

# 1 Introduction

*Mental Health Services in Australia 2001–02* is the fifth in the Australian Institute of Health and Welfare's (AIHW) series of annual reports describing the activity and characteristics of Australia's mental health care services. A key role of these reports is to make publicly available the data collected as specified in the National Minimum Data Sets (NMDSs) for Mental Health Care, which cover public community mental health services and specialised psychiatric care for patients admitted to public and private hospitals (see Appendix 1 for descriptions). Alongside the NMDS data, these reports also include a range of other data to describe mental health-related service delivery in Australia.

A wide range of service types is involved in providing treatment and care for people with mental health disorders. These include specialist mental health services, general health services and services outside the health sector, provided in both residential and ambulatory care settings. Many are government services, but private hospitals, non-government organisations and private medical practitioners are also responsible for provision of mental health-related care. This report gives an overview of this range of services.

This report and accompanying additional tables are available on the Internet at <[www.aihw.gov.au](http://www.aihw.gov.au)>. Some of the national data on admitted patient care are also available in an interactive data cube format at that site. Users can access these data cubes to create customised tables based on the age group, sex, principal diagnosis and mental health legal status of admitted patients who received specialised psychiatric care between 1998–99 and 2001–02.

## Report structure

Chapter 1 presents information on this report's structure and background information on the prevalence and health system expenditure on mental disorders and on the objectives of the National Mental Health Strategy.

Chapter 2 presents overview information on mental health-related service activity over recent years and mental health-related service utilisation by selected population groups.

Chapter 3 summarises the available data on ambulatory care provided by specialised mental health care services and other service providers that are not specialised mental health care services but play a role in providing services for people with mental disorders. Reported specialised mental health care services include those provided by private psychiatrists and specialist psychiatric outpatient and community mental health care services. The non-specialised services reported include general practitioners, and ambulatory disability support services that were funded under the then Commonwealth, State Disability Agreement (CSDA). The CSDA-funded services include some specialist mental health care services provided by non-government organisations.

Chapters 4, 5 and 6 summarise the available data on residential and admitted patient mental health care and CSDA-funded residential disability support services. The information presented on patients admitted to hospitals includes data on those who received specialised psychiatric care (chapter 5) and those who had a mental health-related principal diagnosis but were not reported as receiving specialised psychiatric care (chapter 6).

Chapter 7 presents information on the public and private psychiatrist and mental health nurse labour force, Medicare expenditure on private psychiatrists and Pharmaceutical Benefits Scheme (PBS) expenditure on mental health-related medications. This chapter also presents data on the staffing and expenditure of public community mental health care establishments and public and private hospitals that provide specialised psychiatric care.

Chapter 8 presents information on mental health care for depression, accompanied by information on the estimated prevalence, burden and health system costs of this condition.

The appendixes provide more detailed technical notes on the data and analyses that are included in the chapters. Appendix 1 outlines the data sources used for this report and their respective strengths and weaknesses, and details the data elements specified in the NMDs for Mental Health Care. Appendix 2 provides information on the codes used to define mental health-related care and medications. Appendix 3 presents information on the definition of hospital separations that could be considered to be equivalent to ambulatory mental health care. Appendix 4 provides state- and territory-specific data on admitted patient care, including ambulatory mental health care-equivalent care, and community mental health care. Appendix 5 presents information on the National Survey of Mental Health Services and how it compares with the establishment-level data collections used in this report.

The data in this report are primarily for 2001–02 or in the case of the CSTDA MDS snapshot data, for 2001. In the interest of presenting the most up-to-date data, data for 2002–03 are presented from the Medicare, PBS and BEACH data collections. Readers requiring 2001–02 data from the Medicare or PBS collections can refer to the internet tables accompanying this report on the Institute’s web-site (<[www.aihw.gov.au](http://www.aihw.gov.au)>). Those requiring 2001–02 data from the BEACH data collection can refer to the *Mental Health Services in Australia 2000–01* report (AIHW 2003a).

## Background

This publication focuses on mental health services. However, this section provides some background information, including data from the 1997 National Survey of Mental Health and Wellbeing of Adults, the 1998 Survey of Disability, Ageing and Carers, the 1999 National Survey of Mental Health and Wellbeing of Children and Adolescents, the 2001 National Health Survey and the *Health System Costs of Disease 2000–2001* report (AIHW 2004a). These data include the prevalence of mental disorders, psychiatric disability and psychological distress; the use of medications for mental wellbeing in Australia and consultations with health professionals and health services expenditure related to mental health. This section also includes background information on the National Mental Health Strategy and its objectives (Box 1.1).

### Prevalence of mental disorders in adults

The prevalence of mental disorders in adults can be reported using a range of different measures. A number of these measures are provided in the following sections of this chapter. The most commonly quoted figure of mental disorders in Australia is that one in five adults will experience a mental illness at some time in their life. This figure is from the survey conducted in 1997 by the Australia Bureau of Statistics (ABS), which was the adult component of the National Survey of Mental Health and Wellbeing. Approximately 10,600 people aged 18 years and over participated in the survey; a range of mental disorders was diagnosed using a computerised version of the Composite International Diagnostic Interview.

The survey found that an estimated 18% of Australian adults had experienced a mental disorder in the 12 months prior to interview (ABS 1998). The prevalence of mental disorders decreased with age, with the highest prevalence reported for adults aged 18–24 years (27%), reflecting a relatively high rate of substance use disorders. The prevalence was lowest, at 6%, for those aged 65 and over.

Women were more likely than men to have had an anxiety or affective disorder and men were more than twice as likely as women to have had a substance use disorder. Anxiety disorders were most common for women aged 45–54 years (16%). Affective disorders, which include depression, were most common for women aged 18–24 years (11%). Substance use disorders were most common for men aged 18–24 years (22%). More information on the results of this study can be found in *Mental Health Services in Australia 2000–01* (AIHW 2003a).

A study coordinated by the University of Western Australia examined the prevalence of psychotic disorders among Australian adults aged 18–64 years (Jablensky et al. 1999). The survey was based on a census of 3,800 people with psychotic illness who attended a public or private mental health service within defined areas of Brisbane and surrounds, Melbourne, Perth and the Australian Capital Territory. The study estimated that between 3.9 and 6.9 persons per 1,000 adult residents in urban areas (a weighted mean of 4.7) were in contact with mental health services each month due to the symptoms of a psychotic disorder. More information on the results of this study can be found in *Mental Health Services in Australia 2000–01* (AIHW 2003a).

#### **Box 1.1: National Mental Health Strategy**

*In 1992, the Commonwealth, state and territory governments in Australia endorsed the National Mental Health Strategy as a framework to guide the reform agenda for mental health. A brief outline of the Strategy is given below. For more information on the National Mental Health Strategy, refer to the National Mental Health Report 2002 (DHA 2002). The aims of the Strategy are to:*

- *promote the mental health of the Australian community and, where possible, prevent the development of mental disorders*
- *reduce the impact of mental disorders on individuals, families and the community*
- *assure the rights of people with mental disorders.*

*The broad aims and objectives of the Strategy are described in the National Mental Health Policy. The Policy has 38 objectives including objectives relating to the shift from institutional to community care and the delivery of services in mainstream settings. The approach to be taken by the Australian, state and territory governments in implementing the aims and objectives of the Policy were described by the First National Mental Health Plan, which ran from 1992–93 to 1997–98. Near the end of the First Plan, an independent evaluation concluded that significant progress had been achieved but that the reform agenda had yet to be completed (AHMAC 1997).*

*In order to continue these reforms, the Second National Mental Health Plan (1998–99 to 2002–03) was endorsed by all governments in 1998. The aim of the Second Plan was to consolidate reforms of the First Plan and to extend into additional areas with a particular focus on promotion and prevention, partnerships in service reform and delivery, and service quality and effectiveness.*

*The National Mental Health Plan 2003–08 consolidates reforms begun under the first two plans and has four priority themes: promoting mental health and preventing mental health problems, increasing service responsiveness, strengthening quality and fostering research, and innovation and sustainability.*

## **Prevalence of mental disorders in children and adolescents**

The child and adolescent component of the National Survey of Mental Health and Wellbeing was conducted by the University of Adelaide in 1998 (Sawyer et al. 2000). The study examined the prevalence of clinically significant depressive disorder, conduct disorder and attention-deficit hyperactivity disorders (ADHD) among Australians aged 6–17 years using the Diagnostic Interview Schedule for Children (Version IV).

The most frequently reported disorder for children and adolescents was ADHD, accounting for 11% (an estimated 355,000 children and adolescents) of those in the age group. Less prevalent were conduct disorders (3% or 95,000) and depressive disorders (4% or 117,000). More information on the findings of this study are included in *Mental Health Services in Australia 2000–01* (AIHW 2003a).

## **Self-reported long-term mental health conditions**

Additional information on mental health problems in the population is available as the proportion who report that they have experienced a mental health condition. Almost 10% of adult respondents to the 2001 National Health Survey reported they had a long-term mental or behavioural problem (ABS 2002). These data were based on self-report rather than any formal diagnostic assessment or health professional's diagnosis and are therefore not comparable with the results of the National Survey of Mental Health and Wellbeing.

## **Prevalence of psychiatric disability**

Having a mental health condition, such as depression or anxiety, can be disabling in its impact on day-to-day and/or long-term functioning at home and in the community. In 1998, the Australian Bureau of Statistics conducted the Survey of Disability, Ageing and Carers. Data from this survey estimated the prevalence of psychiatric disabling conditions at 4.1% of the Australian population, representing around 768,900 people (AIHW 2003b). Prevalence levels were higher for those 65 years of age and older (11.7% compared to 3.1% for those aged less than 65 years), and higher among older females (13.9%) than older males (8.7%).

A proportion of the Australian population with a psychiatric disability also had a severe or profound core activity restriction (2.1%) (i.e. they sometimes or always needed help with self care, mobility or communication activities). These higher levels of restriction were more common in older people (8.3% of those 65 years and older compared to 1.3% of those aged less than 65), especially older females (10.3% compared to 5.8% of older males).

Psychiatric disability is commonly associated with other disabling conditions. In 1998, additional disabilities were reported by 79% of those with a psychiatric disabling condition and 66% of those whose main disabling condition was psychiatric (AIHW 2003b).

## **Psychological distress**

Both the National Survey of Mental Health and Wellbeing of Adults conducted in 1997 and National Health Survey conducted in 2001 collected information on the prevalence of current psychological distress using the 10-item Kessler Psychological Distress Scale-10 (K10) measure (ABS 1998, 2002). The instrument is used to ask about negative emotional states in the 4 weeks prior to interview. For example, respondents are asked how often they felt nervous, hopeless and restless. They can respond: all of the time, most of the time, some of the time, a little of the time or none of the time.

**Table 1.1: Estimated proportion of adults with very high (30–50) psychological distress scores on the Kessler Psychological Distress Scale-10, Australia, 1997 and 2001 (per cent)**

	18–24	25–34	35–44	45–54	55–64	65 and over	Total
<b>Year</b>	<b>Males</b>						
1997	<sup>(a)</sup> 0.6	<sup>(a)</sup> 1.3	2.2	3.0	2.7	<sup>(a)</sup> 1.9	1.9
2001	2.7	2.1	2.5	3.7	3.6	1.9	2.7
	<b>Females</b>						
1997	<sup>(a)</sup> 2.1	2.8	2.4	3.8	<sup>(a)</sup> 1.5	<sup>(a)</sup> 1.3	2.4
2001	5.4	4.6	4.2	5.5	3.6	3.2	4.4
	<b>Total</b>						
1997	1.3	2.1	2.3	3.4	2.1	1.6	2.2
2001	4.0	3.4	3.4	4.6	3.6	2.6	3.6

(a) Estimate has a relative standard error of between 25% and 50% and should be used with caution.

Source: ABS 1998, 2002.

The results from the K10 were grouped into four categories: low (score of 10–15 indicating little or no psychological distress); moderate (16–21); high (22–29); and very high levels of psychological distress (scores of 30–50). K10 scores in the very high psychological distress category can indicate a need for professional help (ABS 2002).

In 1997, an estimated 2.2% of Australians aged 18 and over had very high levels of psychological distress. About 6% had high levels of psychological distress, 18.1% had medium levels and 73.8% low levels. In 2001 the estimated proportion of persons with very high levels of psychological stress was 3.6%. The proportion of persons 18 years and over with high psychological distress had also risen, to 9.0%, 23.0% of persons had medium levels and 64.3% low levels.

In both 1997 and 2001, males and females in the age group 45–54 years most frequently had very high levels of psychological distress (Table 1.1). Between 1997 and 2001, the proportion of people who had very high levels of distress increased for all age groups and both sexes except males 65 years and over. The increase was greatest for people aged 18–24.

## Use of medication for mental wellbeing

Additional information about mental health problems in the population is available as the proportion of people using medication for mental wellbeing. The 2001 National Health Survey asked adults whether they had used any vitamin/mineral supplement, herbal/natural remedy or medication for their mental wellbeing in the previous 2 weeks, or a relevant pharmaceutical medication (ABS 2002).

**Table 1.2: Estimated number of adults using medications for mental wellbeing in the 2 weeks prior to interview, Australia, 2001**

Medication type	Males		Females		Total	
	('000)	Per cent	('000)	Per cent	('000)	Per cent
Pharmaceutical medications						
Sleeping tablets	222.8	3.2	356.3	4.9	579.1	4.1
Tablet/capsules for anxiety or nerves	99.0	1.4	174.7	2.4	273.7	1.9
Tranquillisers	46.2	0.7	52.6	0.7	98.8	0.7
Antidepressants	232.8	3.4	430.4	5.9	663.2	4.7
Mood stabilisers	39.4	0.6	41.2	0.6	80.6	0.6
Other medications for mental health	20.5	0.3	31.1	0.4	51.6	0.4
Total <sup>(a)</sup>	491.6	7.1	864.2	11.9	1,355.8	9.5
Vitamin/ mineral supplements	425.4	6.1	685.8	9.5	1,111.2	7.8
Herbal/ natural medications	247.8	3.6	524.0	7.2	771.8	5.4
Total <sup>(b)</sup>	945.1	13.6	1,618.4	22.4	2,563.5	18.0
Did not use medication	6,001.3	86.4	5,619.9	77.6	11,621.2	82.0
<b>Total</b>	<b>6,946.4</b>	<b>100.0</b>	<b>7,238.3</b>	<b>100.0</b>	<b>14,184.7</b>	<b>100.0</b>

(a) Total includes all medications other than vitamin or mineral supplements, herbal or natural medications.

(b) Persons may have reported more than one type of medication and therefore components may not add to totals.

Source: ABS 2002.

Of the respondents, 18% had taken some form of medication; 9.5% of respondents had taken a pharmaceutical medication, 7.8% had used vitamin or mineral supplements and 5.4% had used herbal or natural treatments (Table 1.2). More females than males reported using medication of all types. The most frequently taken pharmaceutical medications were antidepressants and sleeping tablets. This predominance of antidepressants and sleeping tablets is consistent with the fact that depression and sleeping disturbance are the leading mental health-related problems for which general practitioners prescribed medication in 2001–02 (see chapter 3).

## Consultations with health professionals

Information on consultations with health professionals, including visits to doctors, other health professionals, hospitals and psychologists by people reporting mental and behavioural problems was also collected in the 2001 National Health Survey.

An estimated 38.6% of people reporting long term mental and behavioural problems had contact with doctors in the two weeks prior to interview (Table 1.3). Consultations with other health professionals were relatively common (24.6%) with hospitalisations being less common (8.3%). An estimated 46.3% of people reporting mental and behavioural problems did not have any contact with health professionals.

The type of health professional contact was related to the type of mental and behavioural problem. Those people who reported organic mental problems were more likely to visit a hospital than were those with other mental and behavioural problems (15.2%). People reporting symptoms and signs involving cognition, perceptions, emotional state and behaviour were more likely to visit a doctor (48.3%). People reporting problems of psychological development were the least likely to have contact with a health professional (53.4%) (ABS 2003a).

**Table 1.3: Consultations with health professionals in the two weeks prior to interview: persons reporting mental and behavioural problems<sup>(a)</sup> by problem, Australia, 2001 (per cent)**

<b>Mental and behavioural problem</b>	<b>Hospital-isations</b>	<b>Doctors<sup>(b)</sup></b>	<b>Psychologists</b>	<b>Other mental health professionals<sup>(c)</sup></b>	<b>Other health professionals<sup>(d)</sup></b>	<b>No health professional contact</b>	<b>Total</b>
Organic mental problems	<sup>(e)</sup> 15.2	<sup>(e)</sup> 40.1	0.0	<sup>(f)</sup> 2.6	<sup>(e)</sup> 20.5	<sup>(e)</sup> 48.7	100.0
Alcohol and drug problems	<sup>(e)</sup> 9.6	41.0	<sup>(e)</sup> 4.4	<sup>(e)</sup> 7.9	24.4	46.0	100.0
Mood (affective) problems	10.0	43.0	3.9	5.3	26.7	40.7	100.0
Anxiety related problems	7.8	40.4	3.6	4.1	26.2	44.8	100.0
Problems of psychological development	<sup>(e)</sup> 6.4	32.4	<sup>(e)</sup> 2.3	<sup>(e)</sup> 2.5	23.0	53.4	100.0
Behavioural and emotional problems with usual onset in childhood/adolescence	<sup>(e)</sup> 6.6	35.8	<sup>(e)</sup> 6.5	<sup>(e)</sup> 7.3	19.3	48.1	100.0
Other mental and behavioural problems	<sup>(e)</sup> 8.1	36.0	<sup>(f)</sup> 1.4	<sup>(e)</sup> 4.4	23.4	49.7	100.0
Symptoms and signs involving cognition, perceptions, emotional state and behaviour	13.6	48.3	<sup>(e)</sup> 4.6	12.2	23.9	41.2	100.0
<b>Total</b>	<b>8.3</b>	<b>38.6</b>	<b>2.9</b>	<b>4.3</b>	<b>24.6</b>	<b>46.3</b>	<b>100.0</b>

(a) Mental and behavioural problems which have lasted or are expected to last for six months or more.

(b) Mainly general practitioners.

(c) Accredited counsellor, alcohol and drug worker (not elsewhere classified) and social worker/welfare officer.

(d) Aboriginal health worker (not elsewhere classified), accredited counsellor, acupuncturist, alcohol and drug worker (not elsewhere classified), audiologist/audiometrist, chemist (for advice), chiroprapist/podiatriat, chiropractor, dietitian/nutritionist, herbalist, hypnotherapist, naturopath, nurse, occupational therapist, optician/optometrist, osteopath, physiotherapist/hydrotherapist, social worker/welfare officer, speech therapist/pathologist.

(e) Estimate has a relative standard error of between 25% and 50% and should be used with caution.

(f) Estimate has a relative standard error greater than 50% and is considered too unreliable for general use.

Source: ABS 2003a.

## Health service expenditure for mental health disorders

A detailed analysis of health service expenditure by disease and injury categories, including mental health, has been undertaken for 1993–94 and 2000–01 (AIHW 2004a). This analysis distributed total health expenditure in Australia by disease category, estimated using information such as diagnoses reported for patients admitted to hospital, and problems managed for patients attending general practitioners.

In this report expenditure costs of dementias have been included as well as mental disorders because dementias are included in the definition of mental health-related separations used in this report. This reflects mental health-related care provided to patients with dementias who have been admitted to hospital. The expenditure on dementias in other settings, (e.g. aged care homes) may not necessarily be regarded as mental health-related care to the same extent.

For 2000–01 it was estimated that health care expenditure for mental health disorders, including expenditure on community mental health was \$3.9 billion, or 6.7% of recurrent health care expenditure (Table 1.4). The majority of this expenditure was for hospital services (31% of mental health care expenditure or \$1.2 billion), community mental health services (22% or \$842 million) and pharmaceuticals (16% or \$615 million). In 2000–01, expenditure on

Alzheimer's disease and other dementias totalled \$2.7 billion and the majority of this expenditure occurred in aged care homes (87% or \$2.3 billion).

In comparison, the health care expenditure for mental health disorders (including community health expenditure of \$408 million) for 1993–94 (converted to 2000–01 prices) was estimated at \$2.7 billion or 6.6% of recurrent health care expenditure. The expenditure was mostly for hospital services (41% or \$1.1 billion) and out-of-hospital medical services (19% or \$512 million). Expenditure on Alzheimer's disease and other dementias totalled \$0.8 billion in 1993–94 (2.0% of recurrent health care expenditure) which was lower than the expenditure in 2000–01 (4.7% of recurrent health care expenditure or \$2.7 billion).

**Table 1.4: Health system costs of mental disorders and Alzheimer's disease and other dementias in Australia, 1993–94<sup>(a)</sup> and 2000–01 (\$ millions)**

Year	Hospitals <sup>(b)</sup>	Aged care homes	Out-of-hospital medical <sup>(c)</sup>	Pharmaceuticals	Other health professional services <sup>(d)</sup>	Research	Community mental health	Total
<b>Mental disorders excluding dementias<sup>(e)</sup></b>								
<b>2000–01</b>	1,196	366	589	615	144	109	842	<b>3,861</b>
<b>1993–94<sup>(a)</sup></b>	1,091	316	512	237	99	34	408	<b>2,697</b>
<b>Alzheimer's disease and other dementias<sup>(f)</sup></b>								
<b>2000–01</b>	175	2,339	20	33	9	102	na	2,679
<b>1993–94<sup>(a)</sup></b>	132	647	13	2	5	14	na	814

(a) Expenditures for 1993–94 have been converted to 2000–01 prices by adjusting for health price inflation between 1993–94 and 2000–01.

(b) Hospitals include admitted and non-admitted patients and in-hospital private medical services.

(c) Out-of-hospital medical includes unreferral attendances, imaging, pathology and other medical.

(d) Other health professional services include services delivered by physiotherapists, chiropractors, occupational therapists, audiologists, speech therapists, hydropaths, podiatrists, therapeutic and clinical massage therapists, clinical psychologists, dietitians and osteopaths.

(e) Mental disorders include ICD-10-AM codes F04–F99 (All mental and behavioural disorders excluding dementia in Alzheimer's disease, vascular dementia, dementia in other diseases classified elsewhere and unspecified dementia), G31.2 (degeneration of nervous system due to alcohol) for 2000–01. ICD-9 chapter V (mental disorders), excluding 290 (senile and presenile organic psychotic conditions) and 330–331 (cerebral degenerations usually manifest in childhood and other cerebral degenerations) for 1993–94.

(f) Alzheimer's disease and other dementias include ICD-10-AM codes F01–F03 (vascular dementia, dementia in other diseases classified elsewhere and unspecified dementia), G30–G31 (Alzheimer's disease and Other degenerative disease of the nervous system not elsewhere classified) excluding G31.2 (degeneration of nervous system due to alcohol) for 2000–01. ICD-9 CM codes 290 (senile and presenile organic psychotic conditions) and 330–331 (cerebral degenerations usually manifest in childhood and other cerebral degenerations) for 1993–04.

## 2 Overview

*Mental Health Services in Australia 2001–02* is the fifth of the Australian Institute of Health and Welfare's annual reports describing the characteristics and activity of Australian mental health services. This chapter presents summary data on key themes within the report.

Mental health care can be conceptualised as having a tiered model of service delivery, sometimes referred to as a *cone of morbidity* (Henderson 2000). In this model only a small proportion of people within one tier progress to the next tier.

In this report service activity and patient characteristics data have been reported that correspond to the following three tiers:

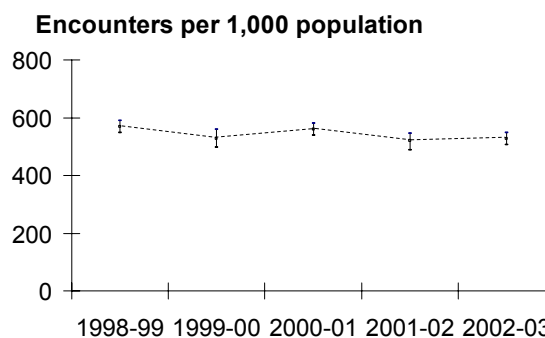
1. patients with mental disorders managed by general practitioners
2. patients referred to ambulatory mental health services (e.g. private psychiatrists, community and hospital-based ambulatory services)
3. patients who are admitted to hospital or residential care for specialised mental health care.

### Changes in mental health care over time

The three Plans of the National Mental Health Strategy have guided the reform of mental health services in Australia since 1993. The reform has resulted in significant changes in the level and type of activity of some mental health-related services.

### General practice

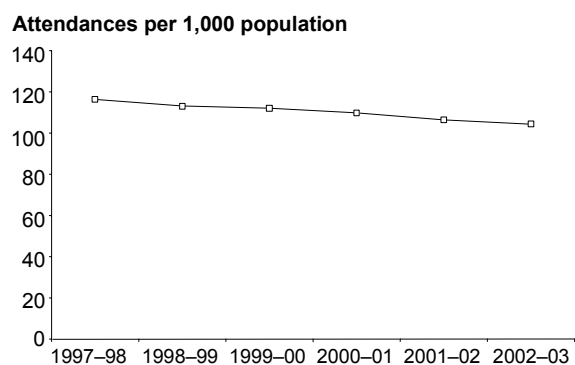
In 2002–03, there were an estimated 10.0 million mental health-related general practice encounters. The contribution of general practice to mental health care has remained relatively stable in recent years. Between 1998–99 and 2002–03, the estimated number of mental health-related general practice encounters has remained between 510 and 570 encounters per 1,000 population (Figure 2.1 and Table 3.3).



**Figure 2.1: Mental health-related GP encounters per 1,000 population, 1998–99 to 2002–03**

### Private psychiatrists

In 2002–03, there were over 2 million Medicare-funded psychiatrist attendances, provided at a rate of 103.5 attendances per 1,000 population. This rate has declined each year since 1997–98 (Figure 2.2 and Table 3.3).



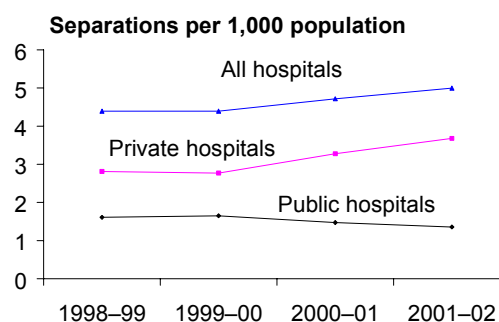
**Figure 2.2: Medicare-funded psychiatrist attendances per 1,000 population, 1997-98 to 2002-03**

The decline was accompanied by an 11.4% increase in the number of medical officers employed in public mental health services between 1996-97 and 1999-2000 (DHA 2002). The total number of psychiatrists employed in both the public and private sectors increased 13.7% between 1995 and 2001 (Table 7.2).

## Ambulatory mental health care

An objective of the National Mental Strategy has been to increase the provision of community-based ambulatory care. In 2001-02, there were over 4.2 million ambulatory service contacts in public hospital outpatient clinics and community-based mental health services. This equated to 215.3 service contacts per 1,000 population (Table 3.1). At this stage, there are no reliable national time series data available on the activity of these services.

Some hospital admitted patient same day care can be considered to be ambulatory equivalent (see Appendix 3). The number of ambulatory-equivalent mental health-related separations increased from 82,326 in 1998-99 to 97,796 in 2001-02. The number per 1,000 population increased in the private sector by 31% and decreased in the public sector by 16% (Figure 2.3 and Table 3.3).

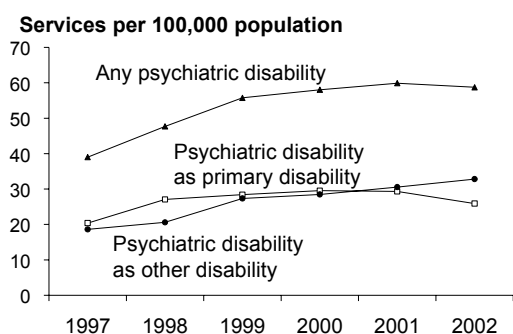


**Figure 2.3: Ambulatory-equivalent mental health-related separations per 1,000 population, by hospital sector, Australia, 1998-99 to 2001-02**

## Disability support services

The Commonwealth/State Disability Agreement (CSDA) allocated responsibility and funding for disability support services between the Australian, state and territory governments. CSDA-funded service types include accommodation support, residential care, employment support and community access support. Data have been collected in all jurisdictions on clients of these services on a 'snapshot day' each year since 1997. Some psychiatric disability services are not CSDA-funded and are not included in this collection.

The number of CSDA-funded services (residential and ambulatory) received by people with a psychiatric disability (i.e. primary or other significant disability) remained between 55 and 60 services per 100,000 population since 1999 (Figures 2.4, 3.4 and 4.2). The rate for clients with a psychiatric disability that was not their primary disability has increased compared with the recent decline for those for whom it was their primary disability.



**Figure 2.4: CSDA-funded disability support services received by people with a psychiatric disability per 100,000 population, 1997 to 2002**

## Hospital admitted patient care

Another objective of the National Mental Health Strategy has been to reduce the size and number of stand-alone psychiatric hospitals and increase the role of psychiatric units in general hospitals in providing admitted patient mental health-related care. This section presents information on the changes to admitted patient care in terms of the number of separations, patient days and average length of stay. Information on the relative merits of these different measures of hospital activity is provided in Box 4.1.

Admitted patient care for patients with mental disorders can be either in a specialised psychiatric unit or hospital, or in a unit or hospital not specialising in psychiatric care. Admission to a specialist psychiatric unit or hospital is not always the most appropriate treatment for all mental and behavioural disorders. For some disorders, treatment without specialised psychiatric care would be appropriate to the needs of the patient.

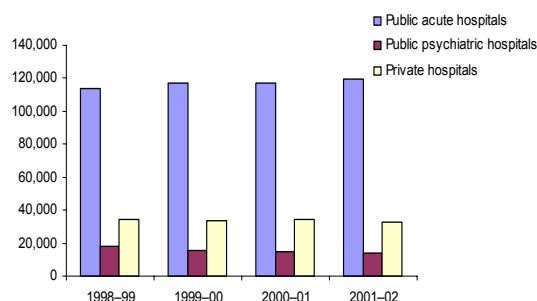
Hospital admitted patient care can be regarded as mental health-related if it includes specialised psychiatric care and/or a mental health-related principal diagnosis is reported for it. It can also be regarded as comprising ambulatory-equivalent same day care (see above), other same day care, and care that

lasts for at least one night. Information on overnight separations is presented here.

## Separations

There were 166,660 overnight mental health-related separations in 2001–02.

The number of these separations was relatively stable between 1998–99 and 2001–02 for all hospitals. However, over this period, separations from public acute hospitals increased by 4.8%, separations from private hospitals decreased by 4.5% and separations from public psychiatric hospitals decreased by 22.5% (Table 4.1).



**Figure 2.5: Overnight mental health-related separations by hospital type, 1998-99 to 2001-02**

The number of separations per 1,000 population by hospital type, for the period 1995–96 to 2001–02 is available on the internet at <[www.aihw.gov.au](http://www.aihw.gov.au)>.

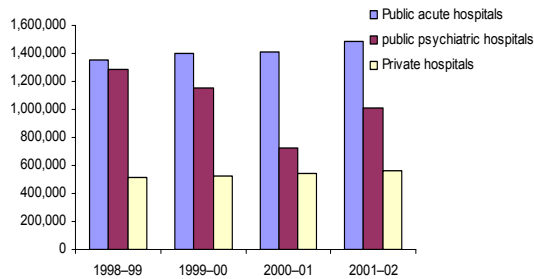
## Patient days

The patient day data presented includes all days of patient care received during the hospitalisation. Some of these may have occurred in previous years, particularly for public psychiatric hospitals, for which numbers of very extended stays were reported, particularly in 1998–99 and 1999–2000.

There were 3,057,568 patient days attributed to overnight mental health-related separations in 2001–02. For public acute hospitals, the number of these patient days increased 10.0% between 1998–99 and 2001–02, the number of

patient days from private hospitals increased by 9.0% and the number of patient days from public psychiatric hospitals decreased by 21.3% (Table 4.1).

The number of overnight mental health-related patient days per 1,000 population by hospital type, for the period 1995–96 to 2001–02 is available on the internet at <www.aihw.gov.au>.



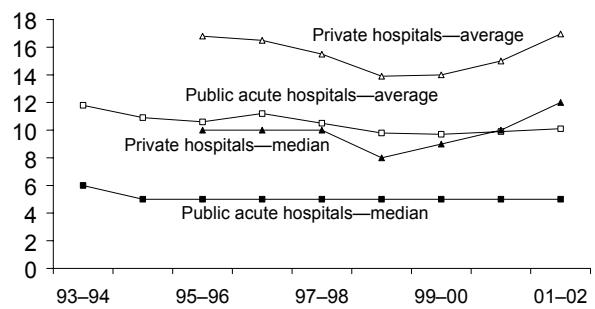
**Figure 2.6: Patient days for mental health-related overnight by hospital type, 1998–99 to 2001–02**

### Average length of stay

In order to maximise the comparability over time, the average length of stay (ALOS) data in this chapter exclude separations for patients who transferred from one hospital to another, who changed type of episode of care during their hospital stay, who died in hospital, who left against medical advice or who were transferred to a nursing home. These data also exclude any separations that began with a transfer from another hospital or a change of care type.

For public acute hospitals, the ALOS for these selected separations was 11.8 days in 1993–94. Since then, the ALOS declined 14.4% to 10.1 days in 2001–02 (Figure 2.7). Private hospital separations had longer average lengths than public acute hospital separations and increased to 16.0 days for 2001–02. In 2001–02, the median lengths of stay for public acute and private hospitals were 5 and 12 days, respectively.

### Length of stay (days)



**Figure 2.7: Average and median length of stay for selected mental health-related overnight separations by hospital type, 1993–94 to 2001–02**

## Patient demographics

### Age and sex

Previous studies have found that the overall prevalence of mental disorders declines with age (ABS 1998). They have also found that females are more likely to experience affective and anxiety disorders whereas males are more likely to experience substance use and psychotic disorders (ABS 1998; Jablensky et al. 1999). Patterns of service use differ for males and females and by age group, often reflecting the particular disorders most often treated by the service provider. For example, a large proportion of mental health-related encounters with GPs involve affective disorders in female patients, whereas psychotic disorders in male patients are relatively commonly reported for community mental health care service contacts (Figures 2.16 and 2.17).

### General practice

In 2002–03, 60.1% of mental health-related general practice encounters involved a female patient. The proportion of encounters that were for females was higher than for males in all age groups

except for patients under 15 years (Figures 2.8 and 3.2).

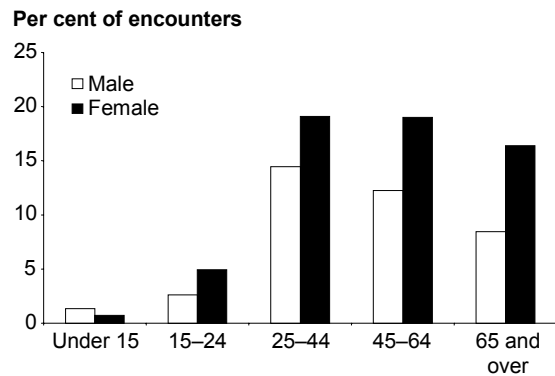


Figure 2.8: Per cent of mental health-related GP encounters by age group and sex, 2002-03

### Private psychiatrists

The patient age and sex distribution for Medicare-funded attendances with private psychiatrists was similar to that for general practice. In 2002-03, 60.8% of these attendances were for female patients.

There were 124.8 attendances per 1,000 population for females, compared with 81.9 for males. Again, the rate was higher for females than males in all age groups except for patients under 15 years (Figure 2.9 and Table 3.15).

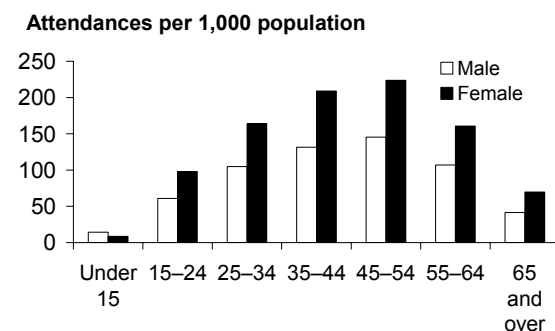


Figure 2.9: Medicare-funded psychiatrist attendances per 1,000 population by age group and sex, 2002-03

### Ambulatory mental health care

In 2001-02 there were slightly more public community-based mental health service contacts for male (50.5%) than female patients (47.5%). There were 219.7 service contacts per 1,000 population for males,

compared with 201.1 for females. Male patients dominated the age groups below 44 years and females dominated the older age groups (Figure 2.10 and Table 3.17).

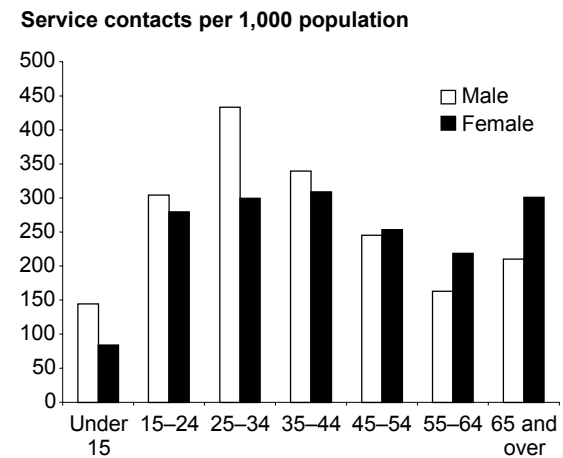


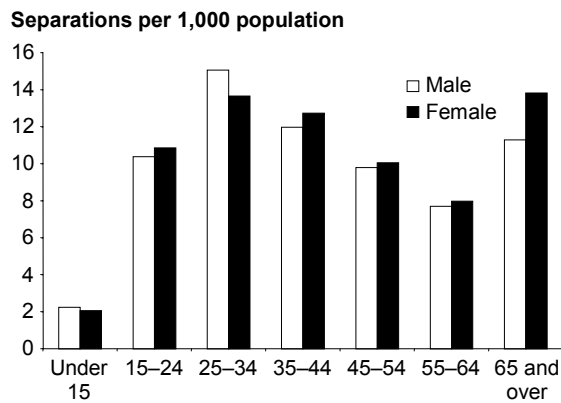
Figure 2.10: Community mental health service contacts per 1,000 population by age group and sex, 2001-02

### Hospital admitted patient care

In 2001-02, there were 187,043 mental health-related separations, excluding separations that could be considered to be equivalent to ambulatory mental health care. For more information on these ambulatory equivalent separations, refer to Chapter 3 and Appendix 3.

Of the 187,043 mental health-related separations, 51.9% were for female patients. There were 9.9 of these separations per 1,000 population for females, compared with 9.3 for males. The rate was higher for females in all age groups above 35 years and in the 15-24 year age group (Figure 2.11).

In 2001-02, there were 1,540,969 patient days for female patients compared with 1,536,537 for males. There were 156.6 days per 1,000 population for females, compared with 158.5 for males. The rates were higher for females than for males in the under 15 years and over 44 years age groups (Tables 5.1 and 6.1).

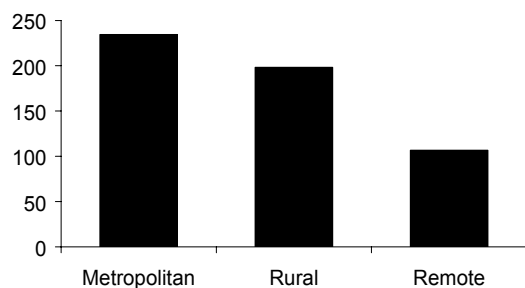


**Figure 2.11: Non-ambulatory-equivalent mental health-related separations per 1,000 population by age group and sex, 2001-02**

## Patient's area of usual residence

This section presents summary information on service use by the area of usual residence of the patient. Community mental health care was not included in this section due to substantial under-reporting of patient's area of usual residence.

### GP encounters per 1,000 population



**Figure 2.12: Mental health-related GP encounters per 1,000 population by Rural, Remote and Metropolitan Area classification, 2002-03**

## General practice

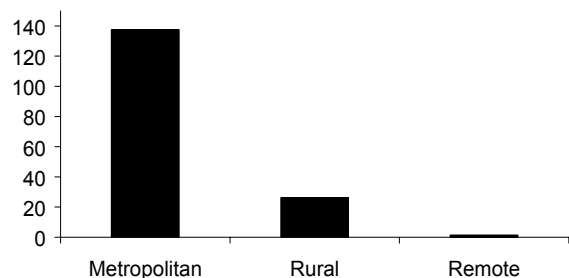
In 2002-03, almost 73% of general practitioners were located in metropolitan areas (Britt et al. 2003). Patients residing in major cities were reported for an estimated 235 mental health-related encounters per 1,000 population compared

with an estimated 107 for patients in remote areas (Figure 2.12).

## Private psychiatrists

In 2002-03 almost 89% of full-time-equivalent private psychiatrists were located in major cities. Reflecting this distribution, the number of Medicare-funded psychiatrist services per 1,000 population ranged from 1.5 in remote areas to 137.6 in metropolitan areas (Figure 2.13 and Table 7.4).

### Psychiatrist services per 1,000 population



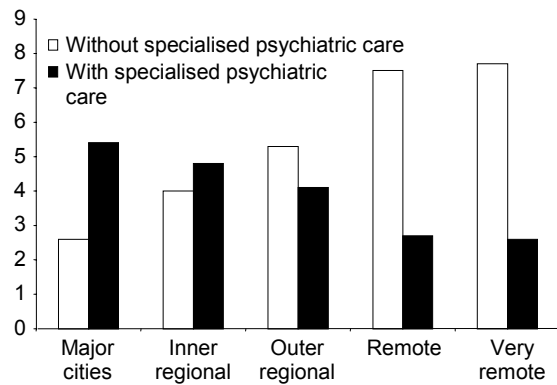
**Figure 2.13: Medicare-funded psychiatrist attendances per 1,000 population by Rural, Remote and Metropolitan Area classification, 2002-03**

## Hospital admitted patient care

The pattern of separations (excluding separations that could be considered to be equivalent to ambulatory mental health care) per 1,000 population by Remoteness Area differed for separations with and without specialised psychiatric care (Figure 2.14 and Tables 5.4 and 6.2). In the case of separations with specialised psychiatric care, the rate per 1,000 population was highest for patients living in major cities (5.8) and lowest for those living in very remote areas (2.7).

The opposite was true for separations without specialised psychiatric care. There the rate was highest for patients living in very remote areas (8.7) and lowest for those living in major cities (3.2).

**Separations per 1,000 population**



**Figure 2.14: Non-ambulatory-equivalent mental health-related separations per 1,000 population by Remoteness Area of usual residence, 2001-02**

## Aboriginal and Torres Strait Islanders

Indigenous people view mental health basically as social and emotional wellbeing. Hence, data on their use of services may reflect a different range of conditions compared with non-Indigenous peoples. Mental health data on Aboriginal and Torres Strait Islander peoples are thought to be under-identified in health care data collections, including those for mental health care.

### Hospital admitted patient care

The number of separations (excluding separations that could be considered to be equivalent to ambulatory mental health care) with specialised psychiatric care per 1,000 Aboriginal and Torres Strait Islander population was higher than that for other Australians (9.6 compared with 5.6) (Figure 2.15 and Tables 5.5 and 6.3).

However, the proportion of care that was specialised was lower for Aboriginal and Torres Strait Islander patients (45.7%) compared with other patients (60.0%).

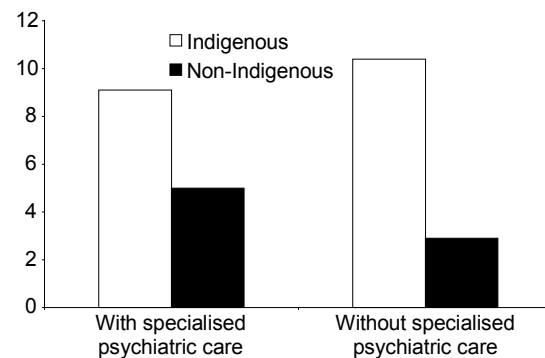
The comparatively high hospitalisation rate could be explained by a greater prevalence of mental disorders for Aboriginal and Torres Strait Islander

people or different patterns of access to different types of services (e.g. ambulatory and admitted patient services).

The higher proportion of non-specialised care for Aboriginal and Torres Strait Islander patients can be partially explained by the differing pattern of disorders between Aboriginal and Torres Strait Islander patients and other Australians. However, after directly standardising by diagnosis groups (as presented in Figure 2.19) the proportion of separations that included specialised psychiatric care remained lower for Indigenous persons (45.7%) than for other Australians (59.9%).

The accuracy of Indigenous identification in hospital separations data needs improvement and these data need to be used with caution (refer to Chapters 5 and 6 for further details).

**Separations per 1,000 population**



**Figure 2.15: Non-ambulatory-equivalent mental health-related separations per 1,000 population by Indigenous status, 2001-02**

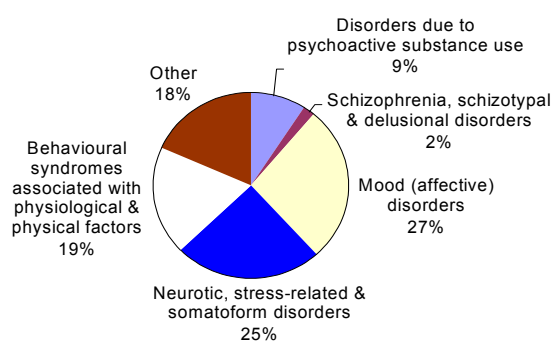
## Mental health problems and disorders

This section presents information on the problems and disorders treated by the different types of mental health service providers. Mood (affective) and anxiety disorders are the most prevalent forms of mental disorder in the Australian population (ABS 1998; Sawyer et al. 2000). It would be expected that these disorders

would be reflected in the problems and disorders treated by mental health service providers.

## General practice

Of the mental health problems managed by general practitioners in 2002–03, mood (affective) related problems were the most frequently managed, followed by anxiety-related and physical disturbances (mainly sleep disturbance) (Figure 2.16 and Table 3.4).

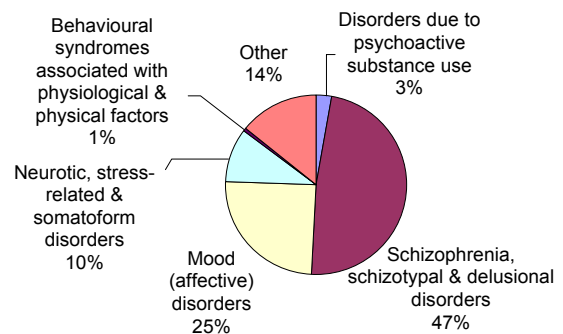


**Figure 2.16: Mental health-related problems managed by general practitioners, 2002–03**

## Outpatient and community ambulatory mental health care

The mental disorders treated in public community-based ambulatory mental health services and hospital outpatient services in 2001–02 included low prevalence disorders such as *Schizophrenia, schizotypal and delusional disorders* (Figure 2.17 and Table 3.20).

These data should be interpreted with caution because no principal diagnosis information was available for a large proportion of service contacts.



**Figure 2.17: Principal diagnoses for service contacts, public community mental health care, 2001–02**

## Hospital admitted patient care

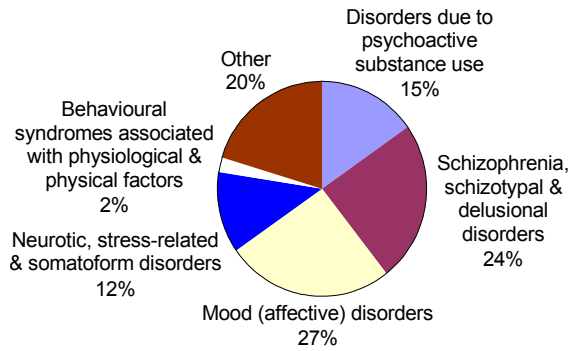
This section presents some information on the mental health-related diagnoses reported for non ambulatory-equivalent mental health-related separations in public and private hospitals, and related patterns of the provision of specialised psychiatric care.

Of these, 57.0% or 85,768 public hospital separations included a component of specialised psychiatric care, that is, care in a specialised psychiatric unit or hospital. This compares with 68.6% or 25,201 separations with a component of specialised psychiatric care in private hospitals.

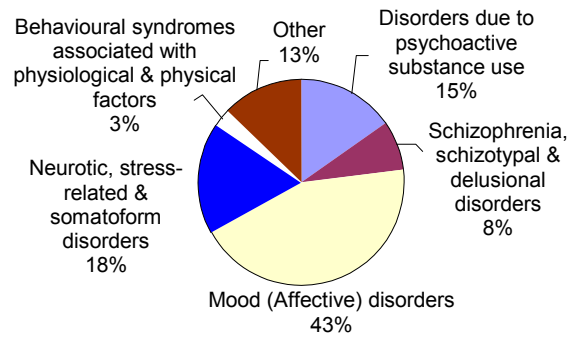
### Public hospitals

In 2001–02, *Mood (affective) disorders* and *Schizophrenia, schizotypal and delusional disorders* were the most common principal diagnoses for public hospital separations (excluding separations that could be considered to be equivalent to ambulatory mental health care) (Figure 2.18 and Tables 5.7 and 6.5).

A high proportion of separations with principal diagnoses of *Mood (affective) disorders*, *Schizophrenia, schizotypal and delusional disorders* and *Disorders of adult personality and behaviour* had specialised psychiatric care (Figure 2.19 and Tables 5.7 and 6.5).



**Figure 2.18: Principal diagnoses for non-ambulatory-equivalent mental health-related separations, public hospitals, 2001-02**

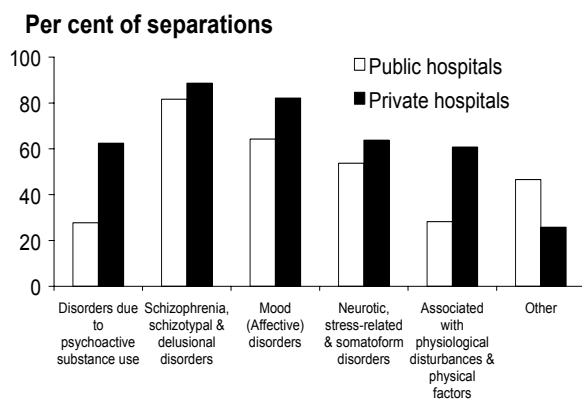


**Figure 2.20: Principal diagnoses for non-ambulatory-equivalent mental health-related separations, private hospitals, 2001-02**

### Private hospitals

Principal diagnoses of *Mood (affective) disorders* and *Neurotic, stress-related and somatoform disorders* were the most common for private hospital separations (excluding ambulatory-equivalent mental health-related separations) (Figure 2.20 and Tables 5.7 and 6.5).

A high proportion of separations with principal diagnoses of *Mood (affective) disorders*, *Schizophrenia, schizotypal and delusional disorders*, *Disorders of adult personality and behaviour* and *Neurotic, stress-related and somatoform disorders* had specialised psychiatric care (Figure 2.19 and Tables 5.7 and 6.5).



**Figure 2.19: Non-ambulatory-equivalent mental health-related separations with specialised psychiatric care, 2001-02**

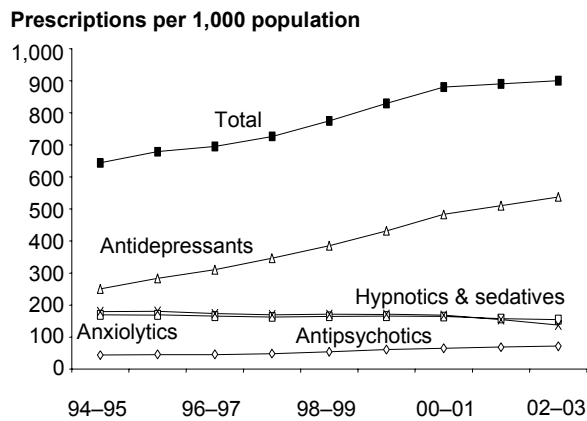
### Medication

This report presents data on the mental health-related medication subsidised through the Pharmaceutical Benefits Scheme (PBS) and prescribed by general practitioners, private psychiatrists and other medical practitioners.

For non-psychiatrists, mental health-related medication was defined as including antidepressants, antipsychotics, anxiolytics and hypnotics and sedatives (see Appendix 2 for more details). For psychiatrists, all medications prescribed were included.

In 2002-03, mental health-related medications accounted for 11.1% (15.8 million) of all the medications prescribed by general practitioners.

Private psychiatrists prescribed a total of 1.8 million mental health-related medications (Table 3.16).



**Figure 2.21: Mental health-related PBS-funded prescriptions per 1,000 population, 1994-95 to 2002-03**

Antidepressants were the most frequently prescribed medication, accounting for 59.6% of mental health-related medications, 54.2% of those prescribed by psychiatrists and 58.9% of those prescribed by general practitioners (Tables 3.13 and 3.16).

In 2002-03, the highest proportion of mental health-related medications was prescribed for females (63.2%) and for the 65 and over age group (35.7%), followed by the 55-64 and 45-54 year age groups (14.3% and 14.0% respectively).

Between 1994-95 and 2002-03, there was an increase in the number of mental health-related medications prescribed per 1,000 population, from 644 to 901 per 1,000 population (Figure 2.21). This increase was mainly in the prescription of antidepressants.

## Labour force

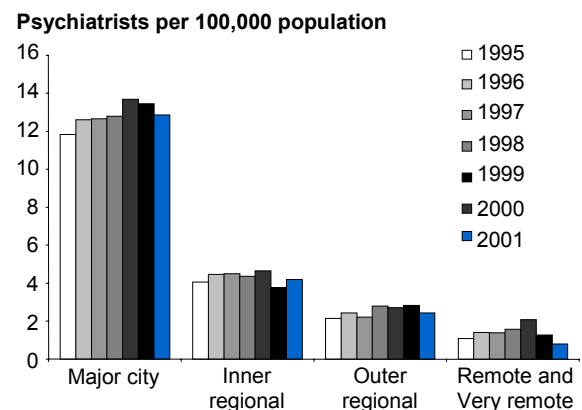
This report presents data on two mental health-related professions for whom there are recent national data available: psychiatrists and mental health nurses. These labour force data were collected in conjunction with the annual registration renewal of these practitioners with the relevant registration boards in each state and territory. Recent national data were not available for other mental health-

related professions such as psychologists, social workers and occupational therapists.

## Psychiatrists

Psychiatrists were defined as medical practitioners who had been accepted as members of the Royal Australian and New Zealand College of Psychiatrists (RANZCP). Both public and private sector psychiatrists are included.

In 2001, Australia had 10.8 psychiatrists per 100,000 population (including 0.8 non-clinicians) and 3.3 psychiatrists-in-training per 100,000 population (including 0.2 non-clinicians)(Table 7.1).



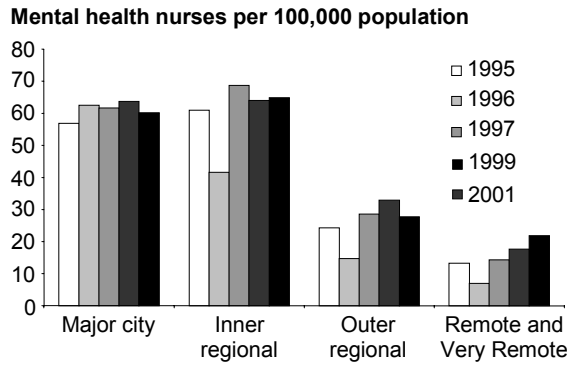
**Figure 2.22: Psychiatrists per 100,000 population by Remoteness Area, 1995 to 2001**

Major cities had a relatively high number of psychiatrists per 100,000 population (Figure 2.22 and Table 7.3). Remote and very remote areas had fewer psychiatrists per 100,000 population. Rates increased in remote and very remote areas until 1999 and then decreased in 2000 and 2001.

These data do not reflect arrangements where psychiatrists make regular visits to rural and remote areas or use telepsychiatry consultations.

## Mental health nurses

Mental health nurses were defined as nurses who reported that their main area of nursing was mental health. Both public and private sector nurses are included.



**Figure 2.23: Mental health nurses per 100,000 population by Remoteness Area, 1995 to 2001**

In 2001, there were 12,077 nurses with psychiatric and mental health nursing identified as their main area of nursing. They accounted for 6.0% of all employed clinical nurses.

There were 62.2 mental health nurses per 100,000 population in 2001, a level consistent with previous years. This compares with an average for high-income countries of 33.5 psychiatric (mental health) nurses per 100,000 population (WHO 2001).

Major cities and inner regional areas had a relatively high number of mental health nurses per 100,000 population (Figure 2.23 and Table 7.8). Remote and very remote areas had fewer of these nurses per 100,000 population, but rates increased between 1996 and 2001.