>	<i>6,939</i>	<i>3,158</i>	<i>51,809</i>
<b>Medical imaging workers</b>							
Medical diagnostic radiographer	704	1,529	1,506	1,274	407	37	5,457
Radiation therapist	132	305	200	128	22	—	787
Nuclear medicine technologist	83	195	90	61	3	—	432
Sonographer	51	537	538	262	44	3	1,435
<i>Total</i>	<i>970</i>	<i>2,566</i>	<i>2,334</i>	<i>1,725</i>	<i>476</i>	<i>40</i>	<i>8,111</i>
<b>Dental workers</b>							
Dentist	260	1,747	2,156	1,933	941	345	7,382
Dental specialist	24	102	269	256	120	40	811
Dental therapist & hygienist	102	506	761	228	15	—	1,612
Dental technician	313	682	968	663	229	108	2,963
Dental assistant	4,664	3,824	2,881	1,393	280	43	13,085
<i>Total</i>	<i>5,363</i>	<i>6,861</i>	<i>7,035</i>	<i>4,473</i>	<i>1,585</i>	<i>536</i>	<i>25,853</i>
<b>Nursing workers</b>							
Director of nursing	3	174	747	1,197	511	43	2,675
Nurse manager	37	1,109	2,463	2,795	935	63	7,402
Nurse educator & nurse researcher	30	559	1,048	730	251	15	2,633
Registered nurse	8,172	32,060	44,577	41,477	14,491	1,418	142,195
Registered midwife	155	2,413	5,043	3,156	837	48	11,652
Registered mental health nurse	158	1,161	2,302	2,211	602	53	6,487
Registered developmental disability nurse	3	100	236	196	60	9	604
Nursing professional, nfd	21	111	225	213	63	9	642
Enrolled nurse	1,210	4,072	7,332	5,471	1,332	93	19,510
Personal care assistant	2,854	4,392	7,653	8,969	3,706	310	27,884
Nursing assistant	3,233	4,468	6,343	6,323	2,247	175	22,789
<i>Total</i>	<i>15,876</i>	<i>50,619</i>	<i>77,969</i>	<i>72,738</i>	<i>25,035</i>	<i>2,236</i>	<i>244,473</i>

(continued)

**Table A.14 (continued): Persons employed in health occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Persons</b>							
<b>Pharmacist workers</b>							
Hospital pharmacist	166	348	332	318	171	46	1,381
Industrial pharmacist	47	215	132	58	21	3	476
Retail pharmacist	1,253	2,984	2,630	2,240	2,163	775	12,045
<i>Total</i>	<i>1,466</i>	<i>3,547</i>	<i>3,094</i>	<i>2,616</i>	<i>2,355</i>	<i>824</i>	<i>13,902</i>
<b>Allied health workers</b>							
Occupational therapist	872	2,060	1,344	812	220	23	5,331
Optometrist	259	921	860	458	126	71	2,695
Physiotherapist	991	3,370	3,094	1,975	688	124	10,242
Speech pathologist	441	1,190	832	406	118	24	3,011
Podiatrist	202	699	489	222	100	55	1,767
Dietitian	191	793	513	376	103	18	1,994
Audiologist	47	331	199	162	40	16	795
Orthoptist	75	195	99	49	16	7	441
Orthotist	38	100	122	76	43	—	379
Health professional, nec	121	342	585	924	460	77	2,509
Clinical psychologist	226	2,003	1,872	2,325	949	197	7,572
Therapy aide	459	502	726	739	282	13	2,721
<i>Total</i>	<i>3,922</i>	<i>12,506</i>	<i>10,735</i>	<i>8,524</i>	<i>3,145</i>	<i>625</i>	<i>39,457</i>
<b>Complementary therapies</b>							
Chiropractor	70	714	608	366	223	82	2,063
Osteopath	30	168	95	81	31	7	412
Naturopath	110	598	680	766	286	70	2,510
Acupuncturist	23	122	220	233	74	20	692
Natural therapy professional, nec	6	59	174	183	81	21	524
Natural remedy consultant	139	393	664	754	324	58	2,332
<i>Total</i>	<i>378</i>	<i>2,054</i>	<i>2,441</i>	<i>2,383</i>	<i>1,019</i>	<i>258</i>	<i>8,533</i>
<b>Other health</b>							
Medical scientist	1,088	3,530	3,385	2,327	705	69	11,104
Biomedical engineer	36	135	168	115	59	—	513
Health information manager	127	293	261	151	36	3	871
Occupational health and safety officer	179	906	1,076	979	306	13	3,459
Environmental health officer	309	855	941	805	343	46	3,299
Medical technical officer	1,806	3,613	4,179	3,321	936	90	13,945
Ambulance officer	157	1,008	1,035	735	275	23	3,233
Intensive care ambulance paramedic	64	1,066	1,427	719	178	7	3,461
Indigenous health worker	84	260	293	198	71	9	915
Massage therapist	511	1,301	1,431	1,197	411	57	4,908
Primary products inspector	203	661	780	808	389	33	2,874
Anatomist or physiologist	139	208	92	44	34	—	517
Safety inspector	136	718	1,344	1,562	717	89	4,566
Admissions clerk	271	724	1,285	1,316	515	28	4,139
Weight loss consultant	60	169	250	180	93	17	769
<i>Total</i>	<i>5,170</i>	<i>15,447</i>	<i>17,947</i>	<i>14,457</i>	<i>5,068</i>	<i>484</i>	<i>58,573</i>
<b>Total persons</b>	<b>33,984</b>	<b>105,559</b>	<b>136,995</b>	<b>120,390</b>	<b>45,622</b>	<b>8,161</b>	<b>450,711</b>

*Note:* Does not include those whose age or sex was not stated.

*Source:* ABS, Census of Population and Housing, 2001.



**Table A.15: Persons employed in community services occupations: age and sex, 2001**

Occupation	15–24	25–34	35–44	45–54	55–64	65+	Total
<b>Males</b>							
<b>Child and youth services</b>							
Child care co-ordinator	22	99	134	149	92	22	518
Pre-primary school teacher	19	81	101	61	19	3	284
Youth worker	340	931	839	539	155	16	2,820
Pre-school aide	16	9	12	9	9	—	55
Child care worker	1,018	420	237	152	80	35	1,942
Family day care worker	3	22	32	43	19	3	122
Nanny	85	15	9	—	9	3	121
Hostel parent	82	68	68	82	40	9	349
Child or youth residential care assistant	6	36	36	30	6	—	114
Children's care workers, nfd	127	85	65	57	29	14	377
<i>Total</i>	<i>1,718</i>	<i>1,766</i>	<i>1,533</i>	<i>1,122</i>	<i>458</i>	<i>105</i>	<i>6,702</i>
<b>Family services</b>							
Welfare worker	105	495	635	663	286	42	2,226
Family counsellor	—	25	48	101	58	15	247
Family support worker	40	52	64	42	25	6	229
<i>Total</i>	<i>145</i>	<i>572</i>	<i>747</i>	<i>806</i>	<i>369</i>	<i>63</i>	<i>2,702</i>
<b>Disability workers</b>							
Special needs teacher	23	200	334	480	170	28	1,235
Teacher of the hearing-impaired	—	18	19	41	18	—	96
Teacher of the sight-impaired	—	9	6	19	15	3	52
Special education teacher, nec	3	38	35	72	27	12	187
Residential care officer	50	211	248	220	75	6	810
Disabilities services officer	78	367	592	553	202	14	1,806
Integration aide	92	121	140	132	40	—	525
<i>Total</i>	<i>246</i>	<i>964</i>	<i>1,374</i>	<i>1,517</i>	<i>547</i>	<i>63</i>	<i>4,711</i>
<b>Aged or disabled care</b>							
Aged or disabled person carer	824	1,711	1,985	2,098	1,093	162	7,873
<b>Other community services</b>							
Welfare centre manager	3	32	107	128	60	6	336
Social worker	72	360	538	550	175	20	1,715
Community worker	160	773	1,207	1,142	378	62	3,722
Rehabilitation counsellor	20	78	106	77	18	12	311
Drug & alcohol counsellor	6	82	150	146	51	10	445
Welfare associate professional, nfd	3	29	58	38	17	6	151
Parole or probation officer	13	52	108	180	81	11	445
Refuge worker	—	12	12	12	3	3	42
Social security inspector	178	835	786	758	150	8	2,715
<i>Total</i>	<i>455</i>	<i>2,253</i>	<i>3,072</i>	<i>3,031</i>	<i>933</i>	<i>138</i>	<i>9,882</i>
<b>Total</b>	<b>3,388</b>	<b>7,266</b>	<b>8,711</b>	<b>8,574</b>	<b>3,400</b>	<b>531</b>	<b>31,870</b>

(continued)

**Table A.15 (continued): Persons employed in community services occupations: age and sex, 2001**

<b>Occupation</b>	<b>15–24</b>	<b>25–34</b>	<b>35–44</b>	<b>45–54</b>	<b>55–64</b>	<b>65+</b>	<b>Total</b>
	<b>Females</b>						
<b>Child and youth services</b>							
Child care co-ordinator	500	2,088	1,543	1,378	378	37	5,924
Pre-primary school teacher	1,531	3,936	4,216	3,284	861	58	13,886
Youth worker	604	1,269	843	503	115	23	3,357
Pre-school aide	211	551	1,827	1,584	440	27	4,640
Child care worker	14,884	10,626	8,745	6,837	1,921	236	43,249
Family day care worker	595	2,549	3,805	2,928	889	95	10,861
Nanny	2,477	1,299	497	504	326	79	5,182
Hostel parent	130	247	226	272	189	36	1,100
Child or youth residential care assistant	57	89	103	85	24	3	361
Children's care workers, nfd	1,714	1,430	1,423	1,355	449	66	6,437
<i>Total</i>	<i>22,703</i>	<i>24,084</i>	<i>23,228</i>	<i>18,730</i>	<i>5,592</i>	<i>660</i>	<i>94,997</i>
<b>Family services</b>							
Welfare worker	552	1,695	1,793	1,984	673	66	6,763
Family counsellor	18	177	268	371	188	36	1,058
Family support worker	74	246	386	326	112	14	1,158
<i>Total</i>	<i>644</i>	<i>2,118</i>	<i>2,447</i>	<i>2,681</i>	<i>973</i>	<i>116</i>	<i>8,979</i>
<b>Disability workers</b>							
Special needs teacher	310	1,420	2,305	3,292	1,028	79	8,434
Teacher of the hearing-impaired	13	127	200	328	81	3	752
Teacher of the sight-impaired	3	31	58	86	25	3	206
Special education teacher, nec	28	115	132	175	79	18	547
Residential care officer	185	530	624	482	192	8	2,021
Disabilities services officer	382	1,251	1,212	1,134	408	26	4,413
Integration aide	474	1,033	4,412	3,236	680	27	9,862
<i>Total</i>	<i>1,395</i>	<i>4,507</i>	<i>8,943</i>	<i>8,733</i>	<i>2,493</i>	<i>164</i>	<i>26,235</i>
<b>Aged or disabled care</b>							
Aged or disabled person carer	3,621	6,121	11,563	15,405	6,569	638	43,917
<b>Other community services</b>							
Welfare centre manager	7	80	139	183	82	6	497
Social worker	482	1,983	1,993	2,172	709	76	7,415
Community worker	598	2,873	4,219	4,208	1,363	123	13,384
Rehabilitation counsellor	135	410	348	247	68	—	1,208
Drug & alcohol counsellor	39	197	167	173	51	6	633
Welfare associate professional, nfd	24	75	105	120	38	3	365
Parole or probation officer	56	174	155	200	77	3	665
Refuge worker	22	70	97	95	42	4	330
Social security inspector	604	2,297	1,999	1,425	255	7	6,587
<i>Total</i>	<i>1,967</i>	<i>8,159</i>	<i>9,222</i>	<i>8,823</i>	<i>2,685</i>	<i>228</i>	<i>31,084</i>
<b>Total</b>	<b>30,330</b>	<b>44,989</b>	<b>55,403</b>	<b>54,372</b>	<b>18,312</b>	<b>1,806</b>	<b>205,212</b>

(continued)

**Table A.15 (continued): Persons employed in community services occupations: age and sex, 2001**

<b>Occupation</b>	<b>15–24</b>	<b>25–34</b>	<b>35–44</b>	<b>45–54</b>	<b>55–64</b>	<b>65+</b>	<b>Total</b>
<b>Persons</b>							
<b>Child and youth services</b>							
Child care co-ordinator	522	2,187	1,677	1,527	470	59	6,442
Pre-primary school teacher	1,550	4,017	4,317	3,345	880	61	14,170
Youth worker	944	2,200	1,682	1,042	270	39	6,177
Pre-school aide	227	560	1,839	1,593	449	27	4,695
Child care worker	15,902	11,046	8,982	6,989	2,001	271	45,191
Family day care worker	598	2,571	3,837	2,971	908	98	10,983
Nanny	2,562	1,314	506	504	335	82	5,303
Hostel parent	212	315	294	354	229	45	1,449
Child or youth residential care assistant	63	125	139	115	30	3	475
Childrens care workers, nfd	1,841	1,515	1,488	1,412	478	80	6,814
<i>Total</i>	<i>24,421</i>	<i>25,850</i>	<i>24,761</i>	<i>19,852</i>	<i>6,050</i>	<i>765</i>	<i>101,699</i>
<b>Family services</b>							
Welfare worker	657	2,190	2,428	2,647	959	108	8,989
Family counsellor	18	202	316	472	246	51	1,305
Family support worker	114	298	450	368	137	20	1,387
<i>Total</i>	<i>789</i>	<i>2,690</i>	<i>3,194</i>	<i>3,487</i>	<i>1,342</i>	<i>179</i>	<i>11,681</i>
<b>Disability workers</b>							
Special needs teacher	333	1,620	2,639	3,772	1,198	107	9,669
Teacher of the hearing-impaired	13	145	219	369	99	3	848
Teacher of the sight-impaired	3	40	64	105	40	6	258
Special education teacher, nec	31	153	167	247	106	30	734
Residential care officer	235	741	872	702	267	14	2,831
Disabilities services officer	460	1,618	1,804	1,687	610	40	6,219
Integration aide	566	1,154	4,552	3,368	720	27	10,387
<i>Total</i>	<i>1,641</i>	<i>5,471</i>	<i>10,317</i>	<i>10,250</i>	<i>3,040</i>	<i>227</i>	<i>30,946</i>
<b>Aged or disabled care</b>							
Aged or disabled person carer	4,445	7,832	13,548	17,503	7,662	800	51,790
<b>Other community services</b>							
Welfare centre manager	10	112	246	311	142	12	833
Social worker	554	2,343	2,531	2,722	884	96	9,130
Community worker	758	3,646	5,426	5,350	1,741	185	17,106
Rehabilitation counsellor	155	488	454	324	86	12	1,519
Drug & alcohol counsellor	45	279	317	319	102	16	1,078
Welfare associate professional, nfd	27	104	163	158	55	9	516
Parole or probation officer	69	226	263	380	158	14	1,110
Refuge worker	22	82	109	107	45	7	372
Social security inspector	782	3,132	2,785	2,183	405	15	9,302
<i>Total</i>	<i>2,422</i>	<i>10,412</i>	<i>12,294</i>	<i>11,854</i>	<i>3,618</i>	<i>366</i>	<i>40,966</i>
<b>Total</b>	<b>33,718</b>	<b>52,255</b>	<b>64,114</b>	<b>62,946</b>	<b>21,712</b>	<b>2,337</b>	<b>237,082</b>

Note: Does not include those whose age or sex was not stated.

Source: ABS, Census Of Population And Housing, 2001.

**Table A.16: Persons employed in selected health occupations: sex and hours worked, 2001**

Occupation	1–15	16–24	25–34	35–40	41–48	49+	Not stated <sup>(a)</sup>	Total
<b>Males</b>								
<b>Medical workers</b>								
Medical administrator	16	20	32	449	228	482	52	1,279
Generalist medical practitioner	624	620	1,047	3,391	2,547	9,781	951	18,961
Medical practitioner in training	20	25	30	277	221	794	116	1,483
Anaesthetist	36	35	57	172	224	1,013	84	1,621
Dermatologist	—	6	10	35	19	69	3	142
Emergency medicine specialist	—	3	6	63	37	90	14	213
Obstetrician & gynaecologist	16	15	12	36	36	422	29	566
Ophthalmologist	24	23	17	61	39	166	7	337
Paediatrician	13	6	11	54	52	323	12	471
Pathologist	20	40	33	153	83	231	43	603
Specialist physician	57	40	33	145	119	1,031	82	1,507
Psychiatrist	45	45	90	300	220	529	53	1,282
Radiologist	28	37	40	188	176	502	71	1,042
Surgeon	112	77	102	217	167	2,136	197	3,008
Specialist medical practitioner, nec	14	19	11	63	41	146	20	314
Specialist medical practitioner, nfd	26	27	23	87	77	306	41	587
Medical practitioner, nfd	3	9	4	48	28	108	17	217
<i>Total</i>	<i>1,054</i>	<i>1,047</i>	<i>1,558</i>	<i>5,739</i>	<i>4,314</i>	<i>18,129</i>	<i>1,792</i>	<i>33,633</i>
<b>Medical imaging workers</b>								
Medical diagnostic radiographer	39	58	59	1,002	325	288	84	1,855
Radiation therapist	—	3	9	121	29	13	13	188
Nuclear medicine technologist	—	—	—	82	26	19	—	127
Sonographer	5	8	18	175	59	40	26	331
<i>Total</i>	<i>44</i>	<i>69</i>	<i>86</i>	<i>1,380</i>	<i>439</i>	<i>360</i>	<i>123</i>	<i>2,501</i>
<b>Dental workers</b>								
Dentist	158	216	546	2,140	1,031	1,121	205	5,417
Dental specialist	14	25	53	183	116	222	31	644
Dental therapist & hygienist	—	—	3	22	6	3	3	37
Dental technician	72	76	142	936	285	768	93	2,372
Dental assistant	39	21	12	65	17	3	14	171
<i>Total</i>	<i>283</i>	<i>338</i>	<i>756</i>	<i>3,346</i>	<i>1,455</i>	<i>2,117</i>	<i>346</i>	<i>8,641</i>
<b>Nursing workers</b>								
Director of nursing/nurse manager	7	23	41	574	191	260	77	1,173
Nurse educator & researcher	7	—	15	119	27	47	23	238
Registered nurse	241	715	1,373	5,807	886	1,035	788	10,845
Registered midwife	6	11	20	62	15	20	—	134
Mental health nurse & disability nurse	30	120	165	1,488	223	250	200	2,476
Enrolled nurse	61	138	220	847	141	165	125	1,697
Nursing professional, nfd	—	3	3	33	6	11	—	56
Personal care assistant	473	625	903	3,682	341	464	617	7,105
Nursing assistant	258	402	587	1,214	131	195	267	3,054
<i>Total</i>	<i>1,083</i>	<i>2,037</i>	<i>3,327</i>	<i>13,826</i>	<i>1,961</i>	<i>2,447</i>	<i>2,097</i>	<i>26,778</i>

(continued)

**Table A.16 (continued): Persons employed in selected health occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Males</b>								
<b>Pharmacist workers</b>								
Hospital pharmacist	9	19	18	167	83	53	31	380
Industrial pharmacist	13	8	3	109	49	42	6	230
Retail pharmacist	394	341	410	1,210	1,142	2,313	265	6,075
<i>Total</i>	<i>416</i>	<i>368</i>	<i>431</i>	<i>1,486</i>	<i>1,274</i>	<i>2,408</i>	<i>302</i>	<i>6,685</i>
<b>Allied health workers</b>								
Occupational therapist	12	7	27	201	52	40	25	364
Optometrist	59	53	99	468	448	411	51	1,589
Physiotherapist	97	99	199	956	453	846	114	2,764
Speech pathologist	4	6	6	51	13	9	19	108
Podiatrist	25	23	76	210	118	211	17	680
Dietitian	7	23	16	68	21	40	6	181
Audiologist	6	6	13	83	22	38	—	168
Orthoptist	4	3	6	21	7	13	4	58
Orthotist	9	12	15	151	35	58	2	282
Health professional, nec	44	17	28	65	10	23	12	199
Clinical psychologist	158	122	204	782	280	507	92	2,145
Therapy aide	51	36	34	123	3	9	5	261
<i>Total</i>	<i>476</i>	<i>407</i>	<i>723</i>	<i>3,179</i>	<i>1,462</i>	<i>2,205</i>	<i>347</i>	<i>8,799</i>
<b>Complementary therapies</b>								
Chiropractor	82	91	296	462	189	316	74	1,510
Osteopath	14	18	39	85	29	48	2	235
Naturopath	82	62	93	152	71	131	29	620
Acupuncturist	55	25	56	99	45	75	22	377
Natural therapy professional, nec	31	31	32	51	29	47	18	239
Natural remedy consultant	212	103	72	89	38	57	52	623
<i>Total</i>	<i>476</i>	<i>330</i>	<i>588</i>	<i>938</i>	<i>401</i>	<i>674</i>	<i>197</i>	<i>3,604</i>
<b>Other health workers</b>								
Medical scientist	103	99	112	1,964	655	829	158	3,920
Biomedical engineer	—	3	10	215	99	107	33	467
Health information manager	—	6	—	49	22	18	14	109
Environmental health officer	36	64	59	1,232	301	207	121	2,020
Medical technical officers	207	180	191	1,846	421	367	195	3,407
Ambulance officer	35	42	57	899	583	644	270	2,530
Intensive care paramedic	13	36	51	790	844	764	337	2,835
Indigenous health worker	17	37	21	165	9	21	10	280
Occupational health & safety officer	44	48	65	734	361	528	83	1,863
Massage therapist	387	187	224	224	56	143	69	1,290
Primary products inspector	49	115	130	1,068	405	319	187	2,273
Anatomist or physiologist	25	14	25	67	40	56	12	239
Safety inspector	117	98	131	1,516	714	995	209	3,780
Admissions clerk	18	11	29	197	25	23	28	331
Weight loss consultant	—	6	—	3	—	—	9	18
<i>Total</i>	<i>1,051</i>	<i>946</i>	<i>1,105</i>	<i>10,969</i>	<i>4,535</i>	<i>5,021</i>	<i>1,735</i>	<i>25,362</i>
<b>Total</b>	<b>4,883</b>	<b>5,542</b>	<b>8,574</b>	<b>40,863</b>	<b>15,841</b>	<b>33,361</b>	<b>6,939</b>	<b>116,003</b>

(continued)

**Table A.16 (continued): Persons employed in selected health occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Females</b>								
<b>Medical workers</b>								
Medical administrator	71	137	209	959	371	544	160	2,451
Generalist medical practitioner	1,010	1,325	1,646	2,192	1,019	2,375	598	10,165
Medical practitioner in training	35	49	51	282	200	543	103	1,263
Anaesthetist	17	42	66	104	68	181	41	519
Dermatologist	9	10	15	25	8	22	8	97
Emergency medicine specialist	3	9	10	35	25	20	4	106
Obstetrician & gynaecologist	6	4	6	28	18	125	39	226
Ophthalmologist	9	8	12	20	12	25	5	91
Paediatrician	19	39	28	55	38	107	38	324
Pathologist	37	56	74	198	55	88	45	553
Specialist physician	40	42	44	81	53	149	24	433
Psychiatrist	42	99	107	191	105	130	55	729
Radiologist	17	34	33	81	48	102	17	332
Surgeon	8	15	21	42	22	143	16	267
Specialist medical practitioner, nec	6	14	13	58	28	50	28	197
Specialist medical practitioner, nfd	21	28	36	85	28	100	13	311
Medical practitioner, nfd	13	12	8	32	12	32	—	109
<i>Total</i>	<i>1,363</i>	<i>1,923</i>	<i>2,379</i>	<i>4,468</i>	<i>2,110</i>	<i>4,736</i>	<i>1,194</i>	<i>18,173</i>
<b>Medical imaging workers</b>								
Medical diagnostic radiographer	348	506	513	1,462	361	204	208	3,602
Radiation therapist	42	79	36	320	72	24	26	599
Nuclear medicine technologist	17	46	30	141	49	18	4	305
Sonographer	116	178	208	412	87	33	70	1,104
<i>Total</i>	<i>523</i>	<i>809</i>	<i>787</i>	<i>2,335</i>	<i>569</i>	<i>279</i>	<i>308</i>	<i>5,610</i>
<b>Dental workers</b>								
Dentist	193	274	343	721	190	147	97	1,965
Dental specialist	21	21	31	48	16	26	4	167
Dental therapist & hygienist	165	378	274	585	56	22	95	1,575
Dental technician	54	66	61	274	52	52	32	591
Dental associate professional, nfd	—	—	5	2	—	2	—	9
Dental assistant	1,495	1,977	1,846	5,385	1,177	333	701	12,914
<i>Total</i>	<i>1,928</i>	<i>2,716</i>	<i>2,560</i>	<i>7,015</i>	<i>1,491</i>	<i>582</i>	<i>929</i>	<i>17,221</i>
<b>Nursing workers</b>								
Director of nursing/nurse manager	144	618	875	3,476	1,343	1,793	655	8,904
Nurse educator & researcher	139	386	366	865	258	219	162	2,395
Registered nurse	9,249	26,645	27,304	43,355	6,777	6,718	11,291	131,339
Registered midwife	854	3,065	2,613	2,976	437	382	1,191	11,518
Mental health nurse & disability nurse	167	718	617	2,112	289	270	442	4,615
Enrolled nurse	1,305	3,724	3,958	5,837	666	695	1,625	17,810
Nursing professional, nfd	34	88	106	199	59	47	53	586
Personal care assistant	3,121	4,285	5,547	4,755	559	779	1,733	20,779
Nursing assistant	2,240	3,951	5,276	4,996	535	973	1,761	19,732
<i>Total</i>	<i>17,253</i>	<i>43,480</i>	<i>46,662</i>	<i>68,571</i>	<i>10,923</i>	<i>11,876</i>	<i>18,913</i>	<i>217,678</i>

(continued)

**Table A.16 (continued): Persons employed in selected health occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Females</b>								
<b>Pharmacist workers</b>								
Hospital pharmacist	61	159	117	351	183	71	59	1,001
Industrial pharmacist	14	19	23	118	39	26	7	246
Retail pharmacist	806	740	845	1,580	913	810	273	5,967
<i>Total</i>	<i>881</i>	<i>918</i>	<i>985</i>	<i>2,049</i>	<i>1,135</i>	<i>907</i>	<i>339</i>	<i>7,214</i>
<b>Allied health workers</b>								
Occupational therapist	466	773	673	1,955	537	288	275	4,967
Optometrist	138	112	176	382	166	83	49	1,106
Physiotherapist	1,185	1,241	1,161	2,181	702	611	397	7,478
Speech pathologist	347	445	419	965	354	195	178	2,903
Podiatrist	151	161	172	294	126	122	61	1,087
Dietitian	192	289	233	711	173	109	106	1,813
Audiologist	55	94	81	215	82	55	45	627
Orthoptist	50	70	71	115	41	11	25	383
Orthotist	5	8	4	46	3	7	24	97
Health professional, nec	327	486	616	611	69	84	117	2,310
Clinical psychologist	705	742	766	1,768	525	581	340	5,427
Therapy aide	553	577	583	475	68	46	158	2,460
<i>Total</i>	<i>4,174</i>	<i>4,998</i>	<i>4,955</i>	<i>9,718</i>	<i>2,846</i>	<i>2,192</i>	<i>1,775</i>	<i>30,658</i>
<b>Complementary therapies</b>								
Chiropractor	64	60	157	138	46	51	37	553
Osteopath	11	16	46	55	14	28	7	177
Naturopath	452	302	353	378	125	185	95	1,890
Acupuncturist	71	56	48	62	25	27	26	315
Natural therapy professional, nec	64	49	60	49	19	22	22	285
Natural remedy consultant	754	249	252	183	63	107	101	1,709
<i>Total</i>	<i>1,416</i>	<i>732</i>	<i>916</i>	<i>865</i>	<i>292</i>	<i>420</i>	<i>288</i>	<i>4,929</i>
<b>Other health workers</b>								
Medical scientist	436	873	748	3,139	927	672	389	7,184
Biomedical engineer	—	3	—	18	13	—	12	46
Health information manager	30	82	85	353	104	73	35	762
Environmental health officer	46	126	122	666	126	97	93	1,276
Medical technical officers	988	1,732	1,659	4,313	824	429	593	10,538
Ambulance officer	28	43	38	195	172	151	76	703
Intensive care paramedic	11	32	26	153	200	126	78	626
Indigenous health worker	49	62	48	359	19	45	53	635
Occupational health & safety officer	65	138	152	698	268	192	83	1,596
Massage therapist	1,435	596	579	442	114	169	283	3,618
Primary products inspector	27	66	74	267	69	48	50	601
Anatomist or physiologist	26	37	34	97	35	42	7	278
Safety inspector	48	64	55	319	109	132	56	783
Admissions clerk	310	608	636	1,720	150	141	243	3,808
Weight loss consultant	330	119	102	151	14	15	20	751
<i>Total</i>	<i>3,829</i>	<i>4,581</i>	<i>4,358</i>	<i>12,890</i>	<i>3,144</i>	<i>2,332</i>	<i>2,071</i>	<i>33,205</i>
<b>Total</b>	<b>31,367</b>	<b>60,157</b>	<b>63,602</b>	<b>107,911</b>	<b>22,510</b>	<b>23,324</b>	<b>25,817</b>	<b>334,688</b>

(continued)

**Table A.16 (continued): Persons employed in selected health occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Persons</b>								
<b>Medical workers</b>								
Medical administrator	87	157	241	1,408	599	1,026	212	3,730
Generalist medical practitioner	1,634	1,945	2,693	5,583	3,566	12,156	1,549	29,126
Medical practitioner in training	55	74	81	559	421	1,337	219	2,746
Anaesthetist	53	77	123	276	292	1,194	125	2,140
Dermatologist	9	16	25	60	27	91	11	239
Emergency medicine specialist	3	12	16	98	62	110	18	319
Obstetrician & gynaecologist	22	19	18	64	54	547	68	792
Ophthalmologist	33	31	29	81	51	191	12	428
Paediatrician	32	45	39	109	90	430	50	795
Pathologist	57	96	107	351	138	319	88	1,156
Specialist physician	97	82	77	226	172	1,180	106	1,940
Psychiatrist	87	144	197	491	325	659	108	2,011
Radiologist	45	71	73	269	224	604	88	1,374
Surgeon	120	92	123	259	189	2,279	213	3,275
Specialist medical practitioner, nec	20	33	24	121	69	196	48	511
Specialist medical practitioner, nfd	47	55	59	172	105	406	54	898
Medical practitioner, nfd	17	21	12	82	40	141	13	326
<i>Total</i>	<i>2,418</i>	<i>2,970</i>	<i>3,937</i>	<i>10,209</i>	<i>6,424</i>	<i>22,866</i>	<i>2,982</i>	<i>51,806</i>
<b>Medical imaging workers</b>								
Medical diagnostic radiographer	387	564	572	2,464	686	492	292	5,457
Radiation therapist	42	82	45	441	101	37	39	787
Nuclear medicine technologist	17	46	30	224	76	38	1	432
Sonographer	121	186	226	587	146	73	96	1,435
<i>Total</i>	<i>567</i>	<i>878</i>	<i>873</i>	<i>3,716</i>	<i>1,009</i>	<i>640</i>	<i>428</i>	<i>8,111</i>
<b>Dental workers</b>								
Dentist	351	490	889	2,861	1,221	1,268	302	7,382
Dental specialist	35	46	84	231	132	248	35	811
Dental therapist & hygienist	165	378	277	607	62	25	98	1,612
Dental technician	126	142	203	1,210	337	820	125	2,963
Dental associate professional, nfd	—	—	5	2	—	2	—	9
Dental assistant	1,534	1,998	1,858	5,450	1,194	336	715	13,085
<i>Total</i>	<i>2,211</i>	<i>3,054</i>	<i>3,316</i>	<i>10,361</i>	<i>2,946</i>	<i>2,699</i>	<i>1,275</i>	<i>25,862</i>
<b>Nursing workers</b>								
Director of nursing/nurse manager	151	641	916	4,050	1,534	2,053	732	10,077
Nurse educator & researcher	146	386	381	984	285	266	185	2,633
Registered nurse	9,490	27,360	28,677	49,162	7,663	7,753	12,079	142,184
Registered midwife	860	3,076	2,634	3,039	452	402	1,189	11,652
Mental health nurse & disability nurse	197	838	782	3,600	512	520	642	7,091
Enrolled nurse	1,366	3,862	4,178	6,684	807	860	1,750	19,507
Nursing professional, nfd	34	91	109	232	65	58	53	642
Personal care assistant	3,594	4,910	6,450	8,437	900	1,243	2,350	27,884
Nursing assistant	2,498	4,353	5,863	6,210	666	1,168	2,028	22,786
<i>Total</i>	<i>18,336</i>	<i>45,517</i>	<i>49,990</i>	<i>82,398</i>	<i>12,884</i>	<i>14,323</i>	<i>21,008</i>	<i>244,456</i>

(continued)



**Table A.16 (continued): Persons employed in selected health occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Persons</b>								
<b>Pharmacist workers</b>								
Hospital pharmacist	70	178	135	518	266	124	90	1,381
Industrial pharmacist	27	27	26	227	88	68	13	476
Retail pharmacist	1,200	1,081	1,255	2,790	2,055	3,123	538	12,042
<i>Total</i>	<i>1,297</i>	<i>1,286</i>	<i>1,416</i>	<i>3,535</i>	<i>2,409</i>	<i>3,315</i>	<i>641</i>	<i>13,899</i>
<b>Allied health workers</b>								
Occupational therapist	478	780	700	2,156	589	328	300	5,331
Optometrist	197	165	275	850	614	494	100	2,695
Physiotherapist	1,282	1,340	1,360	3,137	1,155	1,457	511	10,242
Speech pathologist	351	451	425	1,016	367	204	197	3,011
Podiatrist	176	184	248	504	244	333	78	1,767
Dietitian	199	312	249	779	194	149	112	1,994
Audiologist	61	100	94	301	105	94	40	795
Orthoptist	54	73	77	136	48	24	29	441
Orthotist	14	20	19	197	38	65	26	379
Health professional, nec	371	503	644	676	79	107	129	2,509
Clinical psychologist	863	864	970	2,550	805	1,088	432	7,572
Therapy aide	604	613	617	598	71	55	163	2,721
<i>Total</i>	<i>4,650</i>	<i>5,405</i>	<i>5,678</i>	<i>12,900</i>	<i>4,309</i>	<i>4,398</i>	<i>2,117</i>	<i>39,457</i>
<b>Complementary therapies</b>								
Chiropractor	146	151	453	600	235	367	111	2,063
Osteopath	25	34	85	140	43	76	9	412
Naturopath	534	364	446	530	196	316	124	2,510
Acupuncturist	126	81	104	161	70	102	48	692
Natural therapy professional, nec	95	80	92	100	48	69	40	524
Natural remedy consultant	966	352	324	272	101	164	153	2,332
<i>Total</i>	<i>1,892</i>	<i>1,062</i>	<i>1,504</i>	<i>1,803</i>	<i>693</i>	<i>1,094</i>	<i>485</i>	<i>8,533</i>
<b>Other health workers</b>								
Medical scientist	539	972	860	5,103	1,582	1,501	547	11,104
Biomedical engineer	—	6	10	233	112	107	45	513
Health information manager	30	88	85	402	126	91	49	871
Environmental health officer	82	190	181	1,898	427	304	214	3,296
Medical technical officer	1,195	1,912	1,850	6,159	1,245	796	788	13,945
Ambulance officer	63	85	95	1,094	755	795	346	3,233
Intensive care paramedic	24	68	77	943	1,044	890	415	3,461
Indigenous health worker	66	99	69	524	28	66	63	915
Occupational health & safety officer	109	186	217	1,432	629	720	166	3,459
Massage therapist	1,822	783	803	666	170	312	352	4,908
Primary products inspector	76	181	204	1,335	474	367	237	2,874
Anatomist or physiologist	51	51	59	164	75	98	19	517
Safety inspector	165	162	186	1,835	823	1,127	265	4,563
Admissions clerk	328	619	665	1,917	175	164	271	4,139
Weight loss consultant	330	125	102	154	14	15	29	769
<i>Total</i>	<i>4,880</i>	<i>5,527</i>	<i>5,463</i>	<i>23,859</i>	<i>7,679</i>	<i>7,353</i>	<i>3,806</i>	<i>58,567</i>
<b>Total</b>	<b>36,251</b>	<b>65,699</b>	<b>72,177</b>	<b>148,781</b>	<b>38,353</b>	<b>56,688</b>	<b>32,742</b>	<b>450,691</b>

(a) Includes those who were on leave and worked zero hours.

Source: ABS, Census Of Population And Housing, 2001.

**Table A.17: Persons employed in community services occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Males</b>								
<b>Child and youth services</b>								
Child care co-ordinator	30	39	49	148	59	168	25	518
Pre-primary school teacher	13	22	40	97	50	51	11	284
Youth worker	179	245	285	1,269	290	338	214	2,820
Pre-school aide	15	6	12	11	—	3	8	55
Child care worker	823	237	214	364	70	93	141	1,942
Family day care worker	21	9	12	25	6	47	2	122
Nanny	77	6	7	3	6	6	16	121
Hostel parent	43	34	23	72	35	112	30	349
Child or youth residential care assistant	9	5	9	56	7	17	11	114
Children's care worker, nfd	104	56	36	83	12	54	56	401
<i>Total</i>	<i>1,314</i>	<i>659</i>	<i>687</i>	<i>2,128</i>	<i>535</i>	<i>889</i>	<i>514</i>	<i>6,726</i>
<b>Family services</b>								
Welfare worker	102	150	231	1,103	262	200	178	2,226
Family counsellor	25	22	36	96	17	33	18	247
Family support worker	32	65	24	68	16	16	8	229
<i>Total</i>	<i>159</i>	<i>237</i>	<i>291</i>	<i>1,267</i>	<i>295</i>	<i>249</i>	<i>204</i>	<i>2,702</i>
<b>Disability workers</b>								
Special needs teacher	67	52	160	531	178	173	74	1,235
Teacher of the hearing-impaired	7	6	17	32	14	12	8	96
Teacher of the sight-impaired	3	3	9	23	9	3	2	52
Special education teacher, nec	23	10	22	72	18	28	14	187
Residential care officer	48	60	84	398	69	79	72	810
Disabilities services officer	53	99	158	1,013	162	182	139	1,806
Integration aide	92	86	180	101	20	23	23	525
<i>Total</i>	<i>293</i>	<i>316</i>	<i>630</i>	<i>2,170</i>	<i>470</i>	<i>500</i>	<i>332</i>	<i>4,711</i>
<b>Aged or disabled care</b>								
Aged or disabled person carer	1,152	1,041	1,505	2,418	448	728	581	7,873
<b>Other community services</b>								
Welfare centre manager	—	12	9	142	68	86	19	336
Social worker	53	95	129	953	231	146	108	1,715
Community worker	166	234	284	1,777	498	571	192	3,722
Rehabilitation counsellor	6	11	27	147	52	58	10	311
Drug & alcohol counsellor	16	30	30	261	36	47	25	445
Welfare associate professional, nfd	12	18	13	62	12	25	9	151
Parole or probation officer	15	19	19	257	74	37	24	445
Refuge worker	3	3	6	12	8	3	7	42
Social security inspector	48	68	159	1,771	386	99	184	2,715
<i>Total</i>	<i>319</i>	<i>490</i>	<i>676</i>	<i>5,382</i>	<i>1,365</i>	<i>1,072</i>	<i>578</i>	<i>9,882</i>
<b>Total</b>	<b>3,237</b>	<b>2,743</b>	<b>3,789</b>	<b>13,365</b>	<b>3,113</b>	<b>3,438</b>	<b>2,209</b>	<b>31,894</b>

(continued)

**Table A.17 (continued): Persons employed in community services occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Females</b>								
<b>Child and youth services</b>								
Child care co-ordinator	361	659	997	2,145	666	799	297	5,924
Pre-primary school teacher	1,364	2,074	1,911	5,296	1,474	1,101	666	13,886
Youth worker	334	395	476	1,328	288	275	261	3,357
Pre-school aide	1,136	1,045	1,338	783	61	73	204	4,640
Child care worker	9,680	6,877	6,920	14,737	1,432	1,179	2,421	43,246
Family day care worker	668	788	1,232	2,285	1,721	3,545	622	10,861
Nanny	1,705	632	650	760	390	636	409	5,182
Hostel parent	132	107	77	203	94	313	174	1,100
Child or youth residential care assistant	30	51	66	120	34	26	34	361
Children's care worker, nfd	1,295	970	880	1,817	299	648	524	6,433
<i>Total</i>	<i>16,705</i>	<i>13,598</i>	<i>14,547</i>	<i>29,474</i>	<i>6,459</i>	<i>8,595</i>	<i>5,612</i>	<i>94,990</i>
<b>Family services</b>								
Welfare worker	545	927	997	2,690	661	440	503	6,763
Family counsellor	157	186	206	318	65	46	80	1,058
Family support worker	174	240	224	363	56	44	57	1,158
<i>Total</i>	<i>876</i>	<i>1,353</i>	<i>1,427</i>	<i>3,371</i>	<i>782</i>	<i>530</i>	<i>640</i>	<i>8,979</i>
<b>Disability workers</b>								
Special needs teacher	910	1,113	1,372	2,732	969	877	461	8,434
Teacher of the hearing-impaired	74	94	125	242	85	79	53	752
Teacher of the sight-impaired	6	27	29	79	34	4	27	206
Special education teacher, nec	84	61	88	148	57	69	40	547
Residential care officer	139	235	308	837	142	175	185	2,021
Disabilities services officer	307	539	689	1,863	329	316	370	4,413
Integration aide	2,139	2,907	3,154	1,038	146	130	348	9,862
<i>Total</i>	<i>3,659</i>	<i>4,976</i>	<i>5,765</i>	<i>6,939</i>	<i>1,762</i>	<i>1,650</i>	<i>1,484</i>	<i>26,235</i>
<b>Aged or disabled care</b>								
Aged or disabled person carer	9,753	9,681	10,275	7,355	1,284	2,081	3,482	43,911
<b>Other community services</b>								
Welfare centre manager	15	25	40	203	87	105	22	497
Social worker	409	983	1,028	3,246	760	454	535	7,415
Community worker	972	1,686	2,082	5,432	1,399	1,001	812	13,384
Rehabilitation counsellor	66	150	157	543	123	100	69	1,208
Drug & alcohol counsellor	42	78	74	300	64	44	31	633
Welfare associate professional, nfd	41	52	65	132	20	25	30	365
Parole or probation officer	11	43	41	327	120	60	63	665
Refuge worker	37	57	69	89	25	19	34	330
Social security inspector	150	479	770	3,569	821	221	577	6,587
<i>Total</i>	<i>1,743</i>	<i>3,553</i>	<i>4,326</i>	<i>13,841</i>	<i>3,419</i>	<i>2,029</i>	<i>2,173</i>	<i>31,084</i>
<b>Total</b>	<b>32,736</b>	<b>33,161</b>	<b>36,340</b>	<b>60,980</b>	<b>13,706</b>	<b>14,885</b>	<b>13,391</b>	<b>205,199</b>

(continued)

**Table A.17 (continued): Persons employed in community services occupations: sex and hours worked, 2001**

Occupation	1-15	16-24	25-34	35-40	41-48	49+	Not stated <sup>(a)</sup>	Total
<b>Persons</b>								
<b>Child and youth services</b>								
Child care co-ordinator	391	698	1,046	2,293	725	967	322	6,442
Pre-primary school teacher	1,377	2,096	1,951	5,393	1,524	1,152	677	14,170
Youth worker	513	640	761	2,597	578	613	475	6,177
Pre-school aide	1,151	1,051	1,350	794	61	76	212	4,695
Child care worker	10,503	7,114	7,134	15,101	1,502	1,272	2,562	45,188
Family day care worker	689	797	1,244	2,310	1,727	3,592	624	10,983
Nanny	1,782	638	657	763	396	642	425	5,303
Hostel parent	175	141	100	275	129	425	204	1,449
Child or youth residential care assistant	39	56	75	176	41	43	45	475
Children's care worker, nfd	1,399	1,026	916	1,900	311	702	580	6,834
<i>Total</i>	<i>18,019</i>	<i>14,257</i>	<i>15,234</i>	<i>30,602</i>	<i>6,994</i>	<i>9,484</i>	<i>6,126</i>	<i>101,716</i>
<b>Family services</b>								
Welfare worker	647	1,077	1,228	3,793	923	640	681	8,989
Family counsellor	182	208	242	414	82	79	98	1,305
Family support worker	206	305	248	431	72	60	65	1,387
<i>Total</i>	<i>1,035</i>	<i>1,590</i>	<i>1,718</i>	<i>4,638</i>	<i>1,077</i>	<i>779</i>	<i>844</i>	<i>11,681</i>
<b>Disability workers</b>								
Special needs teacher	977	1,165	1,532	3,263	1,147	1,050	535	9,669
Teacher of the hearing-impaired	81	100	142	274	99	91	61	848
Teacher of the sight-impaired	9	30	38	102	43	7	29	258
Special education teacher, nec	107	71	110	220	75	97	54	734
Residential care officer	187	295	392	1,235	211	254	257	2,831
Disabilities services officer	360	638	847	2,876	491	498	509	6,219
Integration aide	2,231	2,993	3,334	1,139	166	153	371	10,387
<i>Total</i>	<i>3,952</i>	<i>5,292</i>	<i>6,395</i>	<i>9,109</i>	<i>2,232</i>	<i>2,150</i>	<i>1,816</i>	<i>30,946</i>
<b>Aged or disabled care</b>								
Aged or disabled person carer	10,905	10,722	11,780	9,773	1,732	2,809	4,063	51,784
<b>Other community services</b>								
Welfare centre manager	15	37	49	345	155	191	41	833
Social worker	462	1,078	1,157	4,199	991	600	643	9,130
Community worker	1,138	1,920	2,366	7,209	1,897	1,572	1,004	17,106
Rehabilitation counsellor	72	161	184	690	175	158	79	1,519
Drug & alcohol counsellor	58	108	104	561	100	91	56	1,078
Welfare associate professional, nfd	53	70	78	194	32	50	39	516
Parole or probation officer	26	62	60	584	194	97	87	1,110
Refuge worker	40	60	75	101	33	22	41	372
Social security inspector	198	547	929	5,340	1,207	320	761	9,302
<i>Total</i>	<i>2,062</i>	<i>4,043</i>	<i>5,002</i>	<i>19,223</i>	<i>4,784</i>	<i>3,101</i>	<i>2,751</i>	<i>40,966</i>
<b>Total</b>	<b>35,973</b>	<b>35,904</b>	<b>40,129</b>	<b>74,345</b>	<b>16,819</b>	<b>18,323</b>	<b>15,600</b>	<b>237,093</b>

(a) Includes those who were on leave and worked zero hours.

Source: ABS, Census of Population and Housing, 2001.

**Table A.18: Persons employed in selected<sup>(a)</sup> health occupations: Indigenous status, 2001**

<b>Occupation</b>	<b>Indigenous</b>	<b>Non-Indigenous</b>	<b>Not stated</b>	<b>Total</b>	<b>Per cent Indigenous</b>
<b>Medical workers</b>					
Medical administrator	61	3,652	8	3,721	1.6
Generalist medical practitioner	44	28,988	97	29,129	0.2
Medical practitioner in training	10	2,739	9	2,758	0.4
Emergency medicine specialist	3	324	—	327	0.9
Obstetrician & gynaecologist	4	790	—	794	0.5
Pathologist	3	1,139	6	1,148	0.3
Specialist physician	3	1,923	8	1,934	0.2
Psychiatrist	7	1,996	7	2,010	0.3
Radiologist	3	1,365	9	1,377	0.2
Surgeon	9	3,240	20	3,269	0.3
Medical practitioner, nfd	4	330	3	337	1.2
<i>Total</i>	<i>151</i>	<i>46,486</i>	<i>167</i>	<i>46,804</i>	<i>0.3</i>
<b>Medical imaging workers</b>					
Medical diagnostic radiographer	10	5,432	26	5,468	0.2
Sonographer	4	1,425	3	1,432	0.3
<i>Total</i>	<i>14</i>	<i>6,857</i>	<i>29</i>	<i>6,900</i>	<i>0.2</i>
<b>Dental workers</b>					
Dentist	13	7,338	30	7,381	0.2
Dental therapist	5	1,176	—	1,181	0.4
Dental hygienist	3	432	3	438	0.7
Dental technician	9	2,929	18	2,956	0.3
Dental assistant	125	12,900	71	13,096	1.0
<i>Total</i>	<i>155</i>	<i>24,775</i>	<i>122</i>	<i>25,052</i>	<i>0.6</i>
<b>Nursing workers</b>					
Director of nursing	9	2,656	13	2,678	0.3
Nurse manager	29	7,341	21	7,391	0.4
Nurse educator	7	1,895	6	1,908	0.4
Nurse researcher	4	701	—	705	0.6
Registered nurse	789	140,688	725	142,202	0.6
Registered midwife	40	11,574	35	11,649	0.3
Registered mental health nurse	32	6,435	26	6,493	0.5
Registered developmental disability nurse	6	603	—	609	1.0
Nursing professional, nfd	5	623	3	631	0.8
Enrolled nurse	202	19,198	98	19,498	1.0
Personal care assistant	396	27,224	263	27,883	1.4
Nursing assistant	397	22,156	219	22,772	1.7
<i>Total</i>	<i>1,916</i>	<i>241,094</i>	<i>1,409</i>	<i>244,419</i>	<i>0.8</i>
<b>Pharmacist workers</b>					
Retail pharmacist	10	11,997	39	12,046	0.1
<i>Total</i>	<i>10</i>	<i>11,997</i>	<i>39</i>	<i>12,046</i>	<i>0.1</i>

(continued)

**Table A.18 (continued): Persons employed in selected<sup>(a)</sup> health occupations: Indigenous status, 2001**

<b>Occupation</b>	<b>Indigenous</b>	<b>Non-Indigenous</b>	<b>Not stated</b>	<b>Total</b>	<b>Per cent Indigenous</b>
<b>Allied health workers</b>					
Occupational therapist	7	5,319	17	5,343	0.1
Optometrist	5	2,686	7	2,698	0.2
Physiotherapist	29	10,192	27	10,248	0.3
Speech pathologist	4	2,987	6	2,997	0.1
Podiatrist	8	1,749	6	1,763	0.5
Dietitian	18	1,975	8	2,001	0.9
Audiologist	6	791	4	801	0.7
Health professional, nec	22	2,464	20	2,506	0.9
Clinical psychologist	19	7,519	32	7,570	0.3
Therapy aide	15	2,695	8	2,718	0.6
<i>Total</i>	<i>133</i>	<i>38,377</i>	<i>135</i>	<i>38,645</i>	<i>0.3</i>
<b>Complementary therapies</b>					
Chiropractor	4	2,060	9	2,073	0.2
Naturopath	8	2,489	17	2,514	0.3
Natural remedy consultant	12	2,311	16	2,339	0.5
<i>Total</i>	<i>24</i>	<i>6,860</i>	<i>42</i>	<i>6,926</i>	<i>0.3</i>
<b>Other health</b>					
Medical scientist	16	11,061	31	11,108	0.1
Health information manager	4	876	—	880	0.5
Occupational health & safety officer	25	3,426	13	3,464	0.7
Environmental health officer	114	3,172	16	3,302	3.5
Medical technical officer	71	13,797	64	13,932	0.5
Ambulance officer	51	3,173	16	3,240	1.6
Intensive care ambulance paramedic	32	3,424	10	3,466	0.9
Indigenous health worker	853	59	3	915	93.2
Massage therapist	28	4,863	30	4,921	0.6
Primary products inspector	56	2,789	22	2,867	2.0
Anatomist or physiologist	3	511	—	514	0.6
Safety inspectors	38	4,512	14	4,564	0.8
Admissions clerk	45	4,075	17	4,137	1.1
Weight loss consultant	3	765	3	771	0.4
<i>Total</i>	<i>1,339</i>	<i>56,503</i>	<i>239</i>	<i>58,081</i>	<i>2.3</i>
<b>Total</b>	<b>3,742</b>	<b>432,949</b>	<b>2,182</b>	<b>438,873</b>	<b>0.9</b>

(a) Includes only those occupations in which some Indigenous people were employed.

Source: ABS, Census of Population and Housing, 2001.

**Table A.19: Persons employed in community services occupations: Indigenous status, 2001**

Occupation	Indigenous	Non-Indigenous	Not stated	Total	Per cent Indigenous
<b>Child and youth services</b>					
Child care co-ordinator	70	6,342	28	6,440	1.1
Pre-primary school teacher	131	13,993	43	14,167	0.9
Youth worker	435	5,695	38	6,168	7.1
Pre-school aide	110	4,561	16	4,687	2.3
Child care worker	958	43,992	243	45,193	2.1
Family day care worker	110	10,822	54	10,986	1.0
Nanny	50	5,227	27	5,304	0.9
Hostel parent	53	1,381	15	1,449	3.7
Child or youth residential care assistant	17	463	—	480	3.5
Children's care worker, nfd	310	6,449	66	6,825	4.5
<i>Total</i>	<i>2,244</i>	<i>98,925</i>	<i>530</i>	<i>101,699</i>	<i>2.2</i>
<b>Family services</b>					
Welfare worker	430	8,508	54	8,992	4.8
Family counsellor	23	1,283	7	1,313	1.8
Family support worker	228	1,147	8	1,383	16.5
<i>Total</i>	<i>681</i>	<i>10,938</i>	<i>69</i>	<i>11,688</i>	<i>5.8</i>
<b>Disability workers</b>					
Special needs teacher	35	9,583	44	9,662	0.4
Teacher of the hearing-impaired	5	818	8	831	0.6
Teacher of the sight-impaired	—	239	—	239	—
Special education teacher, nec	116	599	3	718	16.2
Residential care officer	48	2,757	15	2,820	1.7
Disabilities service officer	59	6,132	38	6,229	0.9
Integration aide	94	10,249	45	10,388	0.9
<i>Total</i>	<i>357</i>	<i>30,377</i>	<i>153</i>	<i>30,887</i>	<i>1.2</i>
<b>Aged or disabled care</b>					
Aged or disabled person carer	1,037	50,346	406	51,789	2.0
<b>Other community services</b>					
Welfare centre manager	17	808	6	831	2.0
Social worker	166	8,926	33	9,125	1.8
Community worker	1,014	16,020	79	17,113	5.9
Rehabilitation counsellor	12	1,516	5	1,533	0.8
Drug and alcohol counsellor	96	993	5	1,094	8.8
Welfare associate professional, nfd	39	484	4	527	7.4
Parole or probation officer	42	1,064	4	1,110	3.8
Refuge worker	80	285	—	365	21.9
Social security inspector	509	8,762	32	9,303	5.5
<i>Total</i>	<i>1,975</i>	<i>38,858</i>	<i>168</i>	<i>41,001</i>	<i>4.8</i>
<b>Total</b>	<b>6,294</b>	<b>229,444</b>	<b>1,326</b>	<b>237,064</b>	<b>2.7</b>

Source: ABS, Census of Population and Housing, 2001.

**Table A.20: Persons employed in health occupations, Australia, 1996 and 2001**

<b>Occupation</b>	<b>1996</b>	<b>2001</b>	<b>Difference</b>	<b>Per cent difference</b>
<b>Medical workers</b>				
Medical administrator	1,920	3,723	1,803	93.9
Medical practitioner, nfd	143	336	193	135.0
Generalist medical practitioner	26,358	29,130	2,772	10.5
Medical practitioner in training	2,664	2,771	107	4.0
Specialist medical practitioner, nfd	976	913	-63	-6.5
Anaesthetist	1,923	2,145	222	11.5
Dermatologist	204	245	41	20.1
Emergency medicine specialist	188	327	139	73.9
Obstetrician and gynaecologist	862	801	-61	-7.1
Ophthalmologist	440	436	-4	-0.9
Paediatrician	706	800	94	13.3
Pathologist	1,688	1,151	-537	-31.8
Specialist physician	1,629	1,936	307	18.8
Psychiatrist	1,848	2,016	168	9.1
Radiologist	1,180	1,369	189	16.0
Surgeon	2,967	3,271	304	10.2
Specialist medical practitioner, nec	347	489	142	40.9
<i>Total</i>	<i>46,043</i>	<i>51,859</i>	<i>5,816</i>	<i>12.6</i>
<b>Medical imaging workers</b>				
Medical diagnostic radiographer	4,714	5,470	756	16.0
Radiation therapist	700	808	108	15.4
Nuclear medicine technologist	397	445	48	12.1
Sonographer	702	1,418	716	102.0
<i>Total</i>	<i>6,513</i>	<i>8,141</i>	<i>1,628</i>	<i>25.0</i>
<b>Dental workers</b>				
Dentist	6,878	7,386	508	7.4
Dental specialist	726	808	82	11.3
Dental associate professional, nfd	—	12	12	n.a.
Dental therapist	1,271	1,188	-83	-6.5
Dental hygienist	265	440	175	66.0
Dental technician	2,914	2,952	38	1.3
Dental assistant	11,264	13,098	1,834	16.3
<i>Total</i>	<i>23,318</i>	<i>25,884</i>	<i>2,566</i>	<i>11.0</i>
<b>Nursing workers</b>				
Director of nursing	3,137	2,677	-460	-14.7
Nursing professional, nfd	1,381	626	-755	-54.7
Nurse manager	6,178	7,392	1,214	19.7
Nurse educator	1,773	1,915	142	8.0
Nurse researcher	279	700	421	150.9
Registered nurse	133,944	142,202	8,258	6.2
Registered midwife	10,902	11,646	744	6.8
Registered mental health nurse	6,037	6,489	452	7.5
Registered developmental disability nurse	1,091	608	-483	-44.3
Enrolled nurse	24,567	19,492	-5,075	-20.7
Personal care assistant	16,705	27,883	11,178	66.9
Nursing assistant	25,941	22,775	-3,166	-12.2
<i>Total</i>	<i>231,935</i>	<i>244,405</i>	<i>12,470</i>	<i>5.4</i>

(continued)



**Table A.20 (continued): Persons employed in health occupations, Australia, 1996 and 2001**

<b>Occupation</b>	<b>1996</b>	<b>2001</b>	<b>Difference</b>	<b>Per cent difference</b>
<b>Pharmacists</b>				
Hospital pharmacist	1,728	1,389	-339	-19.6
Industrial pharmacist	705	483	-222	-31.5
Retail pharmacist	9,878	12,039	2,161	21.9
<i>Total</i>	<i>12,311</i>	<i>13,911</i>	<i>1,600</i>	<i>13.0</i>
<b>Allied health workers</b>				
Occupational therapist	4,361	5,353	992	22.7
Optometrist	2,253	2,694	441	19.6
Physiotherapist	8,898	10,246	1,348	15.1
Speech pathologist	2,336	3,005	669	28.6
Podiatrist	1,460	1,765	305	20.9
Dietitian	1,712	1,998	286	16.7
Audiologist	685	805	120	17.5
Orthoptist	348	434	86	24.7
Orthotist	331	364	33	10.0
Health professional, nec	2,103	2,512	409	19.4
Clinical psychologist	5,252	7,567	2,315	44.1
Therapy aide	1,421	2,711	1,290	90.8
<i>Total</i>	<i>31,160</i>	<i>39,454</i>	<i>8,294</i>	<i>26.6</i>
<b>Complementary therapies</b>				
Chiropractor	1,710	2,072	362	21.2
Osteopath	256	426	170	66.4
Naturopath	1,905	2,502	597	31.3
Acupuncturist	458	667	209	45.6
Natural therapy professional, nec	355	521	166	46.8
Natural remedy consultant	1,818	2,345	527	29.0
<i>Total</i>	<i>6,502</i>	<i>8,533</i>	<i>2,031</i>	<i>31.2</i>
<b>Other health workers</b>				
Anatomist or physiologist	224	512	288	128.6
Medical scientist	9,516	11,111	1,595	16.8
Health information manager	1,054	878	-176	-16.7
Medical technical officer	8,218	13,927	5,709	69.5
Ambulance officer	4,112	3,244	-868	-21.1
Intensive care ambulance paramedic	1,849	3,464	1,615	87.3
Indigenous health worker	708	926	218	30.8
Massage therapist	2,261	4,921	2,660	117.6
Admissions clerk	3,219	4,145	926	28.8
Biomedical engineer	346	512	166	48.0
Occupational health and safety officer	2,800	3,467	667	23.8
Environmental health officer	5,128	3,312	-1,816	-35.4
Primary products inspectors	2,911	2,865	-46	-1.6
Safety inspectors	3,664	4,562	898	24.5
Weight loss consultant	790	759	-31	-3.9
<i>Total</i>	<i>46,800</i>	<i>58,605</i>	<i>11,805</i>	<i>25.2</i>
<b>Total health occupations</b>	<b>404,582</b>	<b>450,792</b>	<b>46,210</b>	<b>11.4</b>

Source: ABS, Census of Population and Housing, 2001.

**Table A.21: Persons employed in community services occupations, Australia, 1996 and 2001**

<b>Occupation</b>	<b>1996</b>	<b>2001</b>	<b>Difference</b>	<b>Per cent difference</b>
<b>Child and youth services</b>				
Child care co-ordinator	7,136	6,437	-699	-9.8
Pre-primary school teacher	12,588	14,166	1,578	12.5
Youth worker	5,389	6,166	777	14.4
Pre-school aide	3,077	4,685	1,608	52.3
Child care worker	31,200	45,189	13,989	44.8
Family day care worker	16,578	10,997	-5,581	-33.7
Nanny	6,578	5,300	-1,278	-19.4
Hostel parent	1,629	1,450	-179	-11.0
Child or youth residential care assistant	3,595	487	-3,108	-86.5
Children's care workers, nfd	5,503	6,814	1,311	23.8
<i>Total</i>	<i>93,273</i>	<i>101,691</i>	<i>8,418</i>	<i>9.0</i>
<b>Family services</b>				
Welfare worker	6,226	8,985	2,759	44.3
Family counsellor	1,400	1,310	-90	-6.4
Family support worker	1,001	1,383	382	38.2
<i>Total</i>	<i>8,627</i>	<i>11,678</i>	<i>3,051</i>	<i>35.4</i>
<b>People with a disability</b>				
Special needs teacher	8,825	9,665	840	9.5
Teacher of the hearing impaired	609	830	221	36.3
Teacher of the sight impaired	254	236	-18	-7.1
Special education teacher, nec	1,013	711	-302	-29.8
Residential care officer	1,015	2,825	1,810	178.3
Disabilities services officer	4,930	6,232	1,302	26.4
Integration aide	2,877	10,396	7,519	261.3
<i>Total</i>	<i>19,523</i>	<i>30,895</i>	<i>11,372</i>	<i>58.2</i>
<b>Aged or disabled care</b>				
Aged or disabled person's carer	35,943	51,792	15,849	44.1
<b>Other community services</b>				
Welfare centre manager	983	829	-154	-15.7
Social worker	7,193	9,110	1,917	26.7
Community worker	15,804	17,113	1,309	8.3
Rehabilitation counsellor	1,206	1,532	326	27.0
Drug and alcohol counsellor	756	1,099	343	45.4
Welfare associate professional, nfd	61	527	466	763.9
Parole or probation officer	828	1,110	282	34.1
Social security inspector	2,291	9,302	7,011	306.0
Refuge worker	480	368	-112	-23.3
<i>Total</i>	<i>29,602</i>	<i>40,990</i>	<i>11,388</i>	<i>38.5</i>
<b>Total community services</b>	<b>186,968</b>	<b>237,046</b>	<b>50,078</b>	<b>26.8</b>

Source: ABS, Census of Population and Housing, 2001.

**Table A.22: Persons employed in health occupations: income<sup>(a)</sup>, 2001**

Occupation	Nil or no income	\$1– \$10,399	\$10,400 – \$20,799	\$20,800– \$41,599	\$41,600– \$77,999	\$78,000+	Not stated	Total
<b>Medical workers</b>								
Medical administrator	—	26	99	749	2,078	725	43	3,720
Generalist medical practitioner	14	101	375	2,753	9,870	15,618	372	29,103
Medical practitioner in training	—	11	21	395	1,717	597	17	2,758
Anaesthetist	—	—	5	58	265	1,802	8	2,138
Dermatologist	—	3	3	15	29	191	—	241
Emergency medicine specialist	—	—	—	12	90	221	3	326
Obstetrician & gynaecologist	—	3	4	19	103	659	8	796
Ophthalmologist	—	—	7	33	67	327	3	437
Paediatrician	3	—	6	45	234	501	6	795
Pathologist	—	16	80	228	183	621	19	1,147
Specialist physician	3	6	18	87	294	1,518	8	1,934
Psychiatrist	—	7	9	102	450	1,424	17	2,009
Radiologist	3	7	17	69	173	1,093	14	1,376
Surgeon	6	15	21	98	383	2,698	45	3,266
Specialist medical practitioner, nec	—	3	16	44	165	263	4	495
Specialist medical practitioner, nfd	—	6	14	70	280	519	14	903
Medical practitioner, nfd	—	3	7	37	133	153	4	337
<i>Total</i>	29	207	702	4,814	16,514	28,930	585	51,781
<b>Medical imaging workers</b>								
Medical diagnostic radiographer	4	82	262	1,772	2,947	334	62	5,463
Radiation therapist	—	5	31	294	443	26	6	805
Nuclear medicine technologist	—	—	13	141	266	25	4	449
Sonographer	3	20	46	305	871	174	12	1,431
<i>Total</i>	7	107	352	2,512	4,527	559	84	8,148
<b>Dental workers</b>								
Dentist	7	53	113	811	2,715	3,543	123	7,365
Dental specialist	—	11	18	75	120	569	15	808
Dental therapist	—	24	213	660	269	3	13	1,182
Dental hygienist	—	11	28	173	193	24	8	437
Dental technician	3	109	382	1,361	872	127	96	2,950
Dental associate professional, nfd	—	—	3	—	8	—	—	11
Dental assistant	28	1,244	4,135	7,160	244	16	262	13,089
<i>Total</i>	38	1,452	4,892	10,240	4,421	4,282	517	25,842
<b>Nursing workers</b>								
Director of nursing	4	9	20	272	1,996	343	33	2,677
Nurse manager	3	32	136	1,451	5,457	239	73	7,391
Nurse educator	5	29	114	619	1,090	27	23	1,907
Nurse researcher	—	14	79	309	291	6	6	705
Registered nurse	163	3,826	17,106	74,405	42,982	1,020	2,652	142,154
Registered midwife	24	302	1,106	6,069	3,961	49	136	11,647
Registered mental health nurse	4	47	247	2,305	3,729	87	73	6,492
Registered developmental disability nurse	—	8	29	230	326	4	12	609
Nursing professional, nfd	—	16	57	276	263	7	11	630
Enrolled nurse	19	766	4,023	13,520	831	26	311	19,496
Personal care assistant	38	2,431	9,395	14,628	581	60	732	27,865
Nursing assistant	40	1,961	8,484	11,241	408	26	595	22,755
<i>Total</i>	300	9,441	40,796	125,325	61,915	1,894	4,657	244,328

(continued)

**Table A.22 (continued): Persons employed in health occupations: income<sup>(a)</sup>, 2001**

Occupation	Nil or no income	\$1– \$10,399	\$10,400 – \$20,799	\$20,800– \$41,599	\$41,600– \$77,999	\$78,000+	Not stated	Total
<b>Pharmacist workers</b>								
Hospital pharmacist	—	12	56	427	801	79	15	1,390
Industrial pharmacist	—	—	11	158	254	52	3	478
Retail pharmacist	19	370	676	2,918	5,097	2,754	192	12,026
<i>Total</i>	19	382	743	3,503	6,152	2,885	210	13,894
<b>Allied health workers</b>								
Occupational therapist	6	146	490	2,325	2,235	90	44	5,336
Optometrist	7	59	109	563	1,352	574	31	2,695
Physiotherapist	10	376	918	3,863	4,286	658	126	10,237
Speech pathologist	6	118	272	1,386	1,125	52	37	2,996
Podiatrist	3	46	179	649	686	162	36	1,761
Dietitian	3	92	203	860	787	34	20	1,999
Audiologist	—	16	46	248	426	56	8	800
Orthoptist	3	22	39	205	150	15	4	438
Orthotist	—	10	23	138	170	15	6	362
Health professional, nec	8	208	925	1,143	133	13	71	2,501
Clinical psychologist	15	229	519	2,347	3,674	685	85	7,554
Therapy aide	6	412	1,067	1,130	41	4	58	2,718
<i>Total</i>	67	1,734	4,790	14,857	15,065	2,358	526	39,397
<b>Complementary therapies</b>								
Chiropractor	3	43	161	613	766	427	54	2,067
Osteopath	—	10	31	151	159	69	9	429
Naturopath	14	350	700	1,010	292	70	54	2,490
Acupuncturist	4	82	177	296	68	24	16	667
Natural therapy professional, nec	8	86	145	204	45	11	15	514
Natural remedy consultant	16	509	812	757	124	31	71	2,320
<i>Total</i>	45	1,080	2,026	3,031	1,454	632	219	8,487
<b>Other health</b>								
Medical scientist	9	147	550	3,604	6,019	689	86	11,104
Biomedical engineer	—	3	8	104	325	59	6	505
Health information manager	3	14	43	267	506	38	12	883
Occupational health & safety officer	3	35	114	1,032	1,997	235	45	3,461
Environmental health officer	7	39	156	1,221	1,762	77	38	3,300
Medical technical officer	8	620	2,470	8,467	2,044	141	179	13,929
Ambulance officer	—	32	86	1,066	1,822	192	40	3,238
Intensive care ambulance paramedic	—	13	16	606	2,570	228	33	3,466
Indigenous health worker	—	98	168	564	59	3	25	917
Massage therapist	30	890	1,703	1,836	297	27	110	4,893
Primary products inspector	3	29	170	1,316	1,261	46	42	2,867
Anatomist or physiologist	—	27	66	203	183	26	8	513
Safety inspector	7	56	149	1,174	2,524	589	57	4,556
Admissions clerk	4	188	896	2,755	220	10	64	4,137
Weight loss consultant	4	223	299	201	23	4	13	767
<i>Total</i>	78	2,414	6,894	24,416	21,612	2,364	758	58,536
<b>Total</b>	<b>583</b>	<b>16,817</b>	<b>61,195</b>	<b>188,698</b>	<b>131,660</b>	<b>43,904</b>	<b>7,556</b>	<b>450,413</b>

(a) Includes income from all sources. Census data does not provide separate data for income derived from employment.

Note: Excludes those whose occupation or age were not stated.

Source: ABS, Census of Population and Housing, 2001.

**Table A.23: Persons employed in community services occupations: income<sup>(a)</sup>, 2001**

Occupation	Nil or no income	\$1– \$10,399	\$10,400 – \$20,799	\$20,800– \$41,599	\$41,600– \$77,999	\$78,000+	Not stated	Total
<b>Child and youth services</b>								
Child care co-ordinator	24	241	976	3,676	1,234	183	89	6,423
Child care worker	170	9,900	17,300	16,245	566	83	894	45,158
Family day care worker	33	1,652	4,090	4,634	322	19	193	10,943
Nanny	73	1,833	1,632	1,507	95	6	151	5,297
Pre-primary school teacher	29	662	2,061	7,149	4,020	80	160	14,161
Pre-school aide	12	949	2,054	1,515	60	8	85	4,683
Youth worker	8	359	978	3,647	1,016	19	136	6,163
Hostel parent	39	268	337	639	96	16	41	1,436
Child or youth residential care assistant	—	29	74	302	66	3	6	480
Children's care workers, nfd	42	1,612	2,462	2,227	176	30	262	6,811
<i>Total</i>	<i>430</i>	<i>17,505</i>	<i>31,964</i>	<i>41,541</i>	<i>7,651</i>	<i>447</i>	<i>2,017</i>	<i>101,555</i>
<b>Family services</b>								
Welfare worker	11	313	1,134	4,967	2,350	69	142	8,986
Family counsellor	4	64	188	664	341	33	19	1,313
Family support worker	4	154	353	719	121	5	24	1,380
<i>Total</i>	<i>19</i>	<i>531</i>	<i>1,675</i>	<i>6,350</i>	<i>2,812</i>	<i>107</i>	<i>185</i>	<i>11,679</i>
<b>Disability workers</b>								
Special needs teacher	7	267	818	3,217	5,173	72	108	9,662
Teacher of the hearing-impaired	—	16	48	230	520	8	7	829
Teacher of the sight-impaired	—	3	15	74	142	3	3	240
Special education teacher, nec	—	46	110	249	300	8	4	717
Integration aide	7	1,690	4,886	3,448	199	14	140	10,384
Residential care officer	—	79	379	1,829	491	5	35	2,818
Disabilities service officer	11	171	804	4,150	964	31	97	6,228
<i>Total</i>	<i>25</i>	<i>2,272</i>	<i>7,060</i>	<i>13,197</i>	<i>7,789</i>	<i>141</i>	<i>394</i>	<i>30,878</i>
<b>Aged or disabled care</b>								
Aged or disabled person's carer	79	7,370	20,536	20,767	1,696	104	1,208	51,760
<b>Other community services</b>								
Welfare centre manager	3	12	36	253	453	67	8	832
Social worker	10	186	663	4,220	3,839	91	112	9,121
Community worker	19	595	2,018	8,625	5,307	299	244	17,107
Social security inspector	8	37	240	5,591	3,340	27	60	9,303
Rehabilitation counsellor	—	20	77	537	848	35	14	1,531
Drug and alcohol counsellor	—	31	109	672	263	5	12	1,092
Welfare associate professional, nfd	3	36	101	238	129	6	13	526
Parole or probation officer	3	16	48	469	560	11	4	1,111
Refuge worker	—	39	77	219	24	—	5	364
<i>Total</i>	<i>46</i>	<i>972</i>	<i>3,369</i>	<i>20,824</i>	<i>14,763</i>	<i>541</i>	<i>472</i>	<i>40,987</i>
<b>Total</b>	<b>599</b>	<b>28,650</b>	<b>64,604</b>	<b>102,679</b>	<b>34,711</b>	<b>1,340</b>	<b>4,276</b>	<b>236,859</b>

(a) Includes income from all sources. Census data does not provide separate data for income derived from employment.

Note: Excludes those whose occupation or age were not stated.

Source: ABS, Census Of Population and Housing, 2001.

**Table A.24: Health and community services: adult non-managerial employees, weekly earnings, 1996 and 2002**

Occupations	Full-time adults: ordinary time earnings, base pay (\$)		All employed persons: total earnings (\$)	
	1996	2002	1996	2002
Miscellaneous specialist managers	496.60	1,250.70	471.90	1,457.30
Natural and physical science professionals	820.10	976.10	704.40	848.70
Accountants, auditors and corporate treasurers	813.30	930.80	569.60	930.80
Sales, marketing and advertising professionals	791.90	769.30	758.50	665.70
Computing professionals	775.60	848.80	782.70	870.40
Miscellaneous business and information professionals	705.10	774.80	656.60	673.80
Medical practitioners	1,261.70	1,404.40	1,180.80	1,329.00
Nursing professionals	784.20	936.30	628.50	729.20
Miscellaneous health professionals	770.80	959.70	610.50	775.40
School teachers	661.90	n.p.	455.10	439.30
Miscellaneous education professionals	669.80	n.p.	349.00	* 146.50
Social welfare professionals	688.90	810.60	537.00	668.40
Miscellaneous social professionals	787.80	n.p.	* 644.70	649.20
Miscellaneous professionals	679.30	738.70	533.10	413.50
Medical and science technical officers	587.60	698.30	576.50	614.00
Building and engineering associate professionals	724.30	972.40	895.10	1,037.20
Finance associate professionals	790.40	908.60	790.40	778.90
Miscellaneous business and administration associate professionals	670.50	777.50	618.10	640.70
Shop managers	457.00	n.a.	415.60	349.40
Hospitality and accommodation managers	575.90	676.40	581.40	581.50
Miscellaneous managing supervisors (sales and service)	n.p.	905.50	n.p.	920.90
Enrolled nurses	558.70	720.80	419.80	508.60
Welfare associate professionals	577.80	671.00	549.30	574.00
Miscellaneous health and welfare associate professionals	673.90	742.20	711.60	859.60
Miscellaneous associate professionals	693.90	533.70	554.50	399.10
Mechanical engineering tradespersons	539.30	765.00	538.20	787.00
Electrical and electronics tradespersons	597.90	842.60	684.10	849.30
Structural construction tradespersons	526.70	663.00	553.00	697.10
Final finishes construction tradespersons	505.20	615.00	519.60	615.00
Plumbers	619.30	726.50	684.40	791.30
Food tradespersons	489.00	742.30	352.20	447.50
Miscellaneous tradespersons and related workers	544.50	742.80	467.60	* 506.30
Secretaries and personal assistants	561.20	633.00	464.40	504.80
Advanced numerical clerks	511.10	1,140.70	344.10	460.60
Miscellaneous advanced clerical and service workers	n.p.	749.90	n.p.	749.90
General clerks	509.10	645.10	403.10	519.40
Keyboard operators	511.00	633.50	415.10	497.90
Receptionists	494.20	631.20	356.00	424.00
Intermediate numerical clerks	560.40	589.50	492.40	554.60

(continued)

**Table A.24 (continued): Health and community services: adult non-managerial employees, weekly earnings, 1996 and 2002**

Occupations	Full-time adults: ordinary time earnings, base pay (\$)		All employed persons: total earnings (\$)	
	1996	2002	1996	2002
Material recording and despatching clerks	568.10	600.90	563.00	583.40
Miscellaneous intermediate clerical workers	523.40	675.90	459.80	537.90
Intermediate sales and related workers	n.p.	794.40	n.p.	790.10
Carers and aides	516.00	601.10	352.60	402.60
Education aides	487.40	n.p.	337.80	* 424.10
Children's care workers	465.30	511.10	272.90	370.30
Special care workers	550.90	665.10	334.90	372.00
Personal care and nursing assistants	509.00	631.40	383.50	463.90
Hospitality workers	536.90	620.00	445.10	510.80
Miscellaneous intermediate service workers	451.30	543.90	366.00	434.50
Dental assistants	453.70	559.10	368.40	472.30
Road and rail transport drivers	471.70	546.70	361.10	347.80
Miscellaneous intermediate production and transport workers	476.10	534.20	472.10	520.00
Elementary clerks	480.70	505.40	406.00	433.20
Sales assistants	434.80	570.50	375.40	403.40
Miscellaneous elementary sales workers	500.90	n.p.	387.00	499.80
Elementary service workers	482.70	622.00	391.20	503.10
Cleaners	475.40	631.40	326.30	384.10
Process workers	103.90	122.80	97.10	93.30
Product packagers	45.90	* 167.20	43.20	* 86.00
Agricultural and horticultural labourers	n.p.	488.30	* 190.30	377.00
Elementary food preparation and related workers	488.30	635.20	359.50	436.00
Miscellaneous labourers and related workers	460.80	444.80	352.70	335.70
<b>Total</b>	<b>646.40</b>	<b>763.90</b>	<b>503.00</b>	<b>576.50</b>

*Note:* Figures marked with an asterisk are subject to relative standard error between 25% and 40%, and should be treated with caution.

*Source:* ABS, Survey of Employee Earnings and Hours.

Table A.25: Persons employed in health occupations: birthplace, 2001

Occupation	Australia	New Zealand	Other Oceania	UK & Ireland	Other Europe	North Africa & the Middle East	Africa (excl. North Africa)	Asia	Americas	Not stated & other	Total
<b>Medical workers</b>											
Medical administrator	2,784	101	16	413	105	18	50	134	48	52	3,721
Generalist medical practitioner	15,712	540	244	2,845	1,617	896	925	5,731	325	294	29,129
Medical practitioner in training	1,362	56	24	240	129	100	57	718	42	30	2,758
Specialist medical practitioner, nfd	513	18	6	109	62	8	33	136	10	11	906
Anaesthetist	1,370	79	10	279	88	20	83	178	17	16	2,140
Dermatologist	176	4	—	15	18	3	3	20	—	—	239
Emergency medicine specialist	208	11	—	53	10	—	5	29	7	3	326
Obstetrician and gynaecologist	480	20	7	103	41	17	27	91	4	6	796
Ophthalmologist	292	16	—	31	19	9	16	45	3	5	436
Paediatrician	472	23	10	101	24	13	53	82	10	7	795
Pathologist	711	43	12	107	57	18	51	126	11	11	1,147
Specialist physician	1,268	45	11	205	89	25	66	202	19	4	1,934
Psychiatrist	1,145	78	5	267	144	31	75	225	23	17	2,010
Radiologist	763	66	14	166	52	12	115	152	20	16	1,376
Surgeon	2,194	61	15	293	139	61	104	347	36	19	3,269
Specialist medical practitioner, nec	315	13	7	57	24	6	9	57	6	3	497
Medical practitioner, nfd	167	9	3	38	18	12	9	75	4	3	338
<i>Total</i>	<i>29,932</i>	<i>1,183</i>	<i>384</i>	<i>5,322</i>	<i>2,636</i>	<i>1,249</i>	<i>1,681</i>	<i>8,348</i>	<i>585</i>	<i>497</i>	<i>51,817</i>
<b>Medical imaging workers</b>											
Medical diagnostic radiographer	3,618	223	35	590	173	34	253	417	84	41	5,468
Radiation therapist	592	17	3	67	10	4	12	85	13	4	807
Nuclear medicine technologist	346	11	3	31	11	3	6	26	12	3	452
Sonographer	1,013	56	6	145	38	8	42	88	26	9	1,431
<i>Total</i>	<i>5,569</i>	<i>307</i>	<i>47</i>	<i>833</i>	<i>232</i>	<i>49</i>	<i>313</i>	<i>616</i>	<i>135</i>	<i>57</i>	<i>8,158</i>

(continued)



Table A.25 (continued): Persons employed in health occupations: birthplace, 2001

Occupation	Australia	New Zealand	Other Oceania	UK & Ireland	Other Europe	North Africa & the Middle East	Africa (excl. North Africa)	Asia	Americas	Not stated & other	Total
<b>Dental workers</b>											
Dentist	4,075	143	47	544	472	216	187	1,518	95	84	7,381
Dental specialist	540	25	3	58	37	9	33	86	7	10	808
Dental therapist	983	49	6	68	22	5	6	27	9	9	1,184
Dental hygienist	303	12	3	37	14	5	9	13	35	8	439
Dental technician	1,927	28	4	219	368	69	50	180	52	59	2,956
Dental assistant	10,543	265	69	589	453	98	59	659	156	205	13,096
Dental associate professional, nfd	7	—	—	3	—	—	—	—	—	—	10
<i>Total</i>	<i>18,378</i>	<i>522</i>	<i>132</i>	<i>1,518</i>	<i>1,366</i>	<i>402</i>	<i>344</i>	<i>2,483</i>	<i>354</i>	<i>375</i>	<i>25,874</i>
<b>Nursing workers</b>											
Director of nursing	2,009	60	20	309	71	7	26	121	16	39	2,678
Nurse manager	5,526	173	27	896	184	12	85	368	53	67	7,391
Nurse educator	1,436	50	7	243	42	9	19	61	23	18	1,908
Nurse researcher	534	24	4	85	20	3	8	16	8	4	706
Registered nurse	104,052	4,115	1,622	13,155	4,516	496	1,667	9,131	1,451	1,997	142,202
Registered midwife	9,092	241	61	1,232	236	33	157	418	108	71	11,649
Registered mental health nurse	4,210	282	25	1,116	241	29	73	354	87	76	6,493
Registered developmental disability nurse	433	13	5	56	23	3	12	51	6	9	611
Nursing professional, nfd	461	19	8	64	24	—	10	23	7	15	631
Enrolled nurse	15,943	525	114	1,575	493	27	86	361	144	230	19,498
Personal care assistant	19,271	752	300	2,662	1,936	190	300	1,484	422	566	27,883
Nursing assistant	14,206	909	994	1,841	1,294	140	361	2,070	486	471	22,772
<i>Total</i>	<i>177,173</i>	<i>7,163</i>	<i>3,187</i>	<i>23,234</i>	<i>9,080</i>	<i>949</i>	<i>2,804</i>	<i>14,458</i>	<i>2,811</i>	<i>3,563</i>	<i>244,422</i>

(continued)

Table A.25 (continued): Persons employed in health occupations: birthplace, 2001

Occupation	Australia	New Zealand	Other Oceania	UK & Ireland	Other Europe	North Africa & the Middle East	Africa (excl. North Africa)	Asia	Americas	Not stated & other	Total
<b>Pharmacist workers</b>											
Hospital pharmacist	912	29	4	94	48	40	41	201	11	10	1,390
Industrial pharmacist	299	4	—	35	33	7	8	83	8	—	477
Retail pharmacist	8,462	259	133	498	421	332	195	1,540	71	135	12,046
<i>Total</i>	9,673	292	137	627	502	379	244	1,824	90	145	13,913
<b>Allied health workers</b>											
Occupational therapist	4,410	70	30	325	90	17	106	193	71	31	5,343
Optometrist	1,870	33	19	164	94	36	88	336	38	20	2,698
Physiotherapist	7,826	192	42	830	298	50	219	564	147	80	10,248
Speech pathologist	2,506	32	12	191	42	11	86	55	37	25	2,997
Podiatrist	1,361	50	9	158	57	20	17	53	21	17	1,763
Dietitian	1,552	31	18	117	71	14	31	95	43	29	2,001
Audiologist	558	16	7	54	28	3	34	58	40	5	803
Orthoptist	358	5	—	18	12	5	3	25	3	7	436
Orthotist	280	5	3	30	13	3	7	15	3	6	365
Health professional, nec	1,880	63	17	236	141	10	25	44	37	53	2,506
Clinical psychologist	5,429	157	29	687	414	76	235	232	240	71	7,570
Therapy aide	2,068	66	11	292	118	10	18	67	34	34	2,718
<i>Total</i>	30,098	720	197	3,102	1,378	255	869	1,737	714	378	39,448
<b>Complementary therapies</b>											
Chiropractor	1,532	86	12	87	86	23	34	41	157	15	2,073
Osteopath	323	14	—	42	23	—	4	9	3	8	426
Naturopath	1,778	100	7	214	186	16	38	101	38	36	2,514
Acupuncturist	306	22	3	24	45	7	7	241	12	10	677
Natural therapy professional, nec	239	11	3	33	43	8	8	161	10	7	523
Natural remedy consultant	1,588	87	5	204	131	14	35	184	45	46	2,339
<i>Total</i>	5,766	320	30	604	514	68	126	737	265	122	8,552

(continued)

Table A.25 (continued): Persons employed in health occupations: birthplace, 2001

Occupation	Australia	New Zealand	Other Oceania	UK & Ireland	Other Europe	North Africa & the Middle East	Africa (excl. North Africa)	Asia	Americas	Not stated & other	Total
<b>Other health</b>											
Medical scientist	7,419	210	80	919	611	151	168	1,198	254	98	11,108
Biomedical engineer	332	4	—	49	35	8	12	52	7	6	505
Health information manager	729	18	10	42	19	5	3	43	7	4	880
Occupational health and safety officer	2,691	98	13	381	108	12	27	77	28	29	3,464
Environmental health officer	2,660	66	17	223	111	20	35	107	26	37	3,302
Medical technical officer	9,872	396	139	1,142	673	151	146	972	243	198	13,932
Ambulance officer	2,751	61	7	274	67	3	8	23	19	27	3,240
Intensive care ambulance paramedic	2,890	77	12	339	56	4	17	22	23	26	3,466
Indigenous health worker	887	4	3	7	3	—	3	—	—	10	917
Massage therapist	3,628	183	21	397	310	25	54	144	84	75	4,921
Primary products inspector	2,354	67	18	168	85	20	17	80	18	40	2,867
Safety inspector	3,429	101	26	583	188	19	38	94	34	52	4,564
Admissions clerk	3,103	94	26	444	160	23	34	152	38	63	4,137
Anatomist or physiologist	414	5	3	30	12	3	13	14	15	4	513
Weight loss consultant	594	28	—	69	30	3	10	11	10	13	768
<i>Total</i>	<i>43,753</i>	<i>1,412</i>	<i>375</i>	<i>5,067</i>	<i>2,468</i>	<i>447</i>	<i>585</i>	<i>2,989</i>	<i>806</i>	<i>682</i>	<i>58,584</i>
<b>Total</b>	<b>320,342</b>	<b>11,919</b>	<b>4,489</b>	<b>40,307</b>	<b>18,176</b>	<b>3,798</b>	<b>6,966</b>	<b>33,192</b>	<b>5,760</b>	<b>5,819</b>	<b>450,768</b>

Source: ABS, Census of Population and Housing, 2001.

**Table A.26: Persons employed in health and community services occupations: year of arrival in Australia, 2001**

<b>Occupation<sup>(a)</sup></b>	<b>Pre-1985</b>	<b>1985-1991</b>	<b>1992-1996</b>	<b>1997-2001</b>	<b>Not stated</b>	<b>Total</b>
Medical practitioner	11,575	3,856	2,010	2,639	584	20,664
Nursing professional	24,881	10,017	3,400	4,008	1,457	43,763
Miscellaneous health professional	10,982	4,437	1,788	1,903	594	19,704
Social welfare professional	12,099	2,908	1,373	1,275	531	18,186
Enrolled nurse	2,379	525	184	132	112	3,332
Welfare associate professional	2,856	733	257	225	138	4,209
Misc. health & welfare professional	2,291	621	295	285	125	3,617
Carer and aide	31,092	10,134	4,957	4,748	1,947	52,878
Misc. intermediate service worker	13,063	5,346	2,623	2,770	930	24,732
<b>Total</b>	<b>111,218</b>	<b>38,577</b>	<b>16,887</b>	<b>17,985</b>	<b>6,418</b>	<b>191,085</b>

*(a) The occupations are at the Minor Group level of ASCO for health professionals, health and welfare associate professionals and intermediate service workers (for carers and aides, and miscellaneous intermediate service workers) (see Explanatory notes).*

Source: ABS, Census of Population and Housing, 2001.

**Table A.27: Employed persons per 100,000 population in health and community services industries, remoteness area<sup>(a)</sup> and state or territory, 2001**

Remoteness area	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Total
<b>Health industries</b>									
Major cities of Australia	2,876	2,892	3,092	3,190	3,697	n.a.	2,538	n.a.	3,005
Inner regional Australia	2,696	2,920	2,521	2,002	2,630	3,508	1,329 <sup>(b)</sup>	n.a.	2,729
Outer regional Australia	2,019	2,676	2,380	2,096	2,511	2,281	n.a.	2,495	2,314
Remote Australia	1,519	2,153	1,631	1,791	2,198	1,293	n.a.	3,430	1,975
Very remote Australia	1,946	n.a.	1,734	1,368	1,757	2,261	n.a.	1,117	1,498
<i>Total</i>	<i>2,767</i>	<i>2,886</i>	<i>2,760</i>	<i>2,823</i>	<i>3,360</i>	<i>3,043</i>	<i>2,535</i>	<i>2,352</i>	<i>2,862</i>
<b>Community services industries</b>									
Major cities of Australia	891	1,019	1,084	1,100	1,145	n.a.	1,330	n.a.	1,008
Inner regional Australia	1,017	1,145	1,015	899	938	1,168	443 <sup>(c)</sup>	n.a.	1,050
Outer regional Australia	882	992	973	766	763	976	n.a.	1,067	921
Remote Australia	805	1,060	732	790	781	404	n.a.	1,323	838
Very remote Australia	906	n.a.	644	1,005	987	1,035	n.a.	657	796
<i>Total</i>	<i>916</i>	<i>1,044</i>	<i>1,031</i>	<i>1,025</i>	<i>1,061</i>	<i>1,088</i>	<i>1,328</i>	<i>1,019</i>	<i>1,010</i>
<b>Health and community services undefined</b>									
Major cities of Australia	146	209	223	213	312	n.a.	224	n.a.	198
Inner regional Australia	178	187	254	187	243	333	n.a.	n.a.	213
Outer regional Australia	149	162	184	187	230	245	n.a.	210	183
Remote Australia	125	298	138	145	149	289	n.a.	243	161
Very remote Australia	98	n.a.	121	255	507	307	n.a.	178	212
<i>Total</i>	<i>152</i>	<i>202</i>	<i>220</i>	<i>205</i>	<i>291</i>	<i>302</i>	<i>224</i>	<i>209</i>	<i>200</i>

(a) Remoteness categories are based on the ASGC remoteness classification.

(b) This figure is based on 9 persons employed in health occupations in the Inner regional area of the Australian Capital Territory. It should be treated with caution.

(c) This figure is based on 3 persons employed in community services occupations in the Inner regional area of the Australian Capital Territory. It should be treated with caution.

Notes: 1. Tasmania and the Northern Territory do not have a major city (of more than 250,000 persons).

2. The Australian Capital Territory does not have an Outer regional, Remote or Very remote area.

3. Victoria does not have a Very remote area.

Source: ABS, Census of Population And Housing, 2001.

**Table A.28: Persons employed in health and community services industries: states and territories, remoteness area of workplace, 2001**

Remoteness area of workplace	Health services, undefined	Hospitals and nursing homes, undefined	Hospitals (except psychiatric hospitals)	Psychiatric hospitals	Nursing homes	Medical & dental services, undefined	General practice medical services
<b>New South Wales</b>							
Major cities	10,681	473	50,233	502	16,123	616	15,625
Inner regional	4,008	135	11,818	173	5,542	129	3,896
Outer regional	1,128	64	3,156	10	1,911	29	1,002
Remote	73	9	262	—	50	—	55
Very remote	26	—	76	—	4	—	15
<b>Victoria</b>							
Major cities	6,360	184	40,854	469	10,259	596	13,168
Inner regional	2,172	139	13,582	153	2,889	76	2,707
Outer regional	483	36	3,533	17	571	18	541
Remote	17	—	77	—	6	—	10
<b>Queensland</b>							
Major cities	6,112	110	22,357	262	5,773	215	5,878
Inner regional	3,177	57	7,328	156	3,337	78	2,511
Outer regional	2,302	30	5,235	59	1,958	49	1,526
Remote	309	4	593	6	110	3	156
Very remote	210	3	448	—	73	—	56
<b>South Australia</b>							
Major cities	2,313	80	13,969	203	5,774	172	5,364
Inner regional	453	14	1,572	5	801	22	607
Outer regional	459	17	2,092	3	464	11	474
Remote	168	7	389	—	109	4	115
Very remote	41	—	133	—	3	—	17
<b>Western Australia</b>							
Major cities	1,992	190	17,793	232	4,641	181	4,378
Inner regional	322	36	1,470	11	690	15	513
Outer regional	355	23	1,577	6	447	11	431
Remote	196	11	707	3	111	4	181
Very remote	123	13	273	—	34	—	57
<b>Tasmania</b>							
Inner regional	363	46	4333	63	2064	54	1070
Outer regional	115	31	1229	13	1034	26	386
Remote	5	3	43	—	15	—	15
Very remote	4	—	39	—	—	—	3
<b>Northern Territory</b>							
Outer regional	349	20	1136	4	103	11	227
Remote	233	14	590	4	69	4	112
Very remote	164	3	106	—	14	3	43
<b>Australian Capital Territory</b>							
Major cities	428	42	3,101	11	572	73	902
Inner regional	—	—	3	—	—	—	3
<b>Australia</b>							
Major cities	27,886	1,079	148,307	1,679	43,142	1,853	45,315
Inner regional	10,495	427	40,106	561	15,323	374	11,307
Outer regional	5,191	221	17,958	112	6,488	155	4,587
Remote	1,001	48	2,661	13	470	15	644
Very remote	568	19	1,075	—	128	3	191
<b>Total</b>	<b>45,141</b>	<b>1,794</b>	<b>210,107</b>	<b>2,365</b>	<b>65,551</b>	<b>2,400</b>	<b>62,044</b>

(continued)

**Table A.28 (continued): Persons employed in health and community services industries: states and territories, remoteness area<sup>(a)</sup> of workplace, 2001**

Remoteness area of workplace	Specialist medical services	Dental services	Other health services, undefined	Pathology services	Optometry and optical dispensing	Ambulance services	Community health centres
<b>New South Wales</b>							
Major cities	6,538	7,378	636	3,753	2,588	1,775	5,069
Inner regional	1,469	1,686	207	866	644	805	1,536
Outer regional	207	379	68	172	126	269	521
Remote	3	13	3	4	5	35	57
Very remote	3	—	—	3	—	7	11
<b>Victoria</b>							
Major cities	4,938	5,363	396	2,838	1,718	1,138	2,672
Inner regional	1,073	1,054	147	643	358	636	1,330
Outer regional	123	206	24	96	69	142	415
Remote	—	3	3	—	—	3	8
<b>Queensland</b>							
Major cities	2,868	3,382	329	2,401	1,012	874	1,459
Inner regional	950	1,384	136	626	434	629	593
Outer regional	520	857	66	415	231	442	481
Remote	10	54	12	17	3	85	83
Very remote	7	16	—	3	3	30	79
<b>South Australia</b>							
Major cities	2,030	2,224	282	1,296	572	470	1,394
Inner regional	130	251	41	88	74	108	224
Outer regional	62	182	18	65	43	93	183
Remote	12	47	8	4	8	10	56
Very remote	3	23	3	—	—	3	20
<b>Western Australia</b>							
Major cities	2,191	2,789	333	1,488	762	383	944
Inner regional	211	317	40	155	81	60	213
Outer regional	85	208	19	62	51	28	229
Remote	35	67	9	16	17	10	137
Very remote	11	12	3	10	—	10	111
<b>Tasmania</b>							
Inner regional	392	429	51	215	177	126	267
Outer regional	94	139	27	66	35	54	130
Remote	3	3	—	3	—	3	13
Very remote	—	—	3	—	—	—	4
<b>Northern Territory</b>							
Outer regional	100	132	4	65	53	61	163
Remote	23	45	5	19	13	35	183
Very remote	3	13	3	3	—	6	172
<b>Australian Capital Territory</b>							
Major cities	397	625	54	251	154	94	489
Inner regional	3	—	—	—	—	—	—
<b>Australia</b>							
Major cities	18,962	21,761	2,030	12,027	6,806	4,734	12,027
Inner regional	4,228	5,121	622	2,593	1,768	2,364	4,163
Outer regional	1,191	2,103	226	941	608	1,089	2,122
Remote	86	232	40	63	46	181	537
Very remote	27	64	12	19	3	56	397
<b>Total</b>	<b>24,494</b>	<b>29,281</b>	<b>2,930</b>	<b>15,643</b>	<b>9,231</b>	<b>8,424</b>	<b>19,246</b>

(continued)

**Table A.28 (continued): Persons employed in health and community services industries: states and territories, remoteness area<sup>(a)</sup> of workplace, 2001**

Remoteness area of workplace	Physio-therapy services	Chiropractic services	Health services, nec	Total health services	Community services, undefined	Child care services	Community care services, undefined
<b>New South Wales</b>							
Major cities	2,215	1,110	10,540	135,855	3,714	13,025	799
Inner regional	543	380	2,632	36,469	1,055	3,850	238
Outer regional	118	98	526	9,784	309	984	91
Remote	6	—	21	596	24	64	10
Very remote	—	—	14	159	15	13	—
<b>Victoria</b>							
Major cities	1,532	991	9,051	102,527	2,564	10,376	739
Inner regional	305	367	2,127	29,758	836	2,978	200
Outer regional	61	65	363	6,763	185	666	25
Remote	—	—	3	130	5	12	—
<b>Queensland</b>							
Major cities	975	434	4,411	58,852	1,213	7,709	273
Inner regional	330	285	1,642	23,653	495	3,332	160
Outer regional	153	139	878	15,341	410	2,509	106
Remote	10	9	69	1,533	69	267	12
Very remote	3	—	15	946	93	116	4
<b>South Australia</b>							
Major cities	654	380	3,034	40,211	910	3,273	402
Inner regional	97	83	366	4,936	111	528	51
Outer regional	71	50	209	4,496	109	393	53
Remote	21	8	36	1,002	25	125	3
Very remote	—	3	11	260	40	49	9
<b>Western Australia</b>							
Major cities	720	351	3,568	42,936	1,079	3,939	638
Inner regional	93	63	382	4,672	150	584	93
Outer regional	58	35	266	3,891	99	437	70
Remote	17	9	87	1,617	81	251	21
Very remote	4	—	36	697	101	93	42
<b>Tasmania</b>							
Inner regional	135	51	712	10,548	257	1022	73
Outer regional	46	25	223	3,673	122	418	41
Remote	—	—	6	112	3	16	—
Very remote	3	—	3	59	3	11	—
<b>Northern Territory</b>							
Outer regional	41	17	213	2,699	80	489	23
Remote	17	8	78	1,452	70	206	15
Very remote	3	—	17	553	139	77	6
<b>Australian Capital Territory</b>							
Major cities	147	80	726	8,146	439	1,833	89
Inner regional	—	—	—	9	—	—	—
<b>Australia</b>							
Major cities	6,243	3,346	31,330	388,527	9,919	40,155	2,940
Inner regional	1,503	1,229	7,861	110,045	2,904	12,294	815
Outer regional	548	429	2,678	46,647	1,314	5,896	409
Remote	71	34	300	6,442	277	941	61
Very remote	13	3	96	2,674	391	359	61
<b>Total</b>	<b>8,378</b>	<b>5,041</b>	<b>42,265</b>	<b>554,335</b>	<b>14,805</b>	<b>59,645</b>	<b>4,286</b>

(continued)



**Table A.28 (continued): Persons employed in health and community services industries: states and territories, remoteness area<sup>(a)</sup> of workplace, 2001**

Remoteness area of workplace	Accommodation for the aged	Residential care services, nec	Non-residential care services, nec	Total community service	Health and community services, undefined	Total health and community services
<b>New South Wales</b>						
Major cities	3,613	4,546	16,396	42,093	6,895	184,843
Inner regional	1,556	1,457	5,598	13,754	2,405	52,628
Outer regional	683	420	1,788	4,275	722	14,781
Remote	32	17	169	316	49	961
Very remote	3	3	40	74	8	241
<b>Victoria</b>						
Major cities	3,365	2,543	16,520	36,107	7,422	146,056
Inner regional	1,145	952	5,552	11,663	1,905	43,326
Outer regional	326	142	1,164	2,508	410	9,681
Remote	11	3	33	64	18	212
<b>Queensland</b>						
Major cities	1,364	1,424	8,649	20,632	4,253	83,737
Inner regional	1,091	616	3,829	9,523	2,380	35,556
Outer regional	473	371	2,401	6,270	1,184	22,795
Remote	43	38	259	688	130	2,351
Very remote	10	17	111	351	66	1,363
<b>South Australia</b>						
Major cities	1,115	1,813	4,936	12,449	3,390	56,050
Inner regional	236	228	606	1,760	456	7,152
Outer regional	208	132	471	1,366	412	6,274
Remote	36	70	97	356	68	1,426
Very remote	6	4	38	146	75	481
<b>Western Australia</b>						
Major cities	1,483	2,093	5,569	14,801	2,865	60,602
Inner regional	280	290	702	2,099	437	7,208
Outer regional	180	126	510	1,422	347	5,660
Remote	29	83	248	713	131	2,461
Very remote	19	65	192	512	130	1,339
<b>Tasmania</b>						
Inner regional	157	494	1510	3,513	1000	15061
Outer regional	96	249	645	1,571	394	5638
Remote	—	3	13	35	25	172
Very remote	—	—	13	27	8	94
<b>Northern Territory</b>						
Outer regional	25	136	401	1,154	227	4080
Remote	10	74	185	560	103	2115
Very remote	—	12	91	325	88	966
<b>Australian Capital Territory</b>						
Major cities	271	399	1,239	4,270	720	13,136
Inner regional	—	—	3	3	—	12
<b>Australia</b>						
Major cities	11,211	12,818	53,309	130,352	25,545	544,424
Inner regional	4,465	4,037	17,800	42,315	8,583	160,943
Outer regional	1,991	1,576	7,380	18,566	3,696	68,909
Remote	161	288	1,004	2,732	524	9,698
Very remote	38	101	485	1,435	375	4,484
<b>Total</b>	<b>17,866</b>	<b>18,820</b>	<b>79,978</b>	<b>195,400</b>	<b>38,723</b>	<b>788,458</b>

Notes: 1. Excludes those whose place of work varied in the reference week, or was not stated.

2. Tasmania and the Northern Territory do not have a major city (of more than 250,000 persons); the Australian Capital Territory does not have an Outer regional, Remote or Very remote area and Victoria does not have a Very remote area.

Source: ABS, Census of Population And Housing, 2001.

**Table A.29: Health and community services workers: capital city and other regions, Australia, 2001**

Occupation	Persons employed (no.)			Employed persons per 100,000 pop.		
	Capital city	Other region	Total	Capital city	Other region	Total
<b>Health workers</b>						
Medical workers	37,336	13,715	51,051	312	202	272
Medical imaging workers	5,737	2,277	8,014	48	33	43
Dental workers	17,989	7,364	25,353	150	108	135
<i>Nursing workers</i>	<i>149,105</i>	<i>89,635</i>	<i>238,740</i>	<i>1,246</i>	<i>1,318</i>	<i>1,272</i>
Director of nursing	1,648	1,002	2,650	14	15	14
Registered nurses	108,402	59,445	167,847	906	874	894
Enrolled nurses	8,906	10,282	19,188	74	151	102
Nursing assistants/personal carers	30,149	18,906	49,055	252	278	261
Pharmacists	9,959	3,734	13,693	83	55	73
Allied health workers	27,867	10,999	38,866	233	162	207
Complementary therapies	5,430	2,875	8,305	45	42	44
Other health workers	38,696	19,000	57,696	323	279	307
<i>Total health workers</i>	<i>292,119</i>	<i>149,599</i>	<i>441,718</i>	<i>2,441</i>	<i>2,200</i>	<i>2,353</i>
<b>Community services workers</b>						
Child and youth services	62,772	35,621	98,393	524	525	524
Family services	6,744	4,685	11,429	56	69	61
Disability workers	18,735	11,699	30,434	157	172	162
Aged or disabled care	25,066	24,717	49,783	209	363	265
Other community services	25,764	14,626	40,390	215	215	215
<i>Total community services workers</i>	<i>139,081</i>	<i>91,348</i>	<i>230,429</i>	<i>1,161</i>	<i>1,346</i>	<i>1,228</i>
<b>Total</b>	<b>431,200</b>	<b>240,947</b>	<b>672,147</b>	<b>3,602</b>	<b>3,546</b>	<b>3,581</b>

*Note:* Excludes those whose place of work varied in the reference week, or was not stated.

*Source:* AIHW from ABS Census of Population and Housing, 2001.

**Table A.30: Persons employed in health occupations: statistical region of workplace, Australia, 2001**

Statistical region	Medical workers	Medical imaging workers	Dental workers	Nursing workers	Pharmacists	Allied health workers	Complementary therapies	Other health workers	Total health
<b>New South Wales</b>									
Inner Sydney	2,116	258	987	4,607	400	1,218	288	2,502	12,376
Eastern Suburbs	1,177	146	442	3,094	235	787	167	897	6,945
St George–Sutherland	1,083	201	578	4,418	364	768	199	905	8,516
Canterbury–Bankstown	575	81	241	1,857	241	365	50	307	3,717
Fairfield–Liverpool	794	149	306	2,731	184	451	77	578	5,270
Outer South Western Sydney	279	59	160	1,374	102	258	45	239	2,516
Inner Western Sydney	632	63	240	2,404	135	376	86	394	4,330
Central Western Sydney	1,460	207	490	5,543	328	858	69	1,379	10,334
North Western Sydney	1,041	200	456	4,312	285	758	139	817	8,008
Lower Northern Sydney	1,538	227	643	4,705	371	1,109	242	1,749	10,584
Central Northern Sydney	840	138	569	3,804	349	887	177	605	7,369
Northern Beaches	454	71	273	1,834	206	514	158	311	3,821
Gosford–Wyong	602	122	286	3,516	163	461	82	646	5,878
<i>Hunter</i>	<i>1,378</i>	<i>260</i>	<i>587</i>	<i>8,021</i>	<i>309</i>	<i>1,000</i>	<i>179</i>	<i>1,638</i>	<i>13,372</i>
Newcastle	1,231	239	477	6,797	232	868	147	1,354	11,345
Hunter SD Balance	147	21	110	1,224	77	132	32	284	2,027
<i>Illawarra</i>	<i>787</i>	<i>165</i>	<i>394</i>	<i>4,106</i>	<i>202</i>	<i>696</i>	<i>128</i>	<i>928</i>	<i>7,406</i>
Wollongong	578	126	251	2,779	133	481	67	703	5,118
Nowra–Bomaderry	93	26	58	736	23	113	27	119	1,195
Illawarra SD Balance	116	13	85	591	46	102	34	106	1,093
South Eastern	265	35	165	2,027	116	258	64	436	3,366
Richmond–Tweed	425	76	267	2,642	118	387	176	549	4,640
Mid-north Coast	499	90	279	3,377	137	417	127	605	5,531
Northern	329	50	158	2,266	112	255	42	405	3,617
Far West–North Western	245	45	111	1,845	77	192	15	386	2,916
Central West	326	56	152	2,523	85	277	37	430	3,886
Murray–Murrumbidgee	452	85	239	3,106	139	334	60	655	5,070
<i>Total New South Wales</i>	<i>17,623</i>	<i>2,823</i>	<i>8,086</i>	<i>75,666</i>	<i>4,708</i>	<i>12,814</i>	<i>2,713</i>	<i>17,850</i>	<i>142,283</i>
<b>Victoria</b>									
Outer Western Melbourne	931	133	491	4,044	331	751	169	799	7,649
North Western Melbourne	339	58	203	1,402	162	318	76	458	3,016
Inner Melbourne	3,539	489	1,027	10,339	594	1,893	281	4,434	22,596
North Eastern Melbourne	1,116	192	412	4,966	311	767	166	1,106	9,036
Inner Eastern Melbourne	1,729	212	855	7,357	488	1,597	358	2,046	14,642
Southern Melbourne	838	133	607	4,618	331	1,066	242	685	8,520
Outer Eastern Melbourne	553	105	382	3,331	285	554	164	568	5,942
South Eastern Melbourne	560	87	308	2,350	195	422	116	454	4,492
Mornington Peninsula	480	90	259	3,120	136	441	124	437	5,087
Barwon–Western District	734	122	346	5,018	183	605	137	902	8,047
Central Highlands–Wimmera	405	59	181	3,315	104	333	88	536	5,021
Loddon–Mallee	432	71	223	3,566	140	415	94	550	5,491
Goulburn–Ovens–Murray	461	85	226	3,827	154	407	116	641	5,917
All Gippsland	408	54	208	2,848	128	391	99	568	4,704
<i>Total Victoria</i>	<i>12,781</i>	<i>1,927</i>	<i>5,788</i>	<i>61,845</i>	<i>3,583</i>	<i>10,181</i>	<i>2,314</i>	<i>14,584</i>	<i>113,003</i>

(continued)

**Table A.30 (continued): Persons employed in health occupations: statistical region of workplace, 2001**

Statistical region	Medical workers	Medical imaging workers	Dental workers	Nursing workers	Pharmacists	Allied health workers	Complementary therapies	Other health workers	Total health
<b>Queensland</b>									
<i>Brisbane City Inner Ring</i>	2,896	503	1,178	11,316	572	1,780	310	3,598	22,153
City Core	2,094	360	622	7,882	246	1,025	128	2,510	14,867
Northern Inner	198	10	207	669	87	230	66	210	1,677
Eastern Inner	140	9	94	428	61	131	47	116	1,026
Southern Inner	150	35	114	1,041	78	139	38	161	1,756
Western Inner	314	89	141	1,296	100	255	31	601	2,827
<i>Brisbane City Outer Ring</i>	828	150	593	5,060	342	968	192	1,213	9,346
Northern Outer	357	67	186	2,602	117	323	87	597	4,336
Eastern Outer	67	8	84	502	38	104	24	106	933
Southern Outer	255	64	224	1,087	118	265	51	372	2,436
Western Outer	149	11	99	869	69	276	30	138	1,641
<i>South &amp; East BSD Balance</i>	522	63	338	1,825	170	364	94	446	3,822
Logan City	267	37	151	897	81	164	36	202	1,835
Gold Coast City Part A	46	5	53	164	23	59	15	60	425
Beaudesert Shire Part A	37	—	16	38	7	9	3	16	126
Redland Shire	172	21	118	726	59	132	40	168	1,436
<i>North &amp; West BSD Balance</i>	666	108	483	3,283	269	543	106	647	6,105
Caboolture Shire Part A	144	24	113	743	58	99	29	144	1,354
Pine Rivers Shire	112	18	126	299	53	137	34	106	885
Redcliffe City	149	21	77	909	40	102	19	121	1,438
Ipswich City (Part in BSD)	261	45	167	1,332	118	205	24	276	2,428
<i>South and East Moreton</i>	820	155	514	4,079	240	595	214	853	7,470
Gold Coast City Part B	794	152	486	3,892	226	569	206	823	7,148
S and E Moreton Balance	26	3	28	187	14	26	8	30	322
North & West Moreton	578	103	359	2,969	165	436	189	656	5,455
Wide Bay–Burnett	352	64	260	2,503	101	284	76	477	4,117
<i>Darling Downs–South West</i>	490	57	315	3,698	154	368	72	680	5,834
Darling Downs	425	54	267	3,209	140	322	60	561	5,038
South West	65	3	48	489	14	46	12	119	796
<i>Mackay–Fitzroy–Central West</i>	533	68	379	3,666	137	399	104	1,141	6,427
Mackay	223	27	138	1,325	68	154	51	408	2,394
Fitzroy	286	38	226	2,117	63	221	47	671	3,669
Central West	24	3	15	224	6	24	6	62	364
<i>Northern–North West</i>	520	86	288	3,085	101	327	60	776	5,243
Northern	455	80	245	2,615	81	280	50	595	4,401
North West	65	6	43	470	20	47	10	181	842
Far North	454	46	262	2,292	115	269	88	699	4,225
<i>Total Queensland</i>	8,850	1,442	5,098	44,434	2,396	6,444	1,578	11,466	81,708

(continued)

**Table A.30 (continued): Persons employed in health occupations: statistical region of workplace, 2001**

Statistical region	Medical workers	Medical imaging workers	Dental workers	Nursing workers	Pharmacists	Allied health workers	Complementary therapies	Other health workers	Total health
<b>Western Australia</b>									
Central Metropolitan	1,993	337	773	8,091	273	1,388	121	2,464	15,440
East Metropolitan	283	51	300	1,495	131	292	79	278	2,909
North Metropolitan	554	86	520	2,294	233	679	141	430	4,937
South West Metropolitan	680	89	376	3,005	232	510	117	832	5,841
South East Metropolitan	370	50	394	2,216	238	578	119	655	4,620
Lower Western WA	360	61	288	2,764	132	439	98	576	4,718
Balance Western Australia	349	49	184	2,393	95	279	70	720	4,139
<i>Total WA</i>	<i>4,667</i>	<i>752</i>	<i>2,878</i>	<i>23,012</i>	<i>1,343</i>	<i>4,274</i>	<i>773</i>	<i>6,130</i>	<i>43,829</i>
<b>South Australia</b>									
Northern Adelaide	545	67	354	2,472	175	504	51	323	4,491
Western Adelaide	597	82	224	2,917	186	415	79	712	5,212
Eastern Adelaide	1,870	340	918	7,459	255	1,067	194	1,974	14,077
Southern Adelaide	814	106	415	3,985	202	701	130	694	7,047
North & Western SA	186	21	134	1,954	63	182	31	310	2,881
Southern & Eastern SA	292	29	217	2,146	105	280	99	382	3,550
<i>Total South Australia</i>	<i>4,393</i>	<i>677</i>	<i>2,306</i>	<i>21,678</i>	<i>1,009</i>	<i>3,210</i>	<i>615</i>	<i>4,532</i>	<i>38,420</i>
<b>Tasmania</b>									
Greater Hobart–Southern	692	104	257	3,357	203	526	56	663	5,858
Northern	309	64	128	1,909	96	214	45	345	3,110
Mersey–Lyell	167	23	99	1,183	53	152	33	209	1,919
<i>Total Tasmania</i>	<i>1,181</i>	<i>195</i>	<i>490</i>	<i>6,554</i>	<i>352</i>	<i>910</i>	<i>137</i>	<i>1,242</i>	<i>11,061</i>
<b>Australian Capital Territory</b>									
<i>Total Australian Capital Territory</i>	<i>1,041</i>	<i>148</i>	<i>538</i>	<i>3,450</i>	<i>231</i>	<i>738</i>	<i>135</i>	<i>1,090</i>	<i>7,371</i>
<b>Northern Territory</b>									
Darwin	309	32	113	1,154	51	195	31	361	2,246
Balance NT	201	18	50	908	17	97	6	424	1,721
<i>Total Northern Territory</i>	<i>515</i>	<i>50</i>	<i>169</i>	<i>2,101</i>	<i>71</i>	<i>295</i>	<i>40</i>	<i>802</i>	<i>4,043</i>
<b>Total Australia</b>	<b>51,051</b>	<b>8,014</b>	<b>25,353</b>	<b>238,740</b>	<b>13,693</b>	<b>38,866</b>	<b>8,305</b>	<b>57,696</b>	<b>441,718</b>

Notes: 1. 'Undefined' classification, e.g. 'Other NSW (undefined)', included in Total figures.  
2. Excludes those whose place of work varied in the reference week, or was not stated.

Source: ABS, Census of Population and Housing, 2001.

**Table A.31: Persons employed in community services occupations: statistical region of workplace, 2001**

Statistical region	Child and youth services	Family services	Disability workers	Aged or disabled carer	Other community services	Total community services	Total health and community services
<b>New South Wales</b>							
Inner Sydney	1,621	480	282	304	1,395	4,082	16,458
Eastern Suburbs	1,260	73	186	277	348	2,144	9,089
St George–Sutherland	1,769	137	515	522	496	3,439	11,955
Canterbury–Bankstown	1,028	127	289	295	364	2,103	5,820
Fairfield–Liverpool	1,112	199	336	240	654	2,541	7,811
Outer South Western Sydney	1,247	146	319	237	320	2,269	4,785
Inner Western Sydney	770	81	213	224	271	1,559	5,889
Central Western Sydney	1,177	367	400	378	851	3,173	13,507
North Western Sydney	2,759	284	764	532	913	5,252	13,260
Lower Northern Sydney	1,806	94	339	394	515	3,148	13,732
Central Northern Sydney	2,208	74	586	512	378	3,758	11,127
Northern Beaches	1,120	60	270	426	283	2,159	5,980
Gosford–Wyong	1,576	146	336	437	526	3,021	8,899
<i>Hunter</i>	2,485	407	766	1,008	1,173	5,839	19,211
Newcastle	1,869	335	602	782	1,008	4,596	15,941
Hunter SD Bal	616	72	164	226	165	1,243	3,270
<i>Illawarra</i>	1,812	264	543	707	793	4,119	11,525
Wollongong	1,182	191	401	444	593	2,811	7,929
Nowra–Bomaderry	261	36	67	120	120	604	1,799
Illawarra SD Bal	369	37	75	143	80	704	1,797
South Eastern	873	107	253	379	359	1,971	5,337
Richmond–Tweed	1,008	142	293	467	529	2,439	7,079
Mid-north Coast	1,304	212	407	717	632	3,272	8,803
Northern	866	121	342	497	386	2,212	5,829
Far West–North Western	669	116	249	409	311	1,754	4,670
Central West	789	122	279	408	336	1,934	5,820
Murray–Murrumbidgee	1,335	196	371	692	451	3,045	8,115
<i>Total New South Wales</i>	31,195	4,010	8,518	11,952	12,446	68,121	210,404
<b>Victoria</b>							
Outer Western Melbourne	2,359	280	996	917	1,042	5,594	13,243
North Western Melbourne	1,125	129	526	414	478	2,672	5,688
Inner Melbourne	1,821	433	389	674	1,912	5,229	27,825
North Eastern Melbourne	1,868	297	765	929	717	4,576	13,612
Inner Eastern Melbourne	2,944	526	1,217	1,493	1,046	7,226	21,868
Southern Melbourne	2,178	163	492	989	632	4,454	12,974
Outer Eastern Melbourne	1,828	149	746	859	519	4,101	10,043
South Eastern Melbourne	1,679	186	585	447	573	3,470	7,962
Mornington Peninsula	1,067	97	464	483	363	2,474	7,561
Barwon–Western District	1,434	320	839	1,112	743	4,448	12,495
Central Highlands–Wimmera	836	272	620	722	452	2,902	7,923
Loddon–Mallee	1,245	282	639	716	561	3,443	8,934
Goulburn–Ovens–Murray	1,417	228	605	860	524	3,634	9,551
All Gippsland	980	204	734	714	560	3,192	7,896
<i>Total Victoria</i>	23,301	3,670	9,739	13,543	10,250	60,503	173,506

(continued)

**Table A.31 (continued): Persons employed in community services occupations: statistical region of workplace, 2001**

Statistical region	Child and youth services	Family services	Disability workers	Aged or disabled carer	Other community services	Total community services	Total health and community services
<b>Queensland</b>							
<i>Brisbane City Inner Ring</i>	2,750	287	553	1,056	1,653	6,299	28,452
City Core	570	201	210	327	1,157	2,465	17,332
Northern Inner	813	31	142	352	202	1,540	3,217
Eastern Inner	574	10	57	112	77	830	1,856
Southern Inner	359	30	84	118	108	699	2,455
Western Inner	434	15	60	147	109	765	3,592
<i>Brisbane City Outer Ring</i>	3,072	118	947	1,233	597	5,967	15,313
Northern Outer	1,012	31	274	402	214	1,933	6,269
Eastern Outer	367	19	70	140	56	652	1,585
Southern Outer	839	37	277	401	173	1,727	4,163
Western Outer	854	31	326	290	154	1,655	3,296
<i>South &amp; East BSD Balance</i>	2,166	135	489	474	419	3,683	7,505
Logan City	1,115	90	246	170	206	1,827	3,662
Gold Coast City Part A	311	31	77	72	103	594	1,019
Beaudesert Shire Part A	107	0	13	13	0	128	254
Redland Shire	633	14	153	219	110	1,129	2,565
<i>North &amp; West BSD Balance</i>	2,423	139	824	756	543	4,685	10,790
Caboolture Shire Part A	619	34	168	174	143	1,138	2,492
Pine Rivers Shire	693	26	139	122	76	1,056	1,941
Redcliffe City	251	15	108	160	70	604	2,042
Ipswich City (Part in BSD)	860	64	409	300	254	1,887	4,315
<i>South and East Moreton</i>	2,106	95	373	812	505	3,891	11,361
Gold Coast City Part B	1,960	92	349	751	484	3,636	10,784
S and E Moreton Balance	146	3	24	61	21	255	577
North and West Moreton	1,532	79	384	632	378	3,005	8,460
Wide Bay–Burnett	1,252	102	410	745	389	2,898	7,015
<i>Darling Downs–South West</i>	1,454	99	348	687	438	3,026	8,860
Darling Downs	1,212	76	310	608	361	2,567	7,605
South West	242	23	38	79	77	459	1,255
<i>Mackay–Fitzroy–Central West</i>	1,974	140	509	762	532	3,917	10,344
Mackay	766	48	163	257	174	1,408	3,802
Fitzroy	1,071	89	303	437	319	2,219	5,888
Central West	137	3	43	68	39	290	654
<i>Northern–North West</i>	1,568	142	316	635	570	3,231	8,474
Northern	1,255	113	258	495	461	2,582	6,983
North West	313	29	58	140	109	649	1,491
Far North	1,310	120	268	458	469	2,625	6,850
<i>Total Queensland</i>	21,939	1,495	5,536	9,355	6,569	44,894	126,602

(continued)

**Table A.31 (continued): Persons employed in community services occupations: statistical region of workplace, 2001**

Statistical region	Child and youth services	Family services	Disability workers	Aged or disabled carer	Other community services	Total community services	Total health and community services
<b>Western Australia</b>							
Central Metropolitan	868	197	304	652	1,068	3,089	18,529
East Metropolitan	1,065	80	526	469	327	2,467	5,376
North Metropolitan	1,591	100	618	855	542	3,706	8,643
South West Metropolitan	1,182	95	402	591	447	2,717	8,558
South East Metropolitan	1,350	137	573	845	599	3,504	8,124
Lower Western WA	1,082	98	336	700	574	2,790	7,508
Balance WA	1,106	158	291	430	656	2,641	6,780
<i>Total Western Australia</i>	<i>8,428</i>	<i>897</i>	<i>3,134</i>	<i>5,207</i>	<i>4,283</i>	<i>21,949</i>	<i>65,778</i>
<b>South Australia</b>							
Northern Adelaide	1,554	125	547	864	738	3,828	8,319
Western Adelaide	842	89	251	694	447	2,323	7,535
Eastern Adelaide	1,469	239	243	1,255	1,256	4,462	18,539
Southern Adelaide	1,544	75	426	1,297	576	3,918	10,965
North & Western SA	753	78	223	521	410	1,985	4,866
Southern & Eastern SA	968	77	208	643	406	2,302	5,852
<i>Total South Australia</i>	<i>7,338</i>	<i>697</i>	<i>1,962</i>	<i>6,243</i>	<i>3,915</i>	<i>20,155</i>	<i>58,575</i>
<b>Tasmania</b>							
Greater Hobart–Southern	1,090	137	326	963	750	3,266	9,124
Northern	608	79	169	544	333	1,733	4,843
Mersey–Lyell	426	38	132	443	192	1,231	3,150
<i>Total Tasmania</i>	<i>2,183</i>	<i>266</i>	<i>647</i>	<i>2,167</i>	<i>1,303</i>	<i>6,566</i>	<i>17,627</i>
<b>Australian Capital Territory</b>							
<i>Total Australian Capital Territory</i>	<i>2,765</i>	<i>198</i>	<i>529</i>	<i>906</i>	<i>854</i>	<i>5,252</i>	<i>12,623</i>
<b>Northern Territory</b>							
Darwin	719	65	162	173	352	1,471	3,717
Balance NT	499	127	201	205	405	1,437	3,158
<i>Total Northern Territory</i>	<i>1,244</i>	<i>196</i>	<i>369</i>	<i>410</i>	<i>770</i>	<i>2,989</i>	<i>7,032</i>
<b>Total</b>	<b>98,393</b>	<b>11,429</b>	<b>30,434</b>	<b>49,783</b>	<b>40,390</b>	<b>230,429</b>	<b>672,147</b>

Notes: 1. 'Undefined' classification, e.g. *Other NSW (undefined)* included in Total figures.  
2. Excludes those whose place of work varied in the reference week, or was not stated.

Source: ABS, Census of Population and Housing, 2001.



**Table A.32: Persons employed in health occupations per 100,000 population: statistical region of workplace, 2001**

Statistical region	Medical workers	Medical imaging workers	Dental workers	Nursing workers	Pharmacists	Allied health workers	Complementary therapies	Other health workers	Total health
<b>New South Wales</b>									
Inner Sydney	740	90	345	1,611	140	426	101	875	4,328
Eastern Suburbs	515	64	193	1,353	103	344	73	392	3,038
St George–Sutherland	262	49	140	1,070	88	186	48	219	2,062
Canterbury–Bankstown	195	27	82	629	82	124	17	104	1,258
Fairfield–Liverpool	237	44	91	814	55	134	23	172	1,571
Outer South Western Sydney	123	26	70	604	45	113	20	105	1,106
Inner Western Sydney	406	40	154	1,543	87	241	55	253	2,780
Central Western Sydney	514	73	173	1,953	116	302	24	486	3,640
North Western Sydney	184	35	81	764	50	134	25	145	1,419
Lower Northern Sydney	556	82	232	1,700	134	401	87	632	3,824
Central Northern Sydney	217	36	147	981	90	229	46	156	1,901
Northern Beaches	206	32	124	834	94	234	72	141	1,737
Gosford–Wyong	210	42	100	1,224	57	161	29	225	2,047
<i>Hunter</i>	<i>243</i>	<i>46</i>	<i>104</i>	<i>1,416</i>	<i>55</i>	<i>176</i>	<i>32</i>	<i>289</i>	<i>2,360</i>
Newcastle	260	50	101	1,436	49	183	31	286	2,396
Hunter SD Bal	158	23	118	1,314	83	142	34	305	2,176
<i>Illawarra</i>	<i>205</i>	<i>43</i>	<i>103</i>	<i>1,070</i>	<i>53</i>	<i>181</i>	<i>33</i>	<i>242</i>	<i>1,931</i>
Wollongong	224	49	97	1,076	52	186	26	272	1,982
Nowra–Bomaderry	319	89	199	2,525	79	388	93	408	4,100
Illawarra SD Bal	121	14	88	614	48	106	35	110	1,136
South Eastern	142	19	88	1,083	62	138	34	233	1,799
Richmond–Tweed	205	37	129	1,274	57	187	85	265	2,237
Mid-north Coast	185	33	103	1,251	51	155	47	224	2,050
Northern	190	29	91	1,306	65	147	24	233	2,085
Far West–North Western	176	32	80	1,328	55	138	11	278	2,098
Central West	191	33	89	1,475	50	162	22	251	2,271
Murray–Murrumbidgee	177	33	93	1,214	54	131	23	256	1,981
<i>Total New South Wales</i>	<i>279</i>	<i>45</i>	<i>128</i>	<i>1,196</i>	<i>74</i>	<i>203</i>	<i>43</i>	<i>282</i>	<i>2,249</i>
<b>Victoria</b>									
Outer Western Melbourne	170	24	89	737	60	137	31	146	1,394
North Western Melbourne	129	22	77	532	62	121	29	174	1,145
Inner Melbourne	1,481	205	430	4,326	249	792	118	1,855	9,454
North Eastern Melbourne	271	47	100	1,205	75	186	40	268	2,193
Inner Eastern Melbourne	310	38	153	1,317	87	286	64	366	2,622
Southern Melbourne	222	35	161	1,221	88	282	64	181	2,253
Outer Eastern Melbourne	146	28	101	877	75	146	43	150	1,565
South Eastern Melbourne	161	25	89	676	56	121	33	131	1,292
Mornington Peninsula	200	37	108	1,300	57	184	52	182	2,119
Barwon–Western District	214	36	101	1,466	53	177	40	264	2,351
Central Highlands–Wimmera	217	32	97	1,777	56	179	47	287	2,692
Loddon–Mallee	174	29	90	1,437	56	167	38	222	2,213
Goulburn–Ovens–Murray	166	31	81	1,379	55	147	42	231	2,132
All Gippsland	176	23	90	1,226	55	168	43	245	2,025
<i>Total Victoria</i>	<i>274</i>	<i>41</i>	<i>124</i>	<i>1,327</i>	<i>77</i>	<i>218</i>	<i>50</i>	<i>313</i>	<i>2,424</i>

(continued)

**Table A.32 (continued): Persons employed in health occupations per 100,000 population: statistical region of workplace, 2001**

Statistical region	Medical workers	Medical imaging workers	Dental workers	Nursing workers	Pharmacists	Allied health workers	Complementary therapies	Other health workers	Total health
<b>Queensland</b>									
<i>Brisbane City Inner Ring</i>	780	135	317	3,048	154	479	83	969	5,966
City Core	3,140	540	933	11,817	369	1,537	192	3,763	22,290
Northern Inner	180	9	188	607	79	209	60	190	1,520
Eastern Inner	166	11	112	508	72	156	56	138	1,219
Southern Inner	270	63	205	1,872	140	250	68	289	3,157
Western Inner	576	163	259	2,377	183	468	57	1,102	5,185
<i>Brisbane City Outer Ring</i>	166	30	119	1,013	68	194	38	243	1,872
Northern Outer	209	39	109	1,521	68	189	51	349	2,534
Eastern Outer	112	13	140	836	63	173	40	177	1,554
Southern Outer	174	44	153	744	81	181	35	255	1,667
Western Outer	122	9	81	712	57	226	25	113	1,344
<i>South &amp; East BSD Balance</i>	149	18	96	520	48	104	27	127	1,090
Logan City	163	23	92	547	49	100	22	123	1,119
Gold Coast City Part A	102	11	118	365	51	131	33	133	945
Beaudesert Shire Part A	135	—	59	139	26	33	11	59	461
Redland Shire	150	18	103	634	52	115	35	147	1,254
<i>North &amp; West BSD Balance</i>	172	28	125	847	69	140	27	167	1,575
Caboolture Shire Part A	135	22	106	695	54	93	27	135	1,267
Pine Rivers Shire	94	15	105	250	44	114	28	89	739
Redcliffe City	305	43	158	1,863	82	209	39	248	2,948
Ipswich City (Part in BSD)	232	40	149	1,186	105	182	21	246	2,161
<i>South and East Moreton</i>	212	40	133	1,053	62	154	55	220	1,929
Gold Coast City Part B	219	42	134	1,075	62	157	57	227	1,975
S and E Moreton Balance	103	12	111	742	56	103	32	119	1,278
North and West Moreton	188	34	117	968	54	142	62	214	1,778
Wide Bay—Burnett	154	28	114	1,098	44	125	33	209	1,805
<i>Darling Downs—South West</i>	215	25	138	1,619	67	161	32	298	2,554
Darling Downs	210	27	132	1,585	69	159	30	277	2,488
South West	250	12	185	1,884	54	177	46	459	3,067
<i>Mackay—Fitzroy—Central West</i>	167	21	119	1,148	43	125	33	357	2,012
Mackay	168	20	104	1,000	51	116	38	308	1,806
Fitzroy	164	22	129	1,211	36	126	27	384	2,099
Central West	197	25	123	1,842	49	197	49	510	2,993
<i>Northern—North West</i>	239	39	132	1,416	46	150	28	356	2,406
Northern	248	44	134	1,427	44	153	27	325	2,401
North West	188	17	124	1,358	58	136	29	523	2,434
Far North	213	22	123	1,076	54	126	41	328	1,983
<i>Total Queensland</i>	251	41	145	1,262	68	183	45	326	2,320

(continued)

**Table A.32 (continued): Persons employed in health occupations per 100,000 population: statistical region of workplace, 2001**

Statistical region	Medical workers	Medical imaging workers	Dental workers	Nursing workers	Pharmacists	Allied health workers	Complementary therapies	Other health workers	Total health
<b>Western Australia</b>									
Central Metropolitan	1,714	290	665	6,960	235	1,194	104	2,120	13,282
East Metropolitan	122	22	130	646	57	126	34	120	1,257
North Metropolitan	139	22	130	574	58	170	35	108	1,235
South West Metropolitan	241	32	133	1,066	82	181	42	295	2,073
South East Metropolitan	120	16	128	722	77	188	39	213	1,504
Lower Western WA	142	24	114	1,090	52	173	39	227	1,860
Balance WA	151	21	79	1,032	41	120	30	310	1,785
<i>Total Western Australia</i>	<i>255</i>	<i>41</i>	<i>157</i>	<i>1,259</i>	<i>73</i>	<i>234</i>	<i>42</i>	<i>335</i>	<i>2,397</i>
<b>South Australia</b>									
Northern Adelaide	161	20	104	728	52	149	15	95	1,323
Western Adelaide	294	40	110	1,436	92	204	39	350	2,565
Eastern Adelaide	870	158	427	3,471	119	497	90	919	6,551
Southern Adelaide	257	34	131	1,260	64	222	41	219	2,228
North & Western SA	121	14	87	1,267	41	118	20	201	1,868
Southern & Eastern SA	123	12	91	901	44	118	42	160	1,490
<i>Total South Australia</i>	<i>299</i>	<i>46</i>	<i>157</i>	<i>1,475</i>	<i>69</i>	<i>218</i>	<i>42</i>	<i>308</i>	<i>2,614</i>
<b>Tasmania</b>									
Greater Hobart–Southern	307	46	114	1,488	90	233	25	294	2,596
Northern	238	49	98	1,468	74	165	35	265	2,392
Mersey–Lyell	161	22	95	1,139	51	146	32	201	1,847
<i>Total Tasmania</i>	<i>256</i>	<i>42</i>	<i>106</i>	<i>1,423</i>	<i>76</i>	<i>198</i>	<i>30</i>	<i>270</i>	<i>2,401</i>
<b>Australian Capital Territory</b>									
<i>Total Australian Capital Territory</i>	<i>336</i>	<i>48</i>	<i>174</i>	<i>1,113</i>	<i>75</i>	<i>238</i>	<i>44</i>	<i>352</i>	<i>2,378</i>
<b>Northern Territory</b>									
Darwin	308	32	113	1,151	51	195	31	360	2,240
Balance NT	235	21	58	1,062	20	113	7	496	2,013
<i>Total Northern Territory</i>	<i>274</i>	<i>27</i>	<i>90</i>	<i>1,117</i>	<i>38</i>	<i>157</i>	<i>21</i>	<i>426</i>	<i>2,150</i>
<b>Total</b>	<b>272</b>	<b>43</b>	<b>135</b>	<b>1,272</b>	<b>73</b>	<b>207</b>	<b>44</b>	<b>307</b>	<b>2,354</b>

Notes: 1. 'Undefined' classification, e.g. *Other NSW (undefined)* included in Total figures  
2. Excludes those whose place of work varied in the reference week, or was not stated.

Source: ABS, Census of Population and Housing, 2001.

**Table A.33: Employed persons per 100,000 population: statistical region of workplace and selected health occupation, 2001**

<b>Statistical region</b>	<b>Generalist medical practitioner</b>	<b>Dentist</b>	<b>Retail pharmacist</b>	<b>Ambulance officer and paramedic</b>	<b>Optometrist</b>	<b>Physio-therapist</b>	<b>Clinical psych-ologist</b>
<b>New South Wales</b>							
Inner Sydney	365	118	116	78	40	93	137
Eastern Suburbs	265	75	90	22	31	88	95
St-George–Sutherland	156	46	78	23	17	58	24
Canterbury–Bankstown	140	31	75	21	16	32	18
Fairfield–Liverpool	140	30	49	16	12	36	27
Outer South Western Sydney	83	19	43	26	9	25	21
Inner Western Sydney	218	58	73	22	19	55	54
Central Western Sydney	246	59	87	23	15	78	59
North Western Sydney	116	24	46	23	10	35	28
Lower Northern Sydney	270	84	107	18	27	102	99
Central Northern Sydney	140	50	82	15	15	76	28
Northern Beaches	133	44	85	21	19	71	41
Gosford–Wyong	129	25	52	46	11	46	21
Hunter	143	26	49	53	10	43	37
Illawarra	126	29	48	50	11	49	39
South Eastern	90	27	58	59	6	43	28
Richmond–Tweed	121	35	49	40	11	54	35
Mid-north Coast	113	27	49	39	14	42	26
Northern	120	24	60	63	7	44	23
Far West–North Western	99	23	50	91	9	32	17
Central West	111	20	45	63	12	36	25
Murray–Murrumbidgee	86	24	51	52	7	32	18
<i>Total New South Wales</i>	<i>157</i>	<i>40</i>	<i>66</i>	<i>37</i>	<i>15</i>	<i>54</i>	<i>41</i>
<b>Victoria</b>							
Outer Western Melbourne	112	30	55	21	10	34	27
North Western Melbourne	99	22	54	14	9	27	25
Inner Melbourne	625	127	133	32	49	179	247
North Eastern Melbourne	153	32	65	12	10	48	40
Inner Eastern Melbourne	175	49	73	61	17	72	65
Southern Melbourne	136	48	82	12	17	73	55
Outer Eastern Melbourne	100	28	63	24	11	34	31
South Eastern Melbourne	110	27	52	19	11	29	26
Mornington Peninsula	117	32	52	45	8	44	29
Barwon–Western District	123	27	49	34	11	46	26
Central Highlands–Wimmera	122	23	50	45	10	39	27
Loddon–Mallee	110	25	52	47	10	43	25
Goulburn–Ovens–Murray	108	22	50	52	12	40	15
All Gippsland	113	23	50	56	11	36	30
<i>Total Victoria</i>	<i>153</i>	<i>37</i>	<i>64</i>	<i>34</i>	<i>14</i>	<i>53</i>	<i>47</i>

(continued)

**Table A.33 (continued) Employed persons per 100,000 population: statistical region of workplace and selected health occupation, 2001**

<b>Statistical region</b>	<b>Generalist medical practitioner</b>	<b>Dentist</b>	<b>Retail pharmacist</b>	<b>Ambulance officer</b>	<b>Optometrist</b>	<b>Physio-therapist</b>	<b>Clinical psych-ologist</b>
<b>Queensland</b>							
Brisbane City Inner Ring	342	83	116	32	28	143	83
Brisbane City Outer Ring	112	34	60	31	14	54	28
South & East BSD Balance	105	25	45	31	12	27	17
North & West BSD Balance	116	33	63	36	11	31	24
South and East Moreton	124	36	58	29	13	38	27
Darling Downs–South West	138	35	61	62	14	40	27
Mackay–Fitzroy–Central	108	28	41	68	11	26	21
Northern–North West	129	29	40	59	15	32	36
Far North	123	37	51	55	12	32	20
<i>Total Queensland</i>	<i>143</i>	<i>37</i>	<i>60</i>	<i>44</i>	<i>15</i>	<i>48</i>	<i>31</i>
<b>Western Australia</b>							
Central Metropolitan	742	162	141	25	52	311	287
East Metropolitan	93	33	57	8	9	33	18
North Metropolitan	98	34	57	9	10	43	23
South West Metropolitan	143	36	72	17	13	50	29
South East Metropolitan	84	34	70	41	12	38	35
Lower Western WA	95	30	50	14	11	46	23
Balance WA	95	23	40	13	6	38	18
<i>Total Western Australia</i>	<i>144</i>	<i>41</i>	<i>64</i>	<i>19</i>	<i>13</i>	<i>60</i>	<i>43</i>
<b>South Australia</b>							
Northern Adelaide	115	31	47	11	6	40	19
Western Adelaide	174	32	72	24	9	68	21
Eastern Adelaide	364	112	95	76	26	136	109
Southern Adelaide	161	36	58	18	10	65	26
North & Western SA	92	23	39	34	6	34	4
Southern & Eastern SA	100	25	43	42	8	40	6
<i>Total South Australia</i>	<i>167</i>	<i>43</i>	<i>60</i>	<i>33</i>	<i>11</i>	<i>64</i>	<i>31</i>
<b>Tasmania</b>							
Greater Hobart/Southern	172	27	76	26	16	58	39
Northern	135	22	65	32	12	41	15
Mersey–Lyell	111	17	47	29	9	38	14
<i>Total Tasmania</i>	<i>148</i>	<i>23</i>	<i>66</i>	<i>28</i>	<i>13</i>	<i>49</i>	<i>27</i>
<b>Australian Capital Territory</b>							
<i>Total Australian Capital Territory</i>	<i>175</i>	<i>50</i>	<i>61</i>	<i>28</i>	<i>14</i>	<i>65</i>	<i>58</i>
<b>Northern Territory</b>							
Darwin	172	37	48	29	14	48	43
Balance NT	137	21	16	41	6	32	15
<i>Total Northern Territory</i>	<i>156</i>	<i>31</i>	<i>35</i>	<i>36</i>	<i>10</i>	<i>41</i>	<i>30</i>
<b>Total</b>	<b>153</b>	<b>39</b>	<b>63</b>	<b>35</b>	<b>14</b>	<b>54</b>	<b>40</b>

Note: Excludes those whose place of work varied in the reference week, or was not stated.

Source: ABS, Census of Population and Housing, 2001.

**Table A.34: Persons employed in community services occupations per 100,000 population: statistical region of workplace and occupation, 2001**

Statistical region	Child and youth services	Family services	Disability workers	Aged or disabled carer	Other community services	Total community services	Total health and community services
<b>New South Wales</b>							
Inner Sydney	567	168	99	106	488	1,427	5,755
Eastern Suburbs	551	32	81	121	152	938	3,976
St George–Sutherland	428	33	125	126	120	833	2,894
Canterbury–Bankstown	348	43	98	100	123	712	1,970
Fairfield–Liverpool	332	59	100	72	195	758	2,329
Outer South Western Sydney	548	64	140	104	141	998	2,104
Inner Western Sydney	494	52	137	144	174	1,001	3,780
Central Western Sydney	415	129	141	133	300	1,118	4,758
North Western Sydney	489	50	135	94	162	931	2,349
Lower Northern Sydney	652	34	122	142	186	1,137	4,961
Central Northern Sydney	570	19	151	132	98	970	2,871
Northern Beaches	509	27	123	194	129	982	2,719
Gosford–Wyong	549	51	117	152	183	1,052	3,099
<i>Hunter</i>	439	72	135	178	207	1,031	3,391
Newcastle	395	71	127	165	213	971	3,367
Hunter SD Bal	661	77	176	243	177	1,335	3,511
<i>Illawarra</i>	472	69	142	184	207	1,074	3,005
Wollongong	458	74	155	172	230	1,089	3,071
Nowra–Bomaderry	896	124	230	412	412	2,072	6,173
Illawarra SD Bal	383	38	78	149	83	731	1,867
South Eastern	467	57	135	203	192	1,053	2,852
Richmond–Tweed	486	68	141	225	255	1,176	3,413
Mid-north Coast	483	79	151	266	234	1,212	3,262
Northern	499	70	197	287	223	1,275	3,361
Far West–North Western	481	83	179	294	224	1,262	3,361
Central West	461	71	163	238	196	1,130	3,402
Murray–Murrumbidgee	522	77	145	270	176	1,190	3,171
<i>Total New South Wales</i>	493	63	135	189	197	1,077	3,326
<b>Victoria</b>							
Outer Western Melbourne	430	51	181	167	190	1,019	2,413
North Western Melbourne	427	49	200	157	181	1,015	2,160
Inner Melbourne	762	181	163	282	800	2,188	11,642
North Eastern Melbourne	453	72	186	226	174	1,111	3,304
Inner Eastern Melbourne	527	94	218	267	187	1,294	3,915
Southern Melbourne	576	43	130	262	167	1,178	3,431
Outer Eastern Melbourne	482	39	197	226	137	1,080	2,645
South Eastern Melbourne	483	54	168	129	165	998	2,290
Mornington Peninsula	444	40	193	201	151	1,031	3,150
Barwon–Western District	419	94	245	325	217	1,300	3,651
Central Highlands–Wimmera	448	146	332	387	242	1,556	4,247
Loddon-Mallee	502	114	258	289	226	1,388	3,601
Goulburn–Ovens–Murray	511	82	218	310	189	1,309	3,441
All Gippsland	422	88	316	307	241	1,374	3,399
<i>Total Victoria</i>	500	79	209	291	220	1,298	3,723

(continued)

**Table A.34 (continued): Persons employed in community services occupations per 100,000 population: statistical region of workplace and occupation, 2001**

Statistical region	Child and youth services	Family services	Disability workers	Aged or disabled carer	Other community services	Total community services	Total health and community services
<b>Queensland</b>							
<i>Brisbane City Inner Ring</i>	741	77	149	284	445	1,696	7,663
City Core	855	301	315	490	1,735	3,696	25,986
Northern Inner	737	28	129	319	183	1,396	2,917
Eastern Inner	682	12	68	133	91	986	2,205
Southern Inner	645	54	151	212	194	1,257	4,414
Western Inner	796	28	110	270	200	1,403	6,588
<i>Brisbane City Outer Ring</i>	615	24	190	247	120	1,195	3,067
Northern Outer	591	18	160	235	125	1,130	3,664
Eastern Outer	611	32	117	233	93	1,086	2,640
Southern Outer	574	25	190	274	118	1,182	2,849
Western Outer	700	25	267	238	126	1,356	2,700
<i>South &amp; East BSD Balance</i>	618	38	139	135	119	1,050	2,140
Logan City	680	55	150	104	126	1,115	2,234
Gold Coast City Part A	691	69	171	160	229	1,320	2,265
Beaudesert Shire Part A	392	—	48	48	—	468	930
Redland Shire	553	12	134	191	96	986	2,240
<i>North &amp; West BSD Balance</i>	625	36	213	195	140	1,208	2,783
Caboolture Shire Part A	579	32	157	163	134	1,065	2,332
Pine Rivers Shire	579	22	116	102	63	882	1,621
Redcliffe City	515	31	221	328	143	1,238	4,186
Ipswich City (Part in BSD)	766	57	364	267	226	1,680	3,841
<i>South and East Moreton</i>	544	25	96	210	130	1,005	2,934
Gold Coast City Part B	541	25	96	207	134	1,004	2,979
S and E Moreton Balance	579	12	95	242	83	1,012	2,289
North and West Moreton	499	26	125	206	123	979	2,757
Wide Bay–Burnett	549	45	180	327	171	1,271	3,076
<i>Darling Downs–South West</i>	637	43	152	301	192	1,325	3,879
Darling Downs	599	38	153	300	178	1,268	3,756
South West	932	89	146	304	297	1,769	4,836
<i>Mackay–Fitzroy–Central West</i>	618	44	159	239	167	1,226	3,238
Mackay	578	36	123	194	131	1,062	2,869
Fitzroy	613	51	173	250	183	1,270	3,369
Central West	1,126	25	354	559	321	2,384	5,377
<i>Northern–North West</i>	720	65	145	291	262	1,483	3,889
Northern	685	62	141	270	252	1,409	3,810
North West	905	84	168	405	315	1,876	4,309
Far North	615	56	126	215	220	1,232	3,215
<i>Total Queensland</i>	623	42	157	266	187	1,275	3,595

(continued)

**Table A.34 (continued): Persons employed in community services occupations per 100,000 population: statistical region of workplace and occupation, 2001**

Statistical region	Child and youth services	Family services	Disability workers	Aged or disabled carer	Other community services	Total community services	Total health and community services
<b>Western Australia</b>							
Central Metropolitan	747	169	262	561	919	2,657	15,939
East Metropolitan	460	35	227	203	141	1,066	2,323
North Metropolitan	398	25	155	214	136	927	2,162
South West Metropolitan	419	34	143	210	159	964	3,037
South East Metropolitan	440	45	187	275	195	1,141	2,645
Lower Western WA	427	39	132	276	226	1,100	2,960
Balance WA	477	68	125	185	283	1,139	2,924
<i>Total Western Australia</i>	<i>461</i>	<i>49</i>	<i>171</i>	<i>285</i>	<i>234</i>	<i>1,201</i>	<i>3,598</i>
<b>South Australia</b>							
Northern Adelaide	458	37	161	255	217	1,128	2,451
Western Adelaide	414	44	124	342	220	1,143	3,708
Eastern Adelaide	684	111	113	584	585	2,077	8,628
Southern Adelaide	488	24	135	410	182	1,238	3,466
North & Western SA	488	51	145	338	266	1,287	3,156
Southern & Eastern SA	406	32	87	270	170	966	2,457
<i>Total South Australia</i>	<i>499</i>	<i>47</i>	<i>133</i>	<i>425</i>	<i>266</i>	<i>1,371</i>	<i>3,985</i>
<b>Tasmania</b>							
Greater Hobart–Southern	483	61	144	427	332	1,447	4,043
Northern	468	61	130	418	256	1,333	3,725
Mersey–Lyell	410	37	127	426	185	1,185	3,032
<i>Total Tasmania</i>	<i>474</i>	<i>58</i>	<i>140</i>	<i>470</i>	<i>283</i>	<i>1,425</i>	<i>3,826</i>
<b>Australian Capital Territory</b>							
<i>Total Australian Capital Territory</i>	<i>892</i>	<i>64</i>	<i>171</i>	<i>292</i>	<i>275</i>	<i>1,694</i>	<i>4,072</i>
<b>Northern Territory</b>							
Darwin	717	65	162	173	351	1,467	3,708
Balance NT	584	149	235	240	474	1,681	3,695
<i>Total Northern Territory</i>	<i>661</i>	<i>104</i>	<i>196</i>	<i>218</i>	<i>409</i>	<i>1,589</i>	<i>3,739</i>
<b>Total</b>	<b>524</b>	<b>61</b>	<b>162</b>	<b>265</b>	<b>215</b>	<b>1,228</b>	<b>3,581</b>

Note: 1. 'Undefined' classification, e.g. *Other NSW (undefined)* included in Total figures.  
2. Excludes those whose place of work varied in the reference week, or was not stated.

Source: ABS, Census of Population and Housing, 2001.



# Explanatory notes

## Counts

All census data in this publication are the counts of people as recorded in the census (raw counts), without adjustment for non-response or under-enumeration. Full details of the census methodology may be obtained on the internet at <<http://www.abs.gov.au>>.

Counts of persons in a given occupation or occupational group may vary from one table to the next, for a number of reasons:

- Varying response rates to individual questions in the census may result in some persons being excluded from the analysis of a given variable.
- The ABS routinely rounds up small numbers in its census data in order to protect the confidentiality of individuals: a single person in a table cell may be reported as three persons. This leads to small discrepancies in total values between tables. Unfortunately, this process may have altered the accuracy of data regarding Indigenous participation in health and community services occupations – where participation is low, the small estimates reported for many occupations might actually seem to increase participation.

## Industry

Industry is classified to the *ABS Australian and New Zealand Standard Industrial Classification*, 1993 edition in the 1996 and 2001 censuses. In the 1991 census industry was classified to the *Australian Standard Industry Classification*. Therefore industry data for 2001 and 1996 are not directly comparable with previous censuses. This affects only a small number of tables in this publication. The industries included in this publication are shown below.

Subdivision 86: Health Services

- 861: Hospitals and Nursing Homes
- 8611: Hospitals (Except Psychiatric Hospitals)
- 8612: Psychiatric Hospitals
- 8613: Nursing Homes
- 862: Medical and Dental Services
- 8621: General Practice Medical Services
- 8622: Specialist Medical Services
- 8623: Dental Services
- 863: Other Health Services
- 8631: Pathology Services
- 8632: Optometry and Optical Dispensing
- 8633: Ambulance Services
- 8634: Community Health Centres

- 8635: Physiotherapy Services
- 8636: Chiropractic Services
- 8639: Health Services nec
- Subdivision 87: Community Services
- 871: Child Care Services
- 8710: Child Care Services
- 872: Community Care Services
- 8721: Accommodation for the Aged
- 8722: Residential Care Services nec
- 8729: Non-Residential Care Services nec

## Occupation

Occupation data in the 1996 and 2001 censuses were classified to the *ABS Australian Standard Classification of Occupations (ASCO)*, 2nd edition, and the 1991 census data were classified to the ASCO 1st edition. Therefore the 1996 and 2001 data may be not be directly comparable at the occupation level (6 digit) with previous censuses, but may be comparable at the broader level (4-digit).

The occupations included in this publication are shown below.

ASCO code	Occupation title	Description
<b>Health occupations</b>		
<i>Medical workers</i>		
1292-13	Medical administrator	Directs and manages the professional activities of medical staff in hospitals, health services and health service facilities.
231	Medical practitioner nfd	Diagnose physical and mental illnesses, disorders and injuries and prescribe medications and treatment to promote or restore good health.
2311-11	Generalist medical practitioner	Diagnoses, treats and prevents human physical and mental disorders and injuries.
2311-81	Medical practitioner in training	Undertakes diagnosis, treatment and prevention of human physical and mental disorders and injuries, under the supervision of specialists or senior general practitioners.
2312	Specialist medical practitioner nfd	Diagnose and treat physical and mental diseases and disorders using specialist testing, diagnostic, medical and surgical techniques. Medical registrars who are training as specialist medical practitioners are included in this unit group.
2312-11	Anaesthetist	Administers anaesthetics to prevent pain and maintain major body function throughout surgical and related procedures.
2312-13	Dermatologist	Provides diagnostic, treatment and preventative medical services related to human skin disorders.
2312-15	Emergency medicine specialist	Diagnoses and manages patients with acute and urgent illness and injury.

(continued)

<b>ASCO code</b>	<b>Occupation title</b>	<b>Description</b>
2312-17	Obstetrician and gynaecologist	Provides diagnostic, treatment and preventative medical services related to disorders of the female genital, urinary, rectal and reproductive organs, and the care of women during pregnancy and childbirth.
2312-19	Ophthalmologist	Provides diagnostic, treatment and preventative medical services related to diseases, injuries and deficiencies of the human eye and associated structures.
2312-21	Paediatrician	Provides specialist medical services to children from birth up to and including adolescence.
2312-23	Pathologist	Identifies and diagnoses the presence and stages of diseases and possible sources of infection in body tissues, fluids, secretions and other specimens.
2312-25	Specialist physician	Investigates and diagnoses internal human disorders and diseases, and administers treatment.
2312-27	Psychiatrist	Diagnoses, treats and prevents human mental, emotional and behavioural disorders.
2312-29	Radiologist	Diagnoses and treats diseases of the human body using radiant energies such as X-rays, ultrasound, gamma rays and radio waves.
2312-31	Surgeon	Performs surgery to correct deformities, repair injuries, prevent and treat diseases and improve human body functions and appearance.
2312-79	Specialist medical practitioner nec	This occupation group covers specialist medical practitioners not elsewhere classified.
<i>Medical imaging workers</i>		
2391-11	Medical diagnostic radiographer	Operates X-ray and other medical imaging equipment to produce images for medical diagnostic purposes in conjunction with radiologists or other medical specialists.
2391-13	Radiation therapist	Operates high energy X-ray and other radiation and electron generating and monitoring equipment to administer radiation treatment for medical purposes in conjunction with radiologists or other medical specialists.
2391-15	Nuclear Medicine technologist	Performs or assists in the performance of diagnostic examinations using radionuclides and radiopharmaceuticals, and administers radionuclides for therapeutic purposes under the direction of nuclear medicine specialists or other specialist medical practitioners.
2391-17	Sonographer	Operates ultrasound machines and related medical imaging equipment to produce images for medical diagnostic purposes in conjunction with other medical professionals.

(continued)

<b>ASCO code</b>	<b>Occupation title</b>	<b>Description</b>
<i>Dental workers</i>		
2381-11	Dentist	Diagnoses and treats diseases, injuries and abnormalities of teeth, gums and related oral structures, prescribes and administers restorative and preventive procedures, and conducts surgery or uses other specialist techniques.
2381-13	Dental specialist	Diagnoses and treats diseases, injuries, irregularities and malformations of teeth and associated structures in the mouth and jaw using surgery or other specialist techniques.
3492	Dental associate professional nfd	Examine and treat ailments of the teeth and gums under the supervision of dentists, carry out preventative therapy, and construct and repair dentures and other dental devices.
3492-11	Dental therapist	Examines and treats ailments of the teeth and gums, mainly among pre-school and primary school age children, under the supervision of dentists.
3492-13	Dental hygienist	Carries out preventative therapy related to dental hygiene under the direction of dentists.
3492-15	Dental technician	Constructs and repairs dentures and other dental devices.
6391-11	Dental assistant	Prepares patients for dental examinations and assists dentists in providing care and treatment.
<i>Nursing workers</i>		
1292-11	Director of nursing	Directs and manages nursing programs and clinical services in hospitals, nursing homes and other health service facilities and maintains standards of nursing care.
232	Nursing professional nec	Treat and care for the physically or mentally ill, the elderly, and mothers and their babies in hospitals, nursing homes, medical centres and the community. They provide health counselling for individuals and families, manage human and material resources for a nursing group or unit and are responsible for the professional development of nurses and for researching issues concerning nursing practice.
2321-11	Nurse manager	Manages a hospital nursing care unit or other sub unit of a hospital, nursing home or health care facility, or supervises nursing staff for a particular unit or shift.
2322-11	Nurse educator	Assesses, plans, implements and evaluates nursing education and professional development programs.
2322-13	Nurse researcher	Conducts research into nursing issues.
2323-11	Registered nurse	Provides nursing care for patients in hospitals, nursing homes, extended care facilities or other health care facilities and in the community.

(continued)

<b>ASCO code</b>	<b>Occupation title</b>	<b>Description</b>
2324-11	Registered midwife	Provides care and advice during pregnancy, labour and birth and provides postnatal care for women and babies.
2325-11	Registered mental health nurse	Treats and cares for people with mental illness, disorder or dysfunction, or those experiencing emotional difficulties, distress or crisis, in hospitals, nursing homes and the community.
2326-11	Registered developmental disability nurse	Provides nursing care to people with intellectual disabilities.
3411-11	Enrolled nurse	Assists registered nurses, doctors and other health professionals in the provision of patient care in hospitals, nursing homes and other health care facilities.
6314-11	Personal care assistant	Assists with the care of patients in a range of health care facilities, or in the client's home.
6314-13	Nursing assistant	Assists registered nurses in hospitals, nursing homes and other health care facilities, in the provision of patient care.
<i>Pharmacist workers</i>		
2382-11	Hospital pharmacist	Prepares and dispenses pharmaceuticals, drugs and medicines in hospital pharmacies.
2382-13	Industrial pharmacist	Undertakes research, testing and analysis related to the development, production, storage, quality control and distribution of drugs and related supplies.
2382-15	Retail pharmacist	Compounds and dispenses prescribed pharmaceuticals in retail outlets and sells non-prescription medicines and related goods.
<i>Allied health workers</i>		
2383-11	Occupational therapist	Assesses the function of people whose abilities and daily activities are impaired.
2384-11	Optometrist	Performs eye examinations and vision tests to determine the presence of visual, ocular and other abnormalities, and prescribes lenses, other optical aids or therapy.
2385-11	Physiotherapist	Assesses, treats and prevents disorders in human movement caused by injury or disease.
2386-11	Speech pathologist	Assesses and treats people with communication disorders including speech, language, voice, fluency and literacy difficulties or people who have physical problems with eating or swallowing.
2388-11	Podiatrist	Prevents, diagnoses and treats medical and surgical conditions of the feet, including those resulting from bone and joint disorders, muscular pathologies as well as neurological and circulatory diseases.
2393-11	Dietitian	Assists individuals, groups and communities to attain, maintain and promote health through good diet and nutrition.
2399-11	Audiologist	Provides diagnostic assessment and rehabilitative services related to human hearing defects.

(continued)

<b>ASCO code</b>	<b>Occupation title</b>	<b>Description</b>
2399-13	Orthoptist	Diagnoses and manages eye movement disorders and associated sensory deficiencies.
2399-15	Orthotist	Designs, builds, fits and repairs splints, braces, callipers and related appliances to restore functions or compensate for muscular or skeletal disabilities.
2399-79	Health professional nec	This occupation group covers health professionals not elsewhere classified.
2514-11	Clinical psychologist	Consults with individuals and groups, assesses psychological disorders and administers programs of treatment.
6313-19	Therapy aide	Provides assistance to occupational, diversional or physiotherapists in therapy programs and care of their patients.
<i>Complementary therapies</i>		
2387-11	Chiropractor	Diagnoses, treats and provides preventative advice on physiological and mechanical disorders of the human locomotor system, particularly neuro-muscular skeletal disorders.
2387-13	Osteopath	Diagnoses, treats and provides preventative advice on physiological and mechanical disorders of the human locomotor system.
2394-11	Naturopath	Treats internal health problems, metabolic disorders and imbalances, through treatment of the whole person, using natural therapies.
2394-13	Acupuncturist	Treats disorders and illnesses by stimulating the body's defence mechanisms through fine-needle insertions into the skin.
2394-79	Natural therapy professional nec	This occupation group covers natural therapy professionals not elsewhere classified.
6395-13	Natural remedy consultant	Uses traditional techniques or diagnostic methods for treatment, relaxation or health purposes.
<i>Miscellaneous health workers</i>		
2113-11	Anatomist or physiologist	Studies the anatomy or physiology of humans.
2115	Medical scientist	Conducts medical laboratory tests to develop applications for the diagnosis, treatment and prevention of disease and testing of drugs for therapeutic use.
2129-15	Biomedical engineer	Applies knowledge and methodology of physics, engineering, mathematics, computing, physical chemistry and materials science to problems in biology and prevention of human disease.
2299-11	Health information manager	Designs, implements and administers medical record systems and information services in accordance with legal and confidentiality requirements.
2543-11	Occupational health and safety officer	Develops, implements and evaluates policies and programs to ensure safe and healthy working conditions, and assists injured staff through the workers' compensation and rehabilitation process.

(continued)

<b>ASCO code</b>	<b>Occupation title</b>	<b>Description</b>
2543-13	Environmental health officer	Develops, implements and evaluates environmental health policies, programs and issues, and oversees the implementation and monitoring of environmental health legislation.
3111	Medical technical officers	Perform or assist with laboratory tests and operate diagnostic and monitoring equipment used in support of health professionals.
3491-11	Ambulance officer	Provides specialised transport services and emergency health care for injured, sick, infirm and aged persons.
3491-13	Intensive care ambulance paramedic	Provides specialised pre-hospital health care to injured, sick, infirm and aged persons and emergency transport to medical facilities.
3493-11	Aboriginal and Torres Strait Islander health worker	Liaises with patients, clients and visitors to hospitals and health clinics and works as a team member to arrange, coordinate and provide health care delivery in Aboriginal and Torres Strait Islander community health clinics.
3494-11	Massage therapist	Performs therapeutic massage and administers body treatments for relaxation, health, fitness and remedial purposes.
3991-11	Primary products inspector	Inspects animals, plants, agricultural produce and facilities to ensure conformity with government and industry standards with respect to quality, health and licensing.
3992-11	Safety inspector	Inspects machinery, equipment, working conditions and public places to ensure conformity with government and industry standards and regulations, in relation to occupational health and safety.
6191-13	Admissions clerk	Records and processes information required for the admission and discharge of hospital patients and responds to telephone inquiries.
6395-15	Weight loss consultant	Assists clients with advice and practical solutions for losing weight.
<b>Welfare and community services occupations</b>		
<i>Child and youth services workers</i>		
1295-11	Child care coordinator	Directs the activities of a child care centre or service.
2411-11	Pre-primary school teacher	Teaches the basics of numeracy, literacy, music, art and literature to students at pre-primary schools and promotes students' social, emotional, intellectual and physical development.
3421-13	Youth worker	Assists young people as individuals or groups to solve social, emotional and financial problems in an agency framework.
6311-11	Pre-school aide	Provides care and supervision for children at pre-school centres under the direction of pre-school teachers.
6312-11	Child care worker	Provides care and supervision for children in programs such as long day care and occasional care in child care centres, hospitals and educational centres.

(continued)

<b>ASCO code</b>	<b>Occupation title</b>	<b>Description</b>
6312-13	Family day care worker	Provides care and supervision for babies and children, usually in worker's own home, under local government or community-based schemes.
6312-15	Nanny	Assists parents in the provision of on going care and supervision for babies and children, usually in the child's home.
6313-11	Hostel parent	Operates residential child care establishments, which provide home environments for children.
6313-13	Child or youth residential care assistant	Provides care and supervision for children in correctional services institutions.
<i>Family services workers</i>		
2512-11	Welfare worker	Assists individuals, families and groups with social, emotional and financial difficulties to improve quality of life by educating and supporting them and working towards change in their social environment.
2513-15	Family counsellor	Assists individuals, couples or families with marriage or relationship difficulties.
3421-19	Family support worker	Assists the work of social and welfare workers by providing services and support to families.
<i>Disability workers</i>		
2414-11	Special needs teacher	Teaches primary and secondary school students with particular learning difficulties and promotes students' social, emotional, intellectual and physical development.
2414-13	Teacher of the hearing-impaired	Teaches academic and living skills to hearing-impaired students and promotes students' social, emotional, intellectual and physical development.
2414-15	Teacher of the sight-impaired	Teaches academic and living skills to sight-impaired students and promotes students' social, emotional, intellectual and physical development.
2414-79	Special education teacher n.e.c.	This occupation group covers special education teachers not elsewhere classified.
3421-15	Residential care officer	Provides care and supervision for children or disabled persons in group housing or government institutions.
3421-17	Disabilities services officer	Works in a range of adult service units, which provide education and community access to people with intellectual, physical, social and emotional disabilities.
6311-13	Integration aide	Assists children with developmental disabilities in mainstream schools.
<i>Aged and disabled care workers</i>		
6313-17	Aged or disabled person carer	Provides general household assistance, emotional support, care and companionship for aged or disabled people in their homes.

(continued)



ASCO code	Occupation title	Description
<i>Other community services workers</i>		
1299-15	Welfare centre manager	Manages and coordinates centres, programs or projects concerned with social welfare support.
2511-11	Social worker	Assesses the social needs of individuals and groups, and assists people to develop and use the skills and resources needed to resolve social and other problems.
2512-13	Community worker	Facilitates community development initiatives and collective solutions within a community to address issues, needs and problems.
2513-11	Rehabilitation counsellor	Assists physically, mentally and socially disadvantaged people to re-integrate into work and the community.
2513-13	Drug and alcohol counsellor	Provides assessment, support and treatment for people, develops strategies which assist them to set goals, effect and maintain change, and provides community advice and education.
3421	Welfare associate professionals	Provide support, information and advice to clients on emotional, financial, recreational, health, housing and other social welfare matters and evaluate and coordinate the services of welfare and community service agencies.
3421-11	Parole or probation officer	Supervises parolees who have been placed on probation by court order or released conditionally from corrective service institutions.
6194-15	Social security assessor	Inspects and assesses social welfare claims and entitlements under government legislation.
6313-15	Refuge worker	Provides services and support to people seeking assistance in refuges.

## Data on region

The regional data in this report relate to an employed person's place of employment. It is based on question 37 on the census form: 'For the main job held *last week*, what was the person's workplace address?'. People who worked from home were asked to provide their home address. People who had no fixed place of work were asked to provide the depot address if they usually travelled to a depot to start work, otherwise to report 'no fixed address'. A consequence of the latter instruction is that a person who worked at a number of addresses, e.g. a nurse working in a hospital and a surgery, were classified as 'undefined'.

Regional classifications in this report include the Australian Standard Geographical Classification (ASGC) for Remoteness; the Rural, Regional and Metropolitan Area (RRMA); classification and statistical region.

A full list of the ASGC detailed statistical region structure is available at the ABS web site for each State and Territory, using the following link: <<http://www.abs.gov.au>>

## Qualifications

Qualifications are classified to the Australian Bureau of Statistics 1991, *ABS Classification of Qualifications*, ABS Cat. no. 1262.0, Canberra: ABS.

# References

- Australian Bureau of Statistics 1990. Australian standard classification of occupations. 1st edition. ABS Cat. no. 1223.0. Canberra: ABS.
- Australian Bureau of Statistics 1991. ABS classification of qualifications. ABS Cat. no. 1262.0. Canberra: ABS.
- Australian Bureau of Statistics 1993. Australian and New Zealand standard industrial classification. ABS Cat no. 1292.0. Canberra: ABS.
- Australian Bureau of Statistics 1997. Australian standard classification of occupations. 2nd edition. ABS Cat. no. 1220.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 1999. Australian social trends. ABS Cat. no. 4102.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2000. Australian social trends. ABS Cat. no. 4102.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2001a. Australian social trends. ABS Cat. no. 4102.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) June 2001b. Labour force Australia. ABS Cat. no. 6203.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2001c. National health survey, Summary of Results. ABS Cat. no. 4364.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2002a. Australian social trends. ABS Cat. no. 4102.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2002b. Deaths, Australia. ABS Cat. no. 3302.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2002c. Employee earnings and hours, Australia. ABS Cat. no. 6306.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2003a. Australian demographic statistics. ABS Cat. no. 3101.0. Canberra: ABS.
- Australian Bureau of Statistics (ABS) 2003b. Labour force status data cube E06. ABS Cat. no. 6291.0.55.001
- Australian Institute of Health and Welfare (AIHW) 1996. Health and community services labour force 1996. Canberra: AIHW.
- Australian Institute of Health and Welfare (AIHW) 2001. Australian hospital statistics, 2000–01. Canberra: AIHW.
- Australian Institute of Health and Welfare (AIHW) 2002. Australian hospital statistics, 2001–02. Canberra: AIHW.
- Australian Institute of Health and Welfare (AIHW) 2001a. Australia's welfare 2001. Canberra: AIHW.
- Australian Institute of Health and Welfare (AIHW) 2003a. Australia's welfare 2003. Canberra: AIHW (not published at time of printing).
- Australian Institute of Health and Welfare (AIHW) 2003b. Rural, regional and remote health: A study on mortality. Canberra: AIHW (in press).

Australian Medical Workforce Advisory Committee (AMWAC) 2003. Specialist Medical Workforce Planning in Australia - A Guide To The Planning Process Used By The Australian Medical Workforce Advisory Committee, AMWAC Report 2003.1, Sydney.

Department of Health and Ageing (DoHA) 2002. Medicare statistics 1984/85 to June quarter 2002. ISSN 1328-0449. Canberra: DoHA.

Department of Family and Community Services (FACS) 2001. The identification and analysis of indicators of community strength and outcomes. Prepared by Black A and Hughes P. Occasional paper No. 3, Feb 2001.

# Related publications

The following publications relating to the health labour force have been issued by the Australian Institute of Health and Welfare.

## National health labour force series

- No. 1: Pharmacy labour force 1992*
- No. 2: Podiatry labour force 1992*
- No. 3: Medical labour force 1992–93*
- No. 4: Physiotherapy labour force 1993*
- No. 5: Pharmacy labour force 1993*
- No. 6: Medical labour force 1994*
- No. 7: Podiatry labour force 1994*
- No. 8: Pharmacy labour force 1994*
- No. 9: Nursing labour force 1993 and 1994*
- No. 10: Medical labour force 1995*
- No. 11: Nursing labour force 1995*
- No. 12: Pharmacy labour force 1995*
- No. 13: Medical labour force 1996*
- No. 14: Nursing labour force 1998*
- No. 15: Medical labour force 1997*
- No. 16: Medical labour force 1998*
- No. 17: Pharmacy labour force 1998*
- No. 18: Optometrist labour force 1999*
- No. 19: Health and community services labour force 1996*
- No. 20: Nursing labour force 1999*
- No. 21: Occupational therapy labour force 1998*
- No. 22: Physiotherapy labour force 1998*
- No. 23: Podiatry labour force 1999*
- No. 24: Medical labour force 1999*
- No. 25: Pharmacy labour force up to 2001*
- No. 26: Nursing labour force 2001*

## Other publications

*Australia's health 1994*

*Australia's health 1996*

*Australia's health 1998*

*Australia's health 2000*

*Australia's health 2002*

*Australia hospital statistics 1993–95: an overview*

*Australian hospital statistics 1996–97*

*Australian hospital statistics 1997–98*

*Australian hospital statistics 1998–99*

*Australian hospital statistics 1999–00*

*Australian hospital statistics 2000–01*

*Australian hospital statistics 2001–02*

*Australia's Welfare 1999*

*Australia's Welfare 2001*

*Medical labour force 2000*

## Internet access

Additional tables relating to this publication and a selection of material produced by the Australian Institute of Health and Welfare are published on the Institute's web site at <<http://www.aihw.gov.au>>. This includes the Institute's medical and nursing labour force publications and the publications catalogue ordering information.