

---

# 12 Health management issues

## CONTENTS

<b>12.1 Overview of health management</b>	<b>12.2</b>
<b>12.2 Framework for measuring the performance of health management</b>	<b>12.3</b>
<b>12.3 Breast cancer</b>	<b>12.5</b>
<b>12.4 Mental health</b>	<b>12.34</b>
<b>12.5 Future directions in performance reporting</b>	<b>12.86</b>
<b>12.6 Jurisdictions' comments</b>	<b>12.88</b>
<b>12.7 Definitions of key terms and indicators</b>	<b>12.98</b>
<b>12.8 Attachment tables</b>	<b>12.105</b>
<b>12.9 References</b>	<b>12.108</b>

### **Attachment tables**

Attachment tables are identified in references throughout this chapter by an 'A' suffix (for example, table 12A.3). A full list of attachment tables is provided at the end of this chapter, and the attachment tables themselves are available on the CD-ROM enclosed with the Report or from the Review website at <[www.pc.gov.au/gsp](http://www.pc.gov.au/gsp)>.

Health management is concerned with the management of diseases, illnesses and injuries using a range of services (promotion, prevention/early detection and intervention) in a variety of settings (for example, public hospitals, community health centres and general practice). This chapter reports on the management of breast cancer and mental health, which represent some activities of the Australian, State and Territory governments in health management.

---

## 12.1 Overview of health management

Health management is the ongoing process beginning with initial client contact and including all actions relating to the client: assessment/evaluation; education of the person, family or carer(s); diagnosis; and treatment. Problems associated with adherence to treatment and liaison with, or referral to, other agencies are also included.

This chapter examines the performance of a number of services in influencing outcomes for women with breast cancer and for people with a mental illness. Breast cancer and mental illness are significant causes of morbidity and mortality in Australia. Cancer control and mental health are identified by governments as national health priority areas (as are asthma, cardiovascular health, diabetes mellitus, injury prevention and control, arthritis and musculoskeletal conditions). The national health priority areas represent almost 80 per cent of the total burden of disease and injury in Australia, and their management offers considerable scope for reducing this burden (AIHW 2003b).

Breast cancer detection and management services comprise a number of major components: primary care and community-based services, including general practitioner (GP) services and community-based women's health services; screening services; acute services based in hospitals, including both inpatient and outpatient services; private consultations for a range of disciplines; and post-acute services, including home-based and palliative care (DHS 1999). Relevant clinical disciplines include surgery, plastic and reconstructive surgery, pathology, radiation and medical oncology, nursing, diagnostic radiology, radiography, physiotherapy, allied health, and psychological and psychiatric services. Post-acute services include a range of further treatments, such as radiotherapy and chemotherapy (most of which take place on a same day or outpatient basis) and a range of follow up and palliative care services (DHS 1999).

Specialised mental health management services include a range of government and non-government service providers offering promotion, prevention, treatment and management, and rehabilitation services. Community mental health facilities, psychiatrists, clinical psychologists, psychotherapists, mental health clinicians in private practice, counsellors, Aboriginal health workers, Aboriginal mental health workers, public hospitals with specialised psychiatric units and stand-alone psychiatric hospitals all provide specialised mental health care. In addition, a number of health services provide care to mental health patients in a non-specialised health setting — for example, GPs, Aboriginal community controlled health services, public hospital emergency departments and outpatient departments, and

---

public hospital general wards (as opposed to specialist psychiatric wards). Some people with a mental illness are cared for in residential aged care services.

Both breast cancer and mental health are the subject of programs designed to improve public health. Public health programs require the participation of public hospitals, primary and community health services, and other services. The performance of public hospitals is discussed in chapter 10 and the performance of primary and community health services generally is discussed in chapter 11.

Several improvements have been made to the chapter this year:

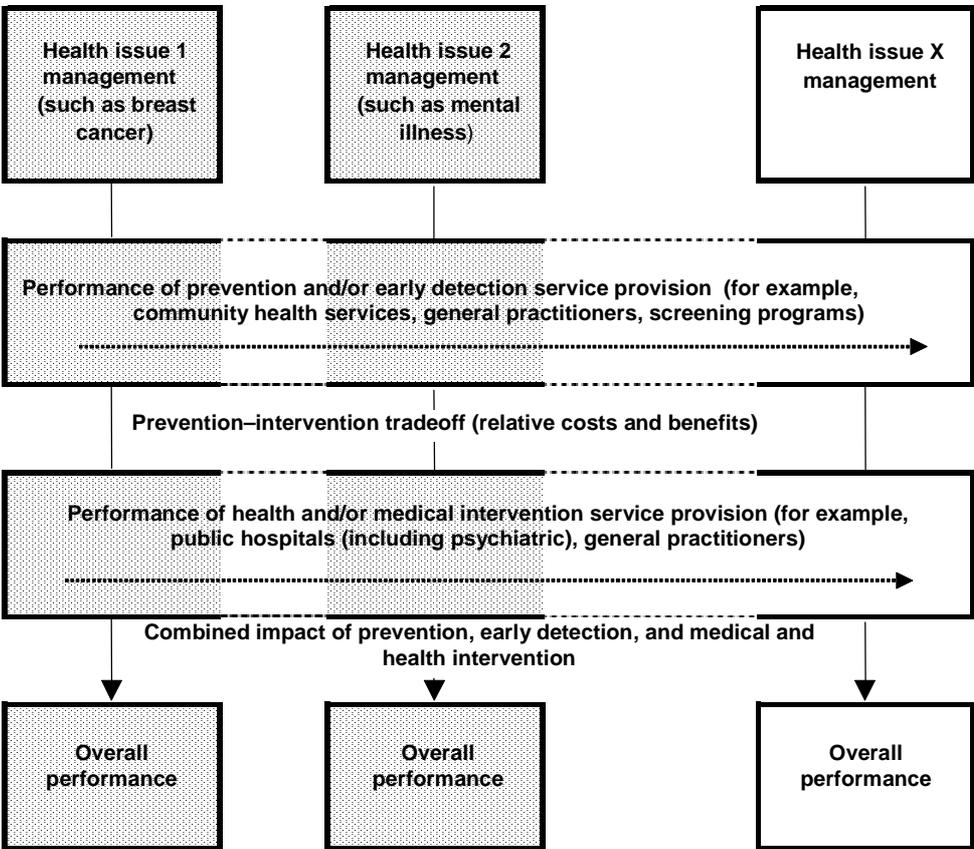
- the inclusion of data from the ABS's 2007 *National Survey of Mental Health and Wellbeing* on the following:
  - the prevalence of mental illnesses/disorders
  - the participation of people with mental illnesses/disorders in the labour force, employment and study
  - the use of services for mental health by people with mental illnesses/disorders
- the reporting of data on the proportion of the population receiving clinical mental health care
- the reporting of expenditure on community-based services as a proportion of total spending on mental health services (a replacement measure for recurrent expenditure on stand-alone psychiatric hospitals as a proportion of total expenditure on mental health services). This change reflects the progress that has been made toward reforms recommended under the National Mental Health Strategy (NMHS)
- the inclusion of data for the following mental health indicators for the first time:
  - 'rates of community follow up for people within the first seven days of discharge from hospital'
  - 'readmissions to hospital within 28 days of discharge'.

## **12.2 Framework for measuring the performance of health management**

Policy makers are seeking alternative service delivery settings and a more coordinated approach to managing health problems. Measuring performance in the management of a health problem involves measuring the performance of service providers, and the overall management of a spectrum of services, including prevention, early detection and treatment programs.

The ‘Health preface’ of this Report outlines the complexities of reporting on the performance of the overall health system in meeting its objectives. Frameworks for public hospitals and primary and community health services report the performance of particular service delivery mechanisms. The appropriateness of the mix of services (prevention versus intervention) and the appropriateness of the mix of delivery mechanisms (hospital-based versus community-based) are the focus of reporting in this chapter. The measurement approach is represented diagrammatically in figure 12.1.

Figure 12.1 The Australian health system — measurement approach



The appropriate mix of services — including the prevention of illness and injury, medical treatment and the appropriate mix of service delivery mechanisms — is measured by focusing on a specific health management issue (represented by the vertical arrows). As in previous years, the chapter covers breast cancer detection and management, and specialised mental health services. The breast cancer management framework integrates early detection and medical intervention strategies, which should inform the decisions in the allocation of resources between these two strategies. The mental health framework provides information on the

---

interaction and integration arrangements between community-based and hospital-based providers in meeting the needs of Australians with a mental illness.

## 12.3 Breast cancer

### Profile

Breast cancer is a disease whereby uncontrolled or malignant cell division leads to the formation of a tumour or tumours in a woman's breast (box 12.1).<sup>1</sup> Tumours may expand locally by invading surrounding tissue, or they may spread via the lymphatic or vascular systems to the rest of the body. If left untreated, most malignant tumours result in the death of the affected person (AIHW 2003a). The focus of this Report is on invasive cancers, although some data are reported on ductal carcinoma in situ (DCIS) — noninvasive tumours residing in the ducts of the breast.

**Box 12.1 Some common health terms used in breast cancer detection and management**

**breast conserving surgery:** an operation to remove the breast cancer but not the breast itself. Types of breast conserving surgery include lumpectomy (removal of the lump), quadrantectomy (removal of one quarter of the breast) and segmental mastectomy (removal of the cancer as well as some of the breast tissue around the tumour and the lining over the chest muscles below the tumour).

**BreastScreen Australia:** BreastScreen Australia is the national mammographic population screening program. It is aimed at well women without symptoms. It provides free screening mammograms at two-yearly intervals for women aged 50–69 years with the aim of reducing deaths from breast cancer in this target group through early detection of the disease. Women aged 40–49 years and 70 years or over are eligible to attend but are not actively targeted. Services provided by BreastScreen Australia include all screening and assessment services to the point of diagnosis. The program includes health promotion activities, information provision, counselling and data collection across the screening and assessment pathways. BreastScreen Australia is jointly funded by the Australian, State and Territory governments.

**ductal carcinoma in situ (DCIS):** abnormal cells that involve only the lining of a duct. The cells have not spread outside the duct to other tissues in the breast. DCIS is also known as intraductal carcinoma.

(Continued on next page)

---

<sup>1</sup> Breast cancer in males is rare. It is not examined in this Report.

**Box 12.1 (Continued)**

**incidence rate:** the proportion of the population newly diagnosed with a particular disorder or illness during a given period (often expressed per 100 000 people).

**invasive cancer:** a tumour whose cells invade healthy or normal tissue.

**prevalence:** the number of cases of a disease present in a population at a given time (point prevalence) or during a given period (period prevalence).

**screening:** the performance of tests on apparently well people to detect disease at an earlier stage than would otherwise be the case.

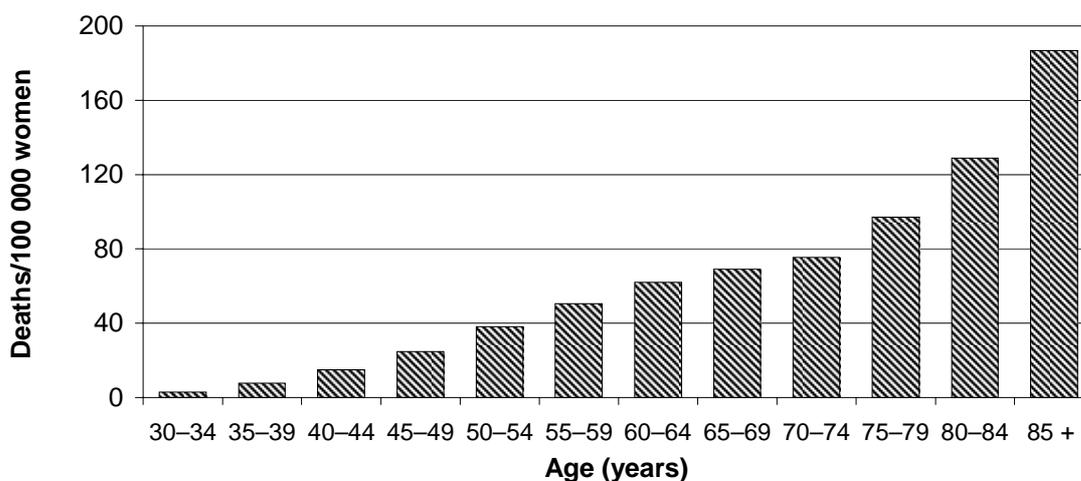
**screening round (first):** a woman's first visit to a BreastScreen Australia service.

**screening round (subsequent):** a woman's second or subsequent visit to a BreastScreen Australia service.

**total mastectomy:** removal of the breast (also known as a simple mastectomy).

Breast cancer was responsible for 2618 female deaths in 2006, making it one of the most frequent causes of death from cancer for females (ABS 2008a). The strong relationship between age and the mortality rate from breast cancer is shown for the period 2002–2006 in figure 12.2. For women aged 40–44 years at diagnosis the annual average mortality rate over this period was 15.0 per 100 000, whereas for women aged 75–79 years at diagnosis, the annual average mortality rate was 97.0 per 100 000.

**Figure 12.2 Annual average mortality rates from breast cancer, by age group, 2002–2006**

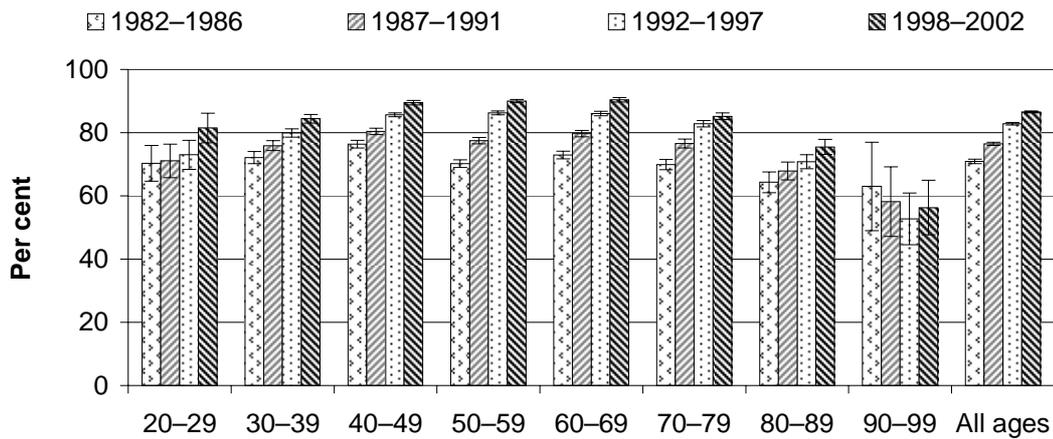


Source: Australian Institute of Health and Welfare (AIHW) (unpublished), derived from the AIHW National Mortality Database; table 12A.1.

Relative survival after diagnosis of breast cancer in females is better than for other cancers. The relative survival rate 10 years after diagnosis was 73.6 per cent for women diagnosed in 1992–1997 (AIHW and NBCC 2006). For women diagnosed during the period 1998–2002, the relative survival rate was 96.7 per cent one year after diagnosis, and 86.6 per cent five years after diagnosis.

There was a significant increase in the five year relative survival rate after diagnosis of breast cancer in females between 1982–1986 and 1998–2002 (figure 12.3). Five year relative survival for breast cancer in Australia over the period 1998–2002 increased with age at diagnosis from the age group 20–29 years (81.5 per cent) to a peak for the age groups 40–49 years (89.5 per cent), 50–59 years (90.0 per cent) and 60–69 years (90.4 per cent). The five year relative survival rate declined with age at diagnosis for women over 70 years (figure 12.3).

Figure 12.3 **Breast cancer five year relative survival at diagnosis, by age group<sup>a</sup>**



<sup>a</sup> Five year relative survival results for the 0–19 age group are not presented because interpretation is made difficult by statistical instability.

Source: AIHW and NBCC (2006) *Breast cancer in Australia: an overview, 2006*, Cancer series no. 34, Cat. no. CAN 29; table 12A.2.

### *Incidence and prevalence*

Breast cancer is the most prevalent type of cancer affecting Australian women. In 2003, the estimated risk of a woman in Australia developing breast cancer before the age of 75 years was one in eleven (AIHW and AACR 2007). The number of new cases of breast cancer diagnosed in Australian women increased from an annual average of 10 942 over the period 1997–2001 to an annual average of 12 005 over the period 2001–2005 (table 12.1). The increase in the number of cases

detected reflected both an increase in the underlying rate of breast cancer, and the early detection of cancers that previously would not have been discovered for some years, primarily through the activity of BreastScreen Australia (AIHW 2003a).

**Table 12.1 Annual average new cases of breast cancer diagnosed (number)<sup>a</sup>**

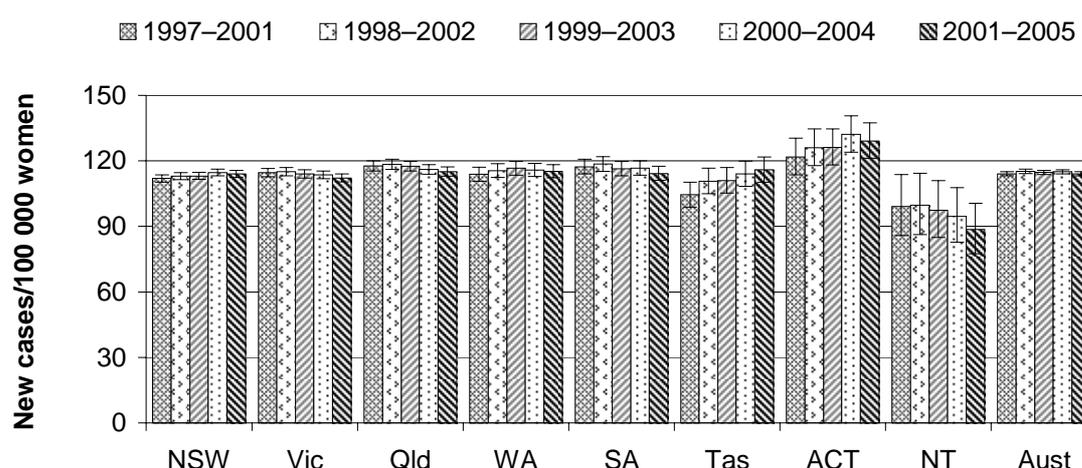
	<i>NSW</i>	<i>Vic</i>	<i>Qld</i>	<i>WA</i>	<i>SA</i>	<i>Tas</i>	<i>ACT</i>	<i>NT</i>	<i>Aust</i>
1997–2001	3 701	2 793	2 002	1 000	962	262	168	54	10 942
1998–2002	3 816	2 865	2 081	1 046	990	282	181	55	11 315
1999–2003	3 897	2 895	2 137	1 087	989	288	187	59	11 539
2000–2004	4 026	2 945	2 184	1 112	1 009	303	200	61	11 839
2001–2005	4 073	2 969	2 240	1 139	1 009	314	200	61	12 005

<sup>a</sup> A new case is defined as a person who has a cancer diagnosed for the first time. One person may have more than one cancer, so may be counted twice in incidence statistics if it is decided that the two cancers are not of the same origin.

Source: AIHW (unpublished), derived from the National Cancer Statistics Clearing House (NCSCH); table 12A.3.

Annual average age standardised incidence rates of breast cancer are presented in figure 12.4. Breast cancer incidence data are averaged over five year periods to smooth volatility in year-on-year movements, particularly for smaller jurisdictions that tend to have fewer cases and relatively large variations in rates from year to year. Australia-wide, the annual average incidence rate from the period 1997–2001 to the period 2001–2005 fluctuated between 114.1 and 115.2 per 100 000 women.

**Figure 12.4 Annual average age standardised incidence rates of breast cancer for women of all ages<sup>a, b</sup>**

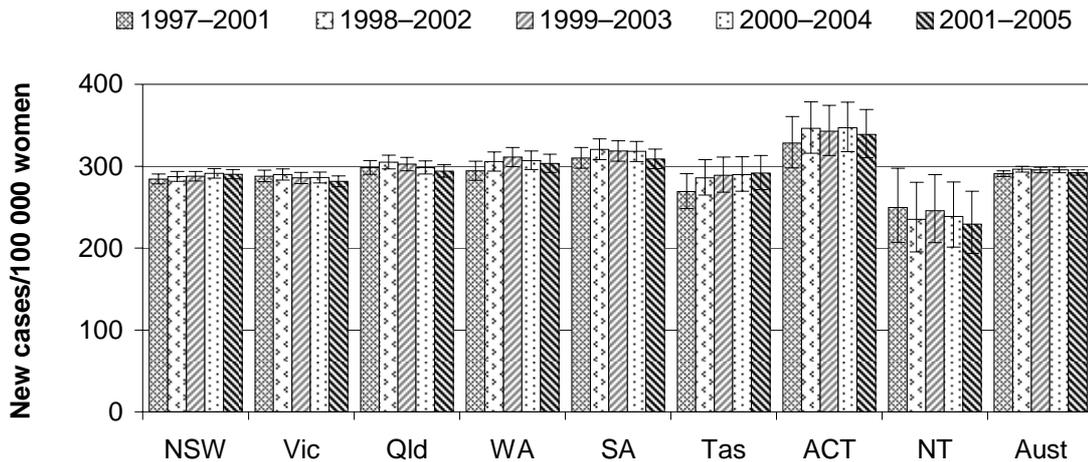


<sup>a</sup> Incidence refers to the number of new cases of breast cancer per 100 000 women. <sup>b</sup> Rates are age standardised to the Australian 2001 population standard.

Source: AIHW (unpublished), derived from the NCSCH; table 12A.4.

Annual average age standardised incidence rates of breast cancer for women aged 50–69 years are shown in figure 12.5.

Figure 12.5 **Annual average age standardised incidence rates of breast cancer for women aged 50–69 years<sup>a, b</sup>**



<sup>a</sup> Incidence refers to the number of new cases of breast cancer per 100 000 women. <sup>b</sup> Rates are age standardised to the Australian 2001 population standard.

Source: AIHW (unpublished), derived from the NCSCH; table 12A.4.

### *Size and scope of breast cancer detection and management services*

A fundamental component of breast cancer control is the use of screening mammography to enable early detection of breast cancer. There is evidence that population-based screening of women aged 50–69 years can reduce deaths from breast cancer. According to the National Breast and Ovarian Cancer Centre (NBOCC — formerly the National Breast Cancer Centre [NBCC]), women whose cancer is diagnosed before it has spread outside the breast have a 90 per cent chance of surviving five years. The five year survival rate drops to 20 per cent if the cancer spreads to other parts of the body before diagnosis (NBCC 2003). It is generally accepted that cancers detected early may be treated more conservatively and that these women have a higher likelihood of survival.

The BreastScreen Australia Program, jointly funded by the Australian, State and Territory governments, undertakes nationwide breast cancer screening. It targets women aged 50–69 years for screening once every two years. The Program aims to have 70 per cent or more of women aged 50–69 years participating in screening over a 24 month period. Recruitment activities undertaken by BreastScreen Australia specifically target women in this age group, although the service is also available to women aged 40–49 years, and 70 years or over.

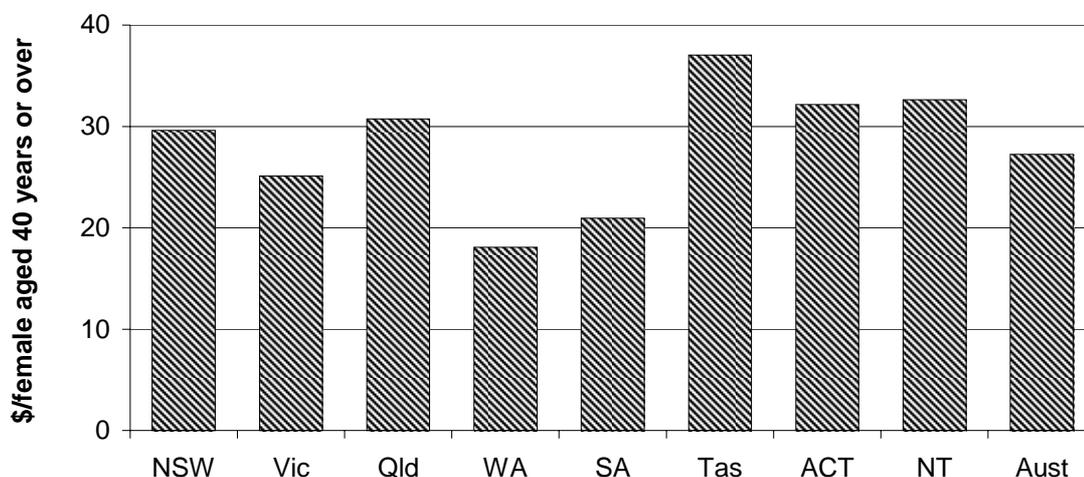
---

Services provided by BreastScreen Australia in each State and Territory include all screening and assessment services to the point of diagnosis. The Program includes health promotion activities, information provision, counselling and data collection across the screening and assessment pathways. Assessment services funded under the BreastScreen Australia Program include fine needle aspiration and core biopsies and, in some states and territories, open biopsies. Open biopsies are funded outside the Program in Queensland, SA, Tasmania and the NT (table 12A.5).

Each jurisdiction manages a central BreastScreen Australia registry to ensure women with an abnormality detected at screening are recalled for assessment and to enable women to be invited for re-screening at the appropriate interval. Data collected from the registries allow for quality assurance, monitoring and evaluation of the Program. Information on BreastScreen Australia performance is published by the Australian Institute of Health and Welfare (AIHW) in the *BreastScreen Australia monitoring* reports, the most recent of which was published in 2008 (AIHW 2008a).

Governments spent around \$134 million on breast cancer screening in 2006-07 (table 12A.6). Estimates of government expenditure on breast cancer screening per woman aged 40 years or over are presented by jurisdiction in figure 12.6. These estimates include Australian, State and Territory government expenditure. Differences across jurisdictions partly reflect variation in the proportion of women in the target age group for breast cancer screening, data deficiencies and collection methods, as well as the nature of the services and their relative efficiency. Some differences may also be due to the geography of a State or Territory, and to the proportion of the target population living in rural and remote areas. The data therefore need to be interpreted with care.

Figure 12.6 **Public health expenditure on breast cancer screening, 2006-07<sup>a, b, c, d, e, f, g</sup>**



<sup>a</sup> In every jurisdiction, BreastScreen Australia is a joint initiative funded by both the State or Territory government and the Australian Government under the Public Health Outcome Funding Agreements. <sup>b</sup> The data need to be interpreted with care because of data deficiencies, differences across jurisdictions relating to the use of cash accounting and accrual methods, the treatment of corporate and central office costs, differences in methods used to collect expenditure figures, and differences in the interpretation of public health expenditure definitions. <sup>c</sup> The Australian total includes Australian Government direct project expenditure, database or registry and other program support, population health non-grant program costs and running costs. <sup>d</sup> Medicare funding for radiographic breast examinations is excluded because it is not public health expenditure. <sup>e</sup> Victorian data include depreciation. <sup>f</sup> Data for the ACT include expenditure on BreastScreen ACT and the Cancer Registry. <sup>g</sup> Data for the NT for direct expenditure include public health information systems, disease surveillance and epidemiological analysis, public health communication and advocacy, public health policy, program and legislation development, and public health workforce development.

Source: AIHW (unpublished), derived from the AIHW Health Expenditure Database; ABS (unpublished), derived from *Estimated Residential Population*, Cat. no. 3101.0; tables AA.1 and 12A.6.

The number of women aged 40 years or over screened by BreastScreen Australia indicates the size of the BreastScreen Australia Program. Nearly 837 000 women in this age group were screened in 2007, compared with 842 000 in 2003 (table 12.2).

Table 12.2 **Number of women aged 40 years or over screened by BreastScreen Australia<sup>a</sup>**

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
2003	289 913	188 782	180 396	76 059	69 182	22 424	10 651	4 547	841 954
2004	270 598	198 743	191 084	78 773	69 882	23 107	9 995	4 045	846 227
2005	235 812	197 627	199 981	81 351	70 909	25 440	11 901	4 481	827 502
2006	257 211	202 462	200 992	88 667	67 476	24 963	11 446	4 136	857 353
2007	249 193	195 288	202 372	81 629	67 508	24 041	12 277	4 635	836 943

<sup>a</sup> First and subsequent screening rounds, for women aged 40 years or over.

Source: State and Territory governments (unpublished); table 12A.7.

Breast cancer is diagnosed outside the BreastScreen Australia Program when women access mammographic services privately, are outside the age range for the program, or have symptoms which make it inappropriate for them to attend for screening. For these women, GPs are critical as the initial point of referral to specialists for diagnosis and treatment services.

Inpatient separations in public hospitals for selected breast cancer related Australian refined diagnosis related groups (AR-DRGs)<sup>2</sup> in 2006-07 are presented in table 12.3.

**Table 12.3 Separations for selected AR-DRGs related to breast cancer, public hospitals, 2006-07 (per 10 000 people)<sup>a, b</sup>**

	<i>NSW</i>	<i>Vic</i>	<i>Qld</i>	<i>WA</i>	<i>SA</i>	<i>Tas</i>	<i>ACT</i>	<i>NT</i>	<i>Aust</i>
<b>Breast cancer related conditions</b>									
Major procedures for malignant breast conditions	3.0	3.4	2.6	3.0	2.9	2.5	3.7	1.5	3.0
Minor procedures for malignant breast conditions	1.0	1.2	1.1	1.0	1.0	1.1	0.9	0.6	1.0
Skin, subcutaneous tissue and breast plastic operating room procedures	3.2	3.3	3.2	3.5	5.8	3.4	2.3	2.5	3.4
Other skin, subcutaneous tissue and breast procedures	12.7	23.2	18.6	18.9	20.5	16.4	9.5	13.0	17.7
Malignant breast disorders (Age >69 W CC) or W (Cat or Sev CC)	0.6	0.6	0.4	0.4	0.9	0.7	0.2	0.3	0.6
Malignant breast disorders (Age>69 W/O CC) or W/O (Cat or Sev CC)	0.3	0.8	0.4	1.4	0.6	1.6	np	0.5	0.6
<b>All conditions<sup>c</sup></b>	<b>2 071.9</b>	<b>2 478.7</b>	<b>1 836.2</b>	<b>2 108.0</b>	<b>2 412.7</b>	<b>1 932.0</b>	<b>2 139.7</b>	<b>3 986.7</b>	<b>2 172.4</b>

W=with. W/O=without. CC=complications and co-morbidities. Cat or Sev=catastrophic or severe. <sup>a</sup> Care needs to be taken when comparing jurisdictions because admission practices vary. <sup>b</sup> AR-DRG version 5.1. <sup>c</sup> The total includes separations for which the care type was reported as acute, or newborn with qualified patient days, or was not reported. Crude rate based on the Australian population as at 31 December 2006. **np** Not published.

Source: AIHW (2008) *Australian hospital statistics 2006-07*, Cat. no. HSE 55; table 12A.8.

## Framework of performance indicators

The indicators developed to report on the performance of breast cancer detection and management are based on the shared government objectives for managing the disease (box 12.2). The 'Health preface' explains the performance indicator

<sup>2</sup> AR-DRGs are a patient classification system that hospitals use to match their patient services (hospital procedures and diagnoses) with their resource needs. AR-DRG version 5.1 is based on the ICD-10-AM classification (see chapter 10 for more detail).

---

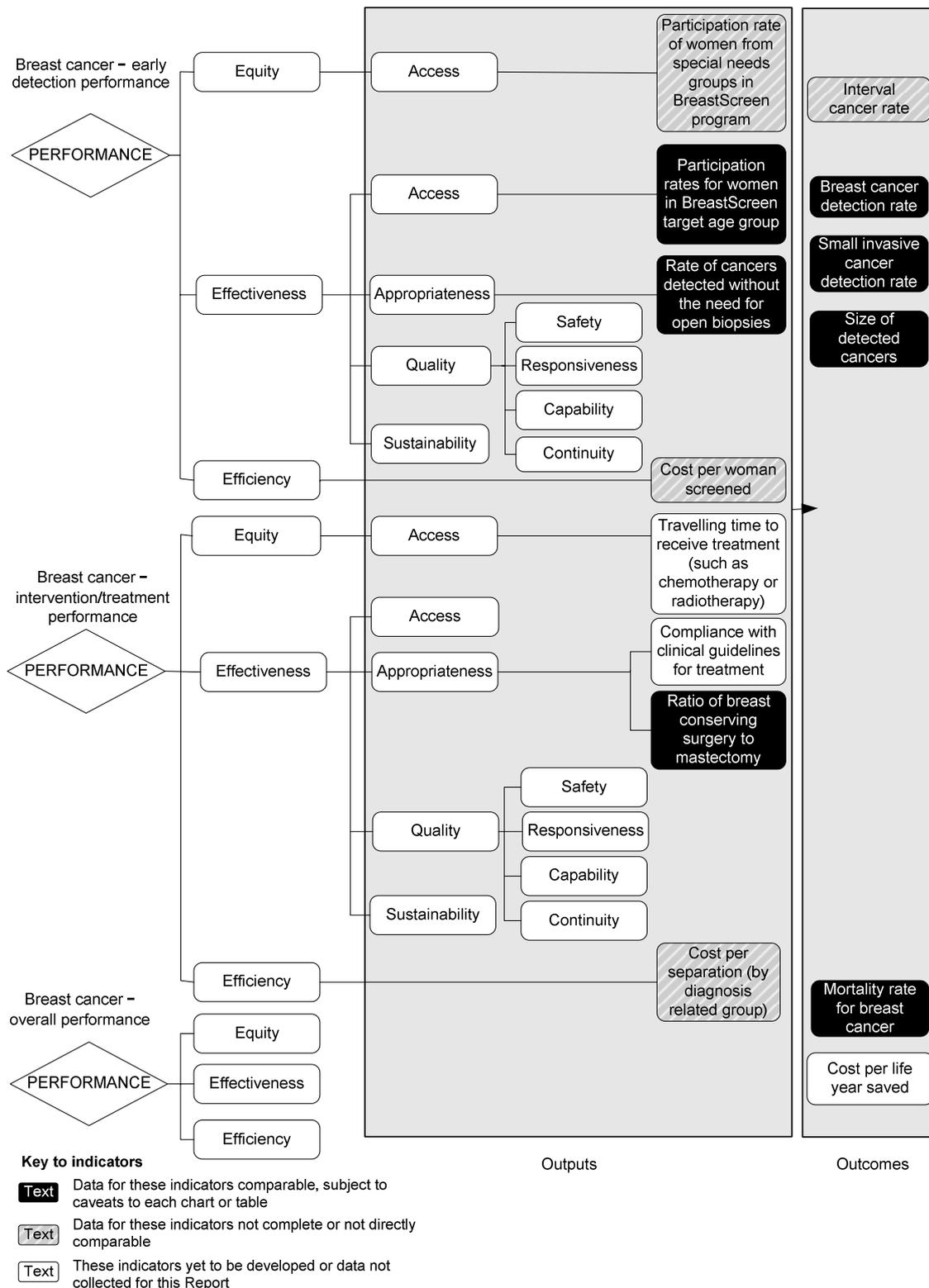
framework for health services as a whole, including the health services subdimensions for quality and sustainability that have been added to the standard Review framework. The framework for breast cancer detection and management focuses on achieving a balance between early detection and treatment. It has a tripartite structure — that is, performance indicators presented relate to early detection, intervention and overall performance. Breast cancer prevention is excluded from the framework in the absence of definitive primary preventative measures, although there are known associated risk factors. There are ongoing trials examining possible preventative interventions for the small proportion of the population at high risk of breast cancer due to the presence of BRCA1 or BRCA2 genetic variations.

The performance indicator framework shows which data are comparable in the 2009 Report (figure 12.7). For data that are not considered directly comparable, the text includes relevant caveats and supporting commentary. Chapter 1 discusses data comparability from a Report-wide perspective (see section 1.6).

**Box 12.2 Objectives for breast cancer detection and management**

The objectives for breast cancer detection and management are to reduce morbidity and mortality attributable to breast cancer, and to improve the quality and duration of life of women with breast cancer, in a manner that is equitable and efficient.

**Figure 12.7 Performance indicators for breast cancer detection and management**



---

## Key performance indicator results

Data relating to breast cancer screening are readily available through the BreastScreen Australia Program, while data relating to the management and treatment of breast cancer are limited. Hence, most of the breast cancer detection and management data in this Report are provided by BreastScreen Australia, and screening is currently the main focus of reporting. It is a Steering Committee priority to extend reporting in the area of the management and treatment of breast cancer.

Ongoing monitoring of BreastScreen Australia involves reporting Program performance against specific indicators such as participation, detection of small invasive cancers, sensitivity, detection rate for ductal carcinoma in situ, recall to assessment and rescreening rates. Data are collected at the jurisdictional level and provide an overview of the performance of the Program.

In addition, each BreastScreen Australia service is assessed against 173 National Accreditation Standards as part of their accreditation process. These Standards include a number of indicators that collectively assess the safety of the services provided by individual BreastScreen Australia services.

### *Outputs*

Outputs are the actual services delivered (while outcomes are the impact of these services on the status of an individual or group) (see chapter 1, section 1.5).

### *Early detection — participation rate of women from selected community groups in BreastScreen Australia programs*

‘Participation rate of women from selected community groups in BreastScreen Australia programs’ is an indicator of governments’ objective to reduce morbidity and mortality attributable to breast cancer through early detection strategies, in a manner that is equitable (box 12.3).

**Box 12.3 Participation rate of women from selected community groups in BreastScreen Australia programs**

The 'participation rate of women from selected community groups in BreastScreen Australia programs' is defined as the proportion of the eligible population in each selected community group attending the screening program within a 24 month period.

Participation rates for community groups that are at, or close to, those for the total population indicate equitable access to early detection services.

Data reported for this indicator are not directly comparable.

Early detection is associated with better outcomes for women with breast cancer, in terms of morbidity and mortality. Indigenous women, women from non-English speaking backgrounds (NESB) and women living in outer regional, remote and very remote areas may experience particular language, cultural and geographic barriers to accessing breast cancer screening.

In 2006–07, the national age standardised participation rate for Indigenous women aged 50–69 (40.3 per cent) was below the total participation rate in that age group (56.1 per cent), although this may be influenced by the quality of Indigenous identification in screening program records (table 12.4, table 12A.10). For the same 24 month period and age group, the national participation rate of 49.7 per cent for NESB women was also lower than that of the national total female population (table 12.4, table 12A.11). Care needs to be taken when comparing data across jurisdictions, given differences in the collection of data by Indigenous and NESB status.

**Table 12.4 Age standardised participation rates of women aged 50–69 years from selected communities in BreastScreen Australia programs, 2006 and 2007 (24 month period) (per cent)<sup>a, b</sup>**

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Indigenous <sup>c</sup>	41.7	36.1	51.6	34.7	35.3	31.3	36.6	26.5	40.3
NESB <sup>d</sup>	54.7	36.5	65.0	64.8	54.0	22.2	35.0	37.0	49.7
All women aged 50–69 years	56.0	55.9	56.6	57.5	55.8	54.2	57.0	40.2	56.1

<sup>a</sup> First and subsequent rounds. <sup>b</sup> Rates are standardised to the 2001 Australian population standard. <sup>c</sup> Those women who self-identify as being of Aboriginal or Torres Strait Islander descent. <sup>d</sup> Non-English speaking background (NESB) is defined as speaking a language other than English at home.

Source: State and Territory governments (unpublished); ABS (2008) *Population by Age and Sex, Australian States and Territories, June 2002-2007*, Cat. no. 3201.0; ABS (unpublished), derived from *Experimental Estimates And Projections, Aboriginal And Torres Strait Islander Australians, 1991 to 2009*, Cat. no. 3238.0; ABS (unpublished), derived from *2006 Census of Population and Housing*; tables 12A.9–12A.11.

Updated data for participation rates by geographic location were not available for the 2009 Report. Historical data are presented in table 12A.12.

---

*Early detection — participation rate of women in the BreastScreen Australia target age group*

The ‘participation rate of women in the BreastScreen Australia target age group’ is an indicator of governments’ objective to reduce morbidity and mortality attributable to breast cancer through early detection strategies (box 12.4).

**Box 12.4 Participation rate of women in the BreastScreen Australia target age group**

The ‘participation rate of women in the BreastScreen Australia target age group’ is defined as the number of women aged 50–69 years attending the screening program within a 24 month period, divided by the estimated population of women aged 50–69 years.

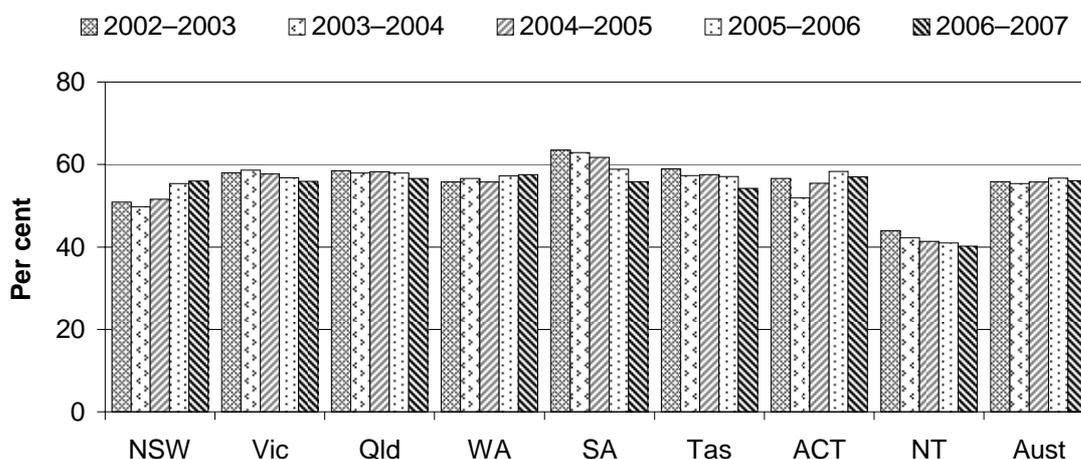
Increased screening participation rates are desirable.

Data reported for this indicator are comparable.

Early detection is associated with better outcomes for women with breast cancer, in terms of morbidity and mortality. The aim under the National Accreditation Standards (2004) is that at least 70 per cent of women aged 50–69 years participate in screening over a 24 month period. Recruitment activities undertaken by BreastScreen Australia specifically target women in this age group (BreastScreen Australia 2004). Access to the program is also provided for women aged 40–49 years and 70 years or over.

The national participation rate of women aged 50–69 years in BreastScreen Australia screening programs was 56.1 per cent in the 24 month period 2006 and 2007. At a national level, the participation rate has been relatively steady since the 2002–2003 24 month period, well below the 70 per cent aim under the National Accreditation Standards (figure 12.8).

**Figure 12.8 Age standardised participation rates of women aged 50–69 years in BreastScreen Australia screening programs (24 month period)<sup>a, b</sup>**



<sup>a</sup> The participation rate is the number of women resident in the jurisdiction who were screened during the reference period, divided by the number of women resident in the jurisdiction, using the ABS estimated resident population. This value represents the estimated population at the midpoint of the reference period. It is an average of the two estimated resident populations for the two calendar years (by adding both years and dividing by two). <sup>b</sup> Rates are standardised to the 2001 Australian population standard.

Source: State and Territory governments (unpublished); ABS (2008) *Population by Age and Sex, Australian States and Territories, June 2002–2007*, Cat. no. 3201.0; table 12A.9.

### *Early detection — rate of cancers detected without the need for open biopsies*

The ‘rate of cancers detected without the need for open biopsies’ is an indicator of governments’ objective to provide appropriate early detection services (box 12.5).

#### **Box 12.5 Rate of cancers detected without the need for open biopsies**

The ‘rate of cancers detected without the need for open biopsies’ is defined as the number of cancers detected without open biopsy, as a proportion of all breast cancers detected (invasive and DCIS).

A higher rate of cancers detected without the need for open biopsies is desirable.

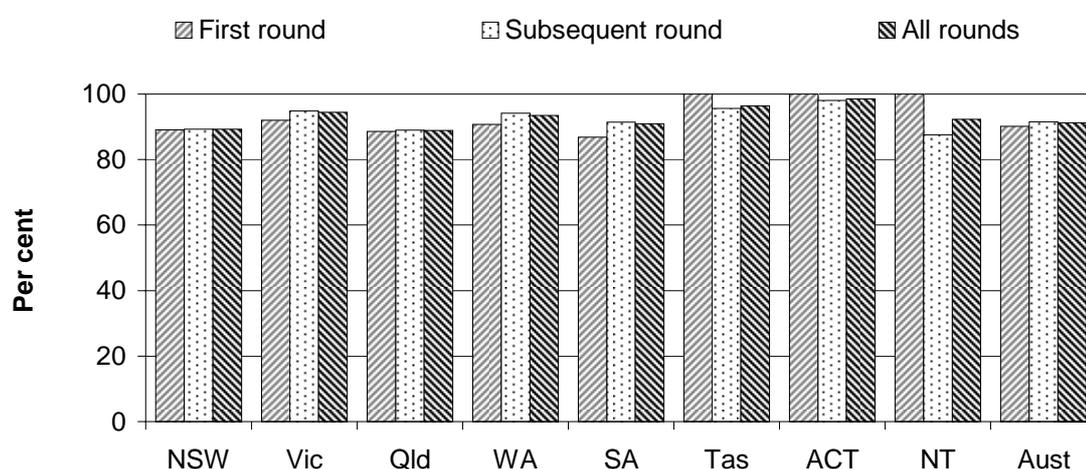
Data reported for this indicator are comparable.

Diagnosis of breast cancer involves histological examination of tissue samples collected by fine needle aspiration (FNA), core biopsy or open biopsy. Open biopsy is the most invasive of these procedures.

High rates of cancers detected without the need for open biopsies indicates effectiveness in detecting malignancies while minimising the need for invasive procedures. The BreastScreen Australia National Accreditation Standards (2004) state that 75 per cent or more of invasive cancers or DCIS should be diagnosed without the need for a diagnostic open biopsy (BreastScreen Australia 2004).

In 2007, for women attending their first screening round, the rate of cancers detected without the need for open biopsies was 90.2 per cent Australia wide. For women attending a subsequent round the rate was 91.5 per cent Australia wide, well above the National Accreditation Standard of 75 per cent (figure 12.9).

**Figure 12.9 Rate of cancers detected without the need for open biopsies, all women, 2007**



Source: State and Territory governments (unpublished); table 12A.13.

### *Early detection — cost per woman screened*

The ‘cost per woman screened’ is an indicator of governments’ objective to provide early detection services in an efficient manner (box 12.6).

### Box 12.6 Cost per woman screened

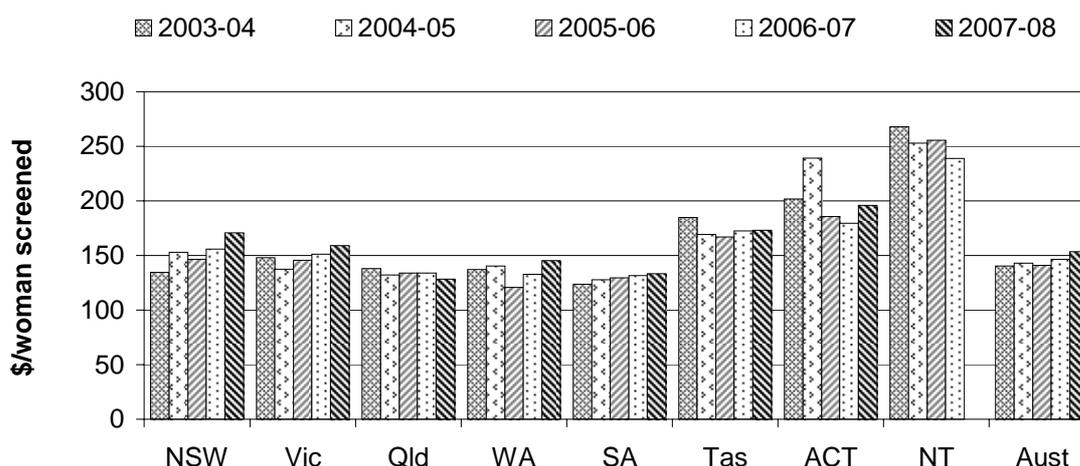
The 'cost per woman screened' is defined as the total cost of providing early detection services (including screening, assessment and program management), divided by the number of women screened.

Caution must be used when interpreting this indicator. While the cost per woman screened may reflect efficiency, it may also reflect the quality of service, and characteristics of the target population such as, the number and type of barriers to service access.

Data reported for this indicator are not directly comparable.

Care needs to be taken when making comparisons across jurisdictions. There are potential differences in the items included in the measures of cost (particularly in the treatment of depreciation and capital asset charges, and the inclusion of subsidies). There may also be differences across jurisdictions in the scope of activities being costed. The Review is working to identify these differences across jurisdictions to improve data comparability in future (table 12A.15). Preliminary estimates of costs in each jurisdiction are presented in figure 12.10. The average cost per woman screened in Australia in 2007-08 was around \$154.

Figure 12.10 Real cost per woman screened, BreastScreen Australia services (2007-08 dollars)<sup>a, b, c</sup>



<sup>a</sup> Constant price expenditure (in 2007-08 dollars) using the Gross Domestic Product price deflator (table AA.26). <sup>b</sup> Data for NSW do not include subsidies. <sup>c</sup> Data for the NT for 2007-08 are not available.

Source: State and Territory governments (unpublished); tables AA.26 and 12A.14.

---

*Intervention/treatment — travelling time to receive treatment*

‘Travelling time to receive treatment’ has been identified for development as an indicator of governments’ objective to provide breast cancer intervention and treatment services in an equitable manner (box 12.7).

**Box 12.7 Travelling time to receive treatment**

‘Travelling time to receive treatment’ is yet to be defined.

Data for this indicator were not available for the 2009 Report.

*Intervention/treatment — compliance with clinical guidelines for treatment*

‘Compliance with clinical guidelines for treatment’ has been identified as an indicator of governments’ objective to reduce morbidity and mortality attributable to breast cancer, and to improve the quality and duration of life of women with breast cancer, through provision of effective and appropriate intervention and treatment services (box 12.8).

**Box 12.8 Compliance with clinical guidelines for treatment**

‘Compliance with clinical guidelines for treatment’ is yet to be defined.

Data for this indicator were not available for the 2009 Report.

*Intervention/treatment — ratio of conserving surgery to mastectomy*

The ‘ratio of conserving surgery to mastectomy’ is an indicator of governments’ objective to improve the quality of life of women with breast cancer through appropriate intervention and treatment services (box 12.9).

---

**Box 12.9 Ratio of conserving surgery to mastectomy**

'Ratio of conserving surgery to mastectomy' is defined as the number of cases for which breast conserving surgery or no surgery was performed, divided by the number of cases for which a mastectomy was performed.

Breast conserving surgery removes the breast cancer but not the whole breast. Caution should be used in interpreting this indicator, as clinical and familial factors are important determinants of the most appropriate treatment. For cases identified through early detection services such as BreastScreen Australia, a higher ratio may indicate more appropriate intervention and treatment services.

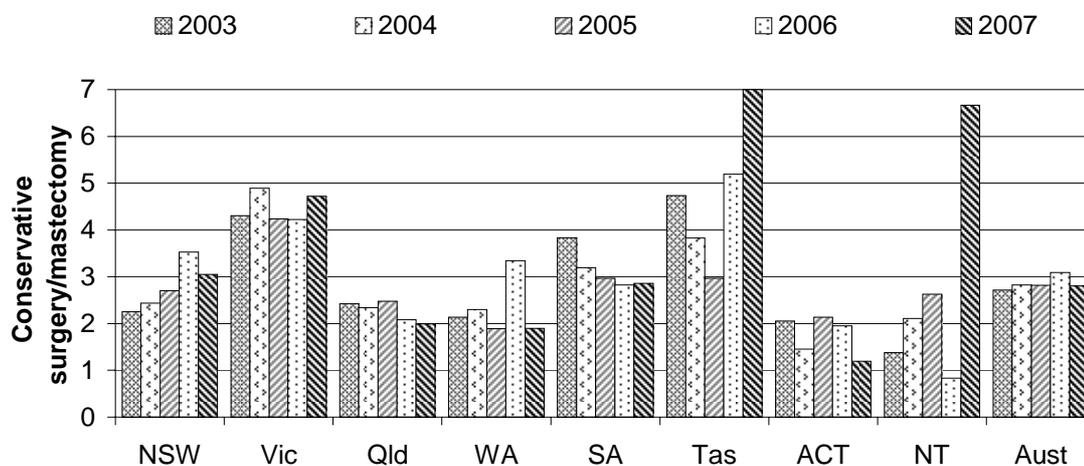
Data reported for this indicator are comparable.

Early detection of breast cancer is associated with reduced cancer size and greater probability of being confined to the breast, two of the clinical determinants for appropriate treatment (NBOCC 2004). Breast conserving surgery or radiation therapy alone may be indicated for a greater proportion of women with breast cancer identified through the BreastScreen Australia program, an early detection service, than for women with breast cancer diagnosed outside the program.

Data for this indicator are for women diagnosed only within the BreastScreen Australia program. They represent only a portion of breast cancer treatment information, and are not necessarily representative of general clinical practice.

In 2007, the ratio of conserving surgery to mastectomy averaged 2.8:1 nationally, but varied across jurisdictions (figure 12.11).

Figure 12.11 Ratio of conserving surgery to mastectomy<sup>a, b</sup>



<sup>a</sup> Applies for women of all ages. <sup>b</sup> The numbers used to measure this indicator were small, resulting in large variations from year to year. It is advisable to view this indicator over time rather than from one year to the next.

Source: State and Territory governments (unpublished); table 12A.16.

#### *Intervention/treatment — cost per separation by diagnosis related group*

‘Cost per separation by diagnosis related group’ is an indicator of governments’ objective to provide breast cancer intervention and treatment services in an efficient manner (box 12.10).

#### **Box 12.10 Cost per separation by diagnosis related group**

‘Cost per separation by diagnosis related group’ is a proxy indicator of efficiency, defined as the cost of care per separation in public hospitals for selected breast cancer related conditions.

Caution must be used when interpreting this indicator. While a low cost per separation may indicate efficiency, no information on the quality of service is provided.

Data reported for this indicator are not directly comparable.

‘Cost per separation by diagnosis related group’ data are sourced from the National Hospital Cost Data Collection (NHCDC) and are based on the AR-DRG classification version 5.1. The NHCDC is an annual collection of hospital cost and activity data. Participation in the NHCDC is voluntary, and participants are not necessarily a representative sample of the hospitals in each jurisdiction (although coverage is improving over time). An estimation process has been carried out to

create representative national activity figures from the sample data. Further, the purpose of the NHCDC is to calculate DRG cost weights, not to compare the efficiency of hospitals (DoHA 2008b).

Table 12.5 summarises costs per separation for selected breast cancer AR-DRGs. The average cost of major procedures for malignant breast conditions across Australia was \$6393 per separation in 2006-07; minor procedures for malignant breast conditions cost \$3295 per separation on average. Table 12A.17 summarises the average length of stay (in public hospitals) associated with each AR-DRG.

**Table 12.5 Average cost per separation, public hospitals by selected breast cancer AR-DRGs, 2006-07 (dollars)<sup>a, b, c</sup>**

AR-DRG	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Major procedures for malignant breast conditions	5 907	6 520	6 474	7 873	5 455	6 433	6 994	6 780	6 393
Minor procedures for malignant breast conditions	3 350	3 127	3 539	3 154	3 384	2 892	3 411	2 907	3 295
Malignant breast disorders (Age >69 W CC) or W (Cat or Sev CC)	4 628	3 757	5 446	6 032	6 064	5 228	5 125	2 299	4 709
Malignant breast disorders (Age>69 W/O CC) or W/O (Cat or Sev CC)	2 392	2 476	2 493	1 145	1 188	1 814	np	1 588	1 979

W=with. W/O=without. CC=complications and co-morbidities. Cat or Sev=catastrophic or severe. <sup>a</sup> Estimated population costs are obtained by weighting the sample results according to the known characteristics of the population. <sup>b</sup> Average cost is affected by a number of factors, including admission practices, sample size, remoteness and the types of hospital contributing to the collection. Direct comparison across jurisdictions is difficult because there are differences in hospital costing systems. <sup>c</sup> In accordance with NHCDC methodology, depreciation and some capital costs are included in these figures, except for Victoria, which does not include depreciation. **np** Not published due to low volume and privacy concerns.

Source: DoHA (2008) *National Hospital Cost Data Collection Cost Report Round 11, (2006-07)*, v5.1; table 12A.17.

## Outcomes

Outcomes are the impact of services on the status of an individual or group (while outputs are the actual services delivered) (see chapter 1, section 1.5).

### *Early detection — interval cancer rate*

‘Interval cancer rate’ is an outcome indicator of governments’ objective to reduce morbidity and mortality attributable to breast cancer, through provision of effective early detection services (box 12.11).

---

**Box 12.11 Interval cancer rate**

The 'interval cancer rate' is defined as the number of interval cancers per 10 000 women at risk of interval or screen-detected breast cancer, where:

- an interval cancer is an invasive breast cancer diagnosed in the interval between a negative screening result and the next scheduled screening examination
- women at risk of interval or screen-detected breast cancer are those aged 50–69 years, with no personal history of breast cancer, in the period between a negative screening result and the next scheduled screening examination.

A lower interval cancer rate is desirable because it suggests that early detection of breast cancer services are effective. Caution should be applied when comparing data as differences in the interval cancer rate may also reflect different policies regarding diagnostic and administrative procedures.

This indicator should be interpreted in conjunction with the breast cancer detection indicators.

Data reported for this indicator are not directly comparable.

An interval cancer is an invasive breast cancer diagnosed in the interval between a negative screening result and the next scheduled screening examination, a period of 24 months in the case of routine screening (less in the case that more frequent screening is recommended). The cancer may have been present (but not detected) at the most recent screening episode, or may not have been present. A high rate of interval cancer may suggest that screening services are not optimally effective in the early detection of breast cancer.

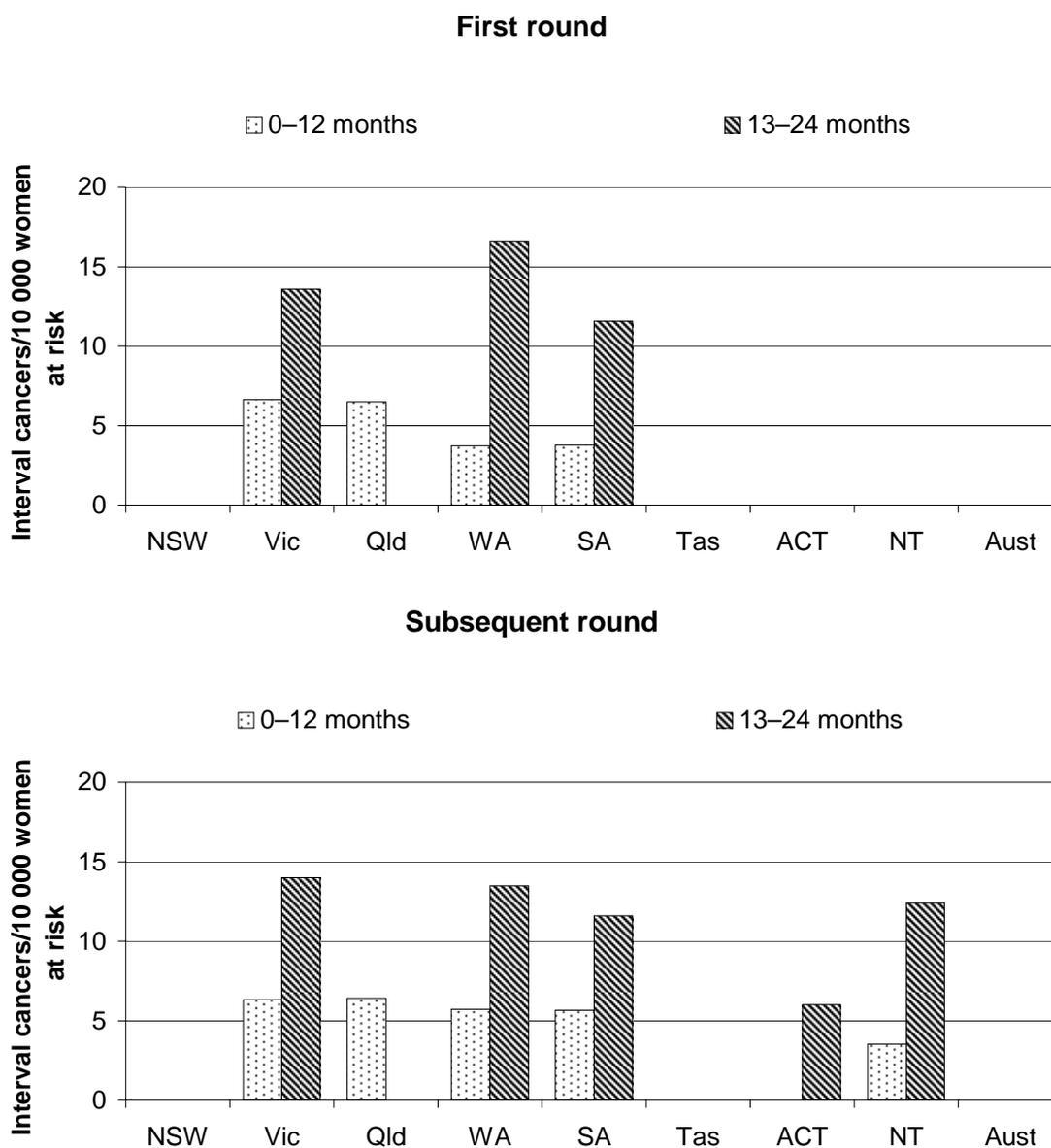
There is a time lag in data availability for this indicator. Interval cancer may be detected up to 24 months following a routine negative screening episode. It may then be several months before the diagnosis of invasive cancer is recorded in the cancer registry. BreastScreen Australia programs identify interval cancers diagnosed outside the program through a process of data matching between cancer registry and BreastScreen Australia data. Thus, for women screened in any given year, the number of interval cancers cannot be determined until several years later. The most recent data available for this Report are for women screened during 2004.

Policy variation between jurisdictions may be reflected in interval cancer rates, and comparisons across jurisdictions need to be made with care. For example, policies differ in relation to women whose mammograms appear normal but who report symptoms of breast abnormalities. Some jurisdictions conduct further diagnostic procedures, which may be reflected in a higher cancer detection rate and lower interval cancer rate. Where these women are instead advised to visit their GP for

referral to a diagnostic service (such as in SA and some services in NSW), cancers subsequently detected may be reflected in increased interval cancer rates.

Figure 12.12 presents the age standardised interval cancer rate by screening round and time since screened for women aged 50–69 years.

Figure 12.12 **Age standardised interval cancer rate, women aged 50–69 years, 2004<sup>a, b, c, d</sup>**



<sup>a</sup> Rates are expressed as the number of interval cancers per 10 000 women at risk, and age standardised to the Australian population of women attending a BreastScreen Australia service in 1998. <sup>b</sup> The numbers used to measure this indicator were small, resulting in large variations from year to year. It is advisable to view this indicator over time rather than from one year to the next. <sup>c</sup> Data were not available for NSW or Tasmania. Data for Queensland for 13–24 months for the first and subsequent screening rounds were not available. <sup>d</sup> No interval cancers were reported in the ACT and the NT in the first round for 0–12 and 13–24 months.

Source: State and Territory governments (unpublished); table 12A.18.

---

*Early detection — breast cancer detection rate*

The 'breast cancer detection rate' is an indicator of governments' objective to reduce morbidity and mortality attributable to breast cancer, through the provision of effective early detection services (box 12.12).

**Box 12.12 Breast cancer detection rate**

The 'breast cancer detection rate' is defined as the number of detected cancers per 10 000 women screened.

A higher rate of breast cancer detection is desirable in terms of the effectiveness of breast screening services (although a high incidence of breast cancer is not desirable). The breast cancer detection rate should be considered in conjunction with detection rates for invasive cancer, small invasive cancer, DCIS and interval cancer.

Data reported for this indicator are directly comparable.

Early detection of cancers that are small and localised to the breast is associated with better outcomes for women with breast cancer, in terms of morbidity and mortality (NBOCC 2004). Changes in breast cancer detection rates may also reflect changes in the incidence of breast cancer.

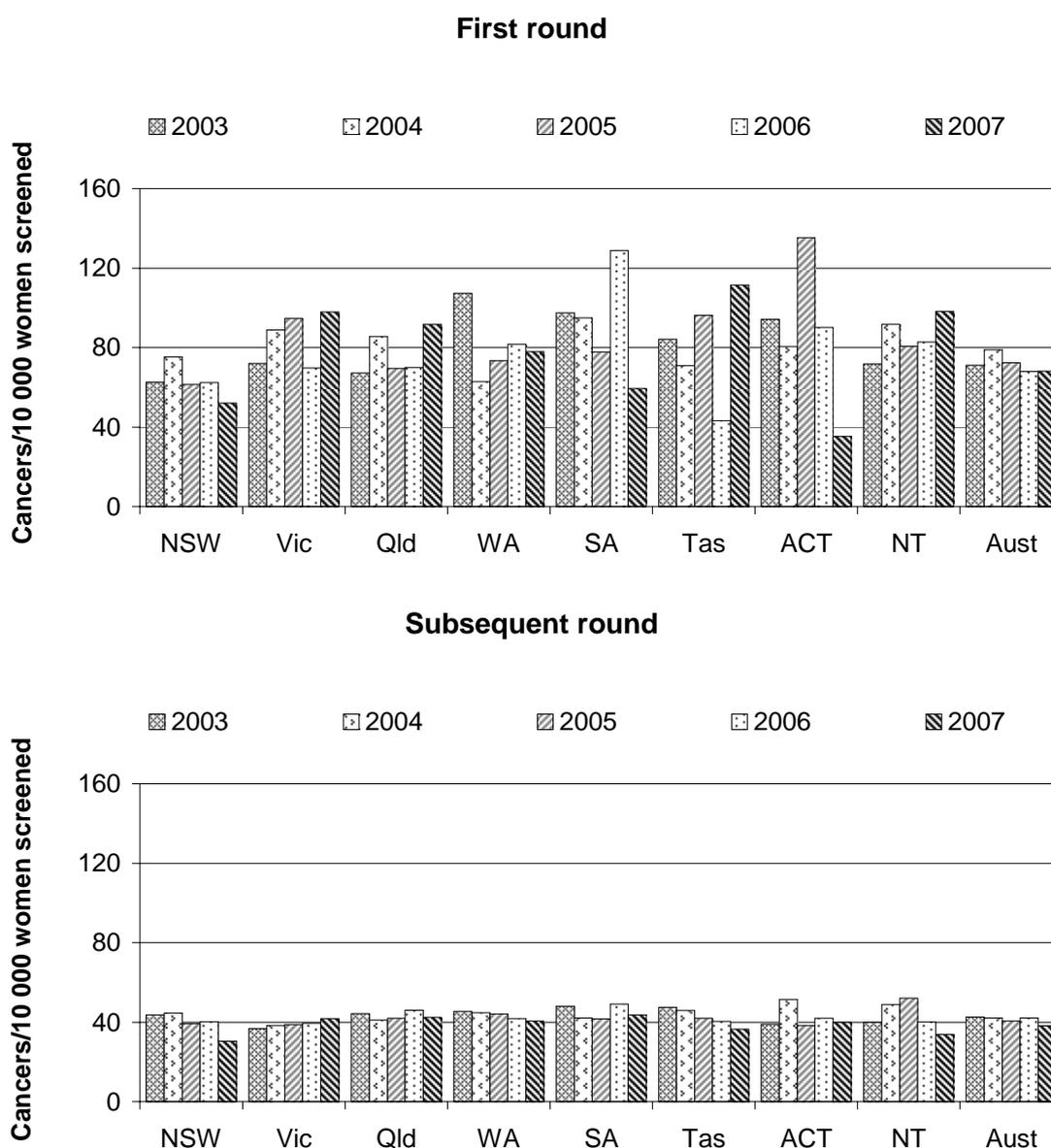
BreastScreen Australia National Accreditation Standards for detection rates are based on expected Australian rates (BreastScreen Australia 2004):

- greater than or equal to 50 per 10 000 women aged 50–69 years who attend for their first screen are diagnosed with invasive breast cancer
- greater than or equal to 35 per 10 000 women aged 50–69 years who attend for their second or subsequent screen are diagnosed with invasive breast cancer
- greater than or equal to 12 per 10 000 women aged 50–69 years who attend for their first screen are diagnosed with DCIS
- greater than or equal to seven per 10 000 women aged 50–69 years who attend for their second or subsequent screen are diagnosed with DCIS.

Figure 12.13 reports the age standardised number of invasive cancers detected per 10 000 women screened aged 50–69 years, by screening round. Nationally, in 2007, the age standardised invasive breast cancer detection rate was 68.2 per 10 000 women aged 50–69 years attending their first screen. This was above the BreastScreen Australia National Accreditation Standard of greater than or equal to 50 per 10 000 women aged 50–69 years who attend for their first screen being diagnosed with invasive breast cancer. Nationally, the age standardised invasive breast cancer detection rate was 38.2 per 10 000 women aged 50–69 years attending

the second or subsequent screen. This was above the National Accreditation Standard of greater than or equal to 35 per 10 000 women aged 50–69 years who attend for their second or subsequent screen being diagnosed with invasive breast cancer. The rate of DCIS detected per 10 000 women screened is reported in table 12A.19. (Relevant definitions can be found in box 12.1 and section 12.7.)

**Figure 12.13 Age standardised breast cancer detection rate for women aged 50–69 years, invasive cancers<sup>a</sup>**



<sup>a</sup> Rates are per 10 000 women screened, and age standardised to the Australian population of women attending a BreastScreen Australia service in 1998.

Source: State and Territory governments (unpublished); table 12A.19.

---

*Early detection — small invasive cancer detection rate*

The 'small invasive cancer detection rate' is an indicator of governments' objective to reduce morbidity and mortality attributable to breast cancer through the provision of effective early detection services (box 12.13).

**Box 12.13 Small invasive cancer detection rate**

The 'small invasive cancer detection rate' is defined as the number of invasive cancers detected with a diameter of 15 millimetres or less, per 10 000 women screened.

It is desirable that a high proportion of cancers detected are small cancers. The small invasive cancer detection rate should be considered in conjunction with detection rates for invasive cancer, DCIS and interval cancer.

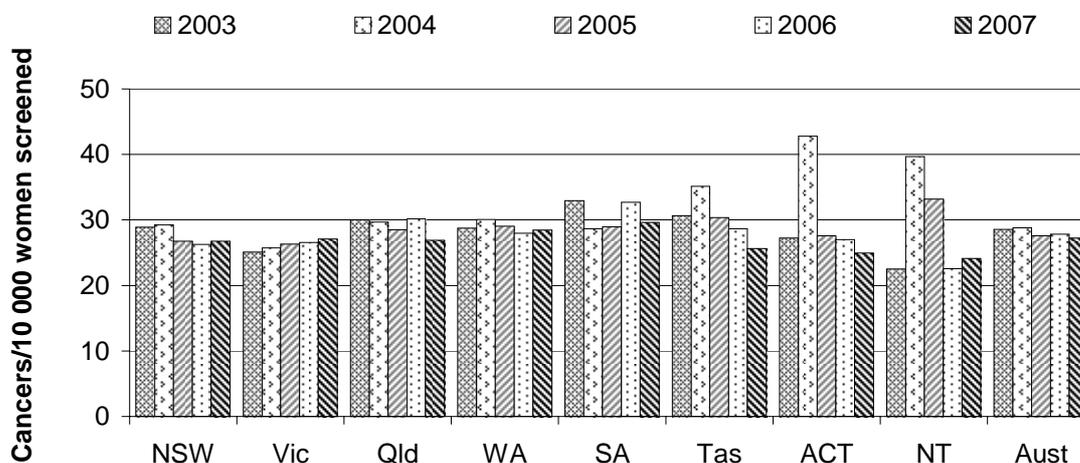
Data reported for this indicator are comparable.

Early detection of cancers that are small and localised to the breast is associated with reduced morbidity and mortality, as well as some cost savings to the health care system and women (AIHW, BreastScreen Australia and the NCSP 1998).

The BreastScreen Australia National Accreditation Standards (2004) specify that 25 or more women per 10 000 women aged 50–69 years who attend screening are expected to be diagnosed with a small (15 millimetres or less) invasive breast cancer (BreastScreen Australia 2004).

Age standardised rates for small invasive cancer detection for women aged 50–69 years screened by BreastScreen Australia in 2007 are reported in figure 12.14. The rate for Australia was 27.2 cancers per 10 000 women aged 50–69 years attending screening in 2007, consistent with the National Accreditation Standard of 25 or more.

Figure 12.14 **Age standardised small diameter cancer detection rate for women aged 50–69 years, all rounds of screening<sup>a, b</sup>**



<sup>a</sup> Small diameter cancers are defined as invasive cancers up to and including 15 millimetre diameter. Prior to the 2003 Report, small diameter cancers were defined as 10 millimetre in diameter or less, so data are not comparable to data published before the 2003 Report. <sup>b</sup> Rates are per 10 000 women screened, and age standardised to the Australian population of women attending a BreastScreen Australia service in 1998.

Source: State and Territory governments (unpublished); table 12A.20.

### Early detection — size of detected cancers

The ‘size of detected cancers’ is an indicator of governments’ objective to provide effective services for the early detection of breast cancer (box 12.14).

#### Box 12.14 Size of detected cancers

The ‘size of detected cancers’ is defined as the number of detected invasive cancers by cancer size, as a proportion of total detected invasive cancers for women aged over 40 years.

High rates of detection of small cancers, relative to rates of detection of large cancers, are desirable.

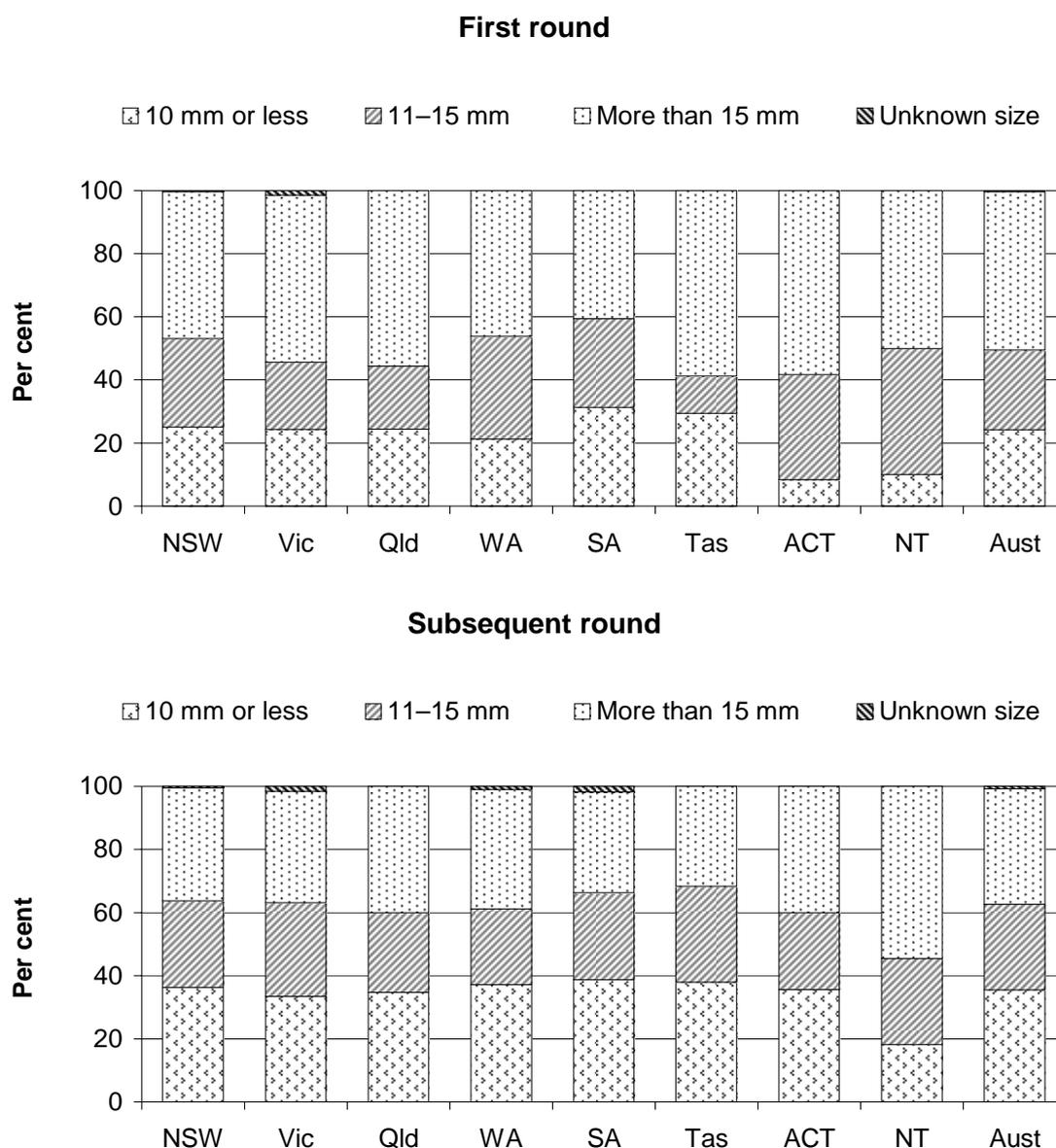
Data reported for this indicator are comparable.

Detection of small cancers (those with a diameter of 15 millimetres or less) is generally associated with increased survival rates and reduced morbidity and mortality, as well as some cost savings to the health care system and women (AIHW, BreastScreen Australia and the NCSP 1998).

Data are reported by round because larger cancers are expected to be found in the first round of screening. In subsequent rounds, cancers should be smaller if the program is achieving its objective (that is, early detection of small cancers through regular two yearly screening).

Figure 12.15 presents the proportion of cancers by size by screening round for 2007. The data are from BreastScreen Australia and cover only its clients.

**Figure 12.15 Detected invasive cancers, women aged over 40 years, by screening round and size of cancer 2007<sup>a, b</sup>**



<sup>a</sup> Non-breast malignancies were not counted. <sup>b</sup> For small jurisdictions, fluctuations due to small numbers can make comparisons unreliable.

Source: State and Territory governments (unpublished); table 12A.21.

---

### Overall performance — mortality rate for breast cancer

The ‘mortality rate for breast cancer’ is an indicator of governments’ objective to reduce mortality attributable to breast cancer, through the provision of effective early detection, and treatment, services (box 12.15).

#### Box 12.15 Mortality rate for breast cancer

The ‘mortality rate for breast cancer’ is defined as the age standardised mortality from breast cancer per 100 000 women, expressed as a five year rolling average.

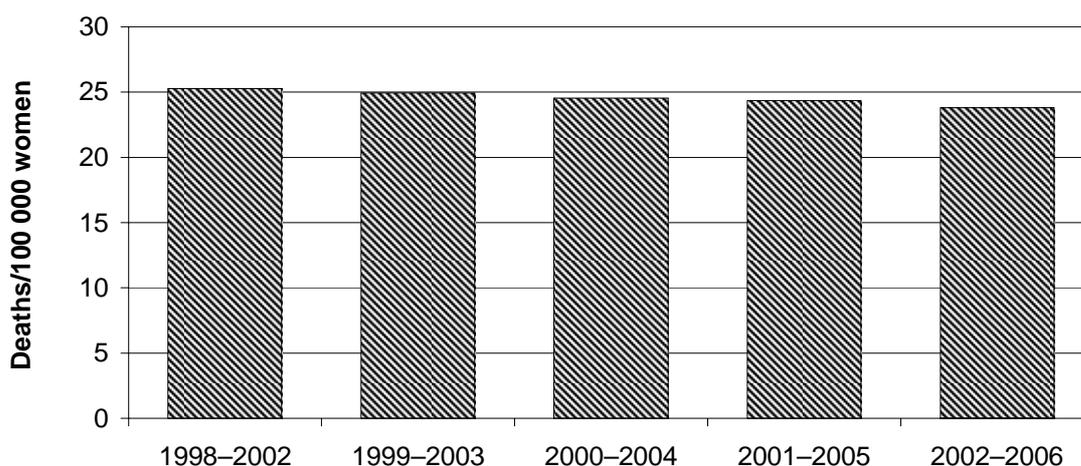
A lower mortality rate for breast cancer is desirable.

Data reported for this indicator are comparable.

Breast cancer mortality data are averaged over five year periods to smooth volatility in year-on-year movements, particularly for smaller jurisdictions that tend to have fewer cases and relatively large variation in rates from year to year. Caution should nevertheless be used when comparing results for smaller jurisdictions (table 12A.1).

The average annual age standardised mortality rate for breast cancer declined from 25.3 per 100 000 women in the period 1998–2002 to 23.8 per 100 000 women in the period 2002–2006 (figure 12.16).

Figure 12.16 Annual average age standardised mortality rate from breast cancer, all ages<sup>a</sup>

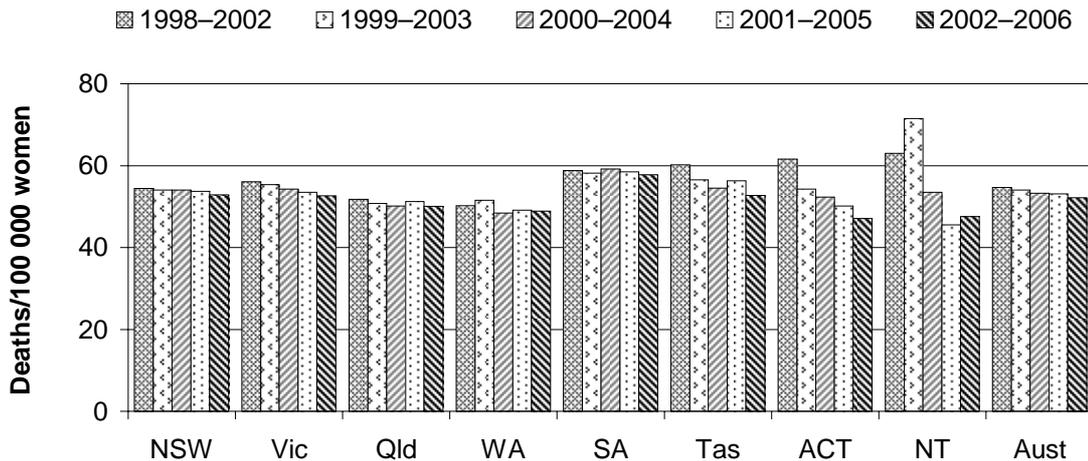


<sup>a</sup> Age standardised to the Australian population at 30 June 2001.

Source: AIHW (unpublished), derived from the AIHW National Mortality Database; table 12A.1.

The annual average age standardised mortality rate from breast cancer for women aged 50–69 years also declined, from 54.6 per 100 000 women over the period 1998–2002 to 52.1 per 100 000 women over the period 2002–2006 (figure 12.17).

Figure 12.17 **Annual average age standardised mortality rate from breast cancer, women aged 50–69 years<sup>a</sup>**



<sup>a</sup> Age standardised to the Australian population at 30 June 2001.

Source: AIHW (unpublished), derived from the AIHW National Mortality Database; table 12A.1.

### Overall performance — cost per life year saved

‘Cost per life year saved’ has been identified for development as an indicator of the efficiency of overall performance of services in detection and management of breast cancer (box 12.16).

#### Box 12.16 **Cost per life year saved**

‘Cost per life year saved’ is yet to be defined.

Data for this indicator were not available for the 2009 Report.

---

## 12.4 Mental health

### Profile

Mental health relates to an individual's ability to negotiate the daily challenges and social interactions of life without experiencing undue emotional or behavioural incapacity (DHAC and AIHW 1999). The World Health Organization (WHO) describes mental health as:

... a state of well-being in which the individual realizes his or her own abilities, can cope with the normal stresses of life, can work productively and fruitfully, and is able to make a contribution to his or her community (WHO 2001).

There is a wide range of mental illnesses that can affect an individual's mental health, functioning and quality of life. Each mental illness is unique in terms of its incidence across the lifespan, causal factors and treatments.

This section focuses on specialised publicly funded mental health services that treat mostly low prevalence but severe mental illnesses. Other health and related services are also important for people with a mental illness, including GPs and alcohol and drug treatment services (chapter 11), public hospitals (chapter 10), and aged care services (chapter 13). This Report does not include specific performance information on these services' treatment of people with a mental illness. Mental health patients often have complex needs that may also affect other government services they receive, such as those covered in chapter 4 ('School education'), chapter 8 ('Corrective services'), chapter 9 ('Emergency management') and chapter 14 ('Services for people with a disability').

Some common terms used in mental health management are outlined in box 12.17.

The quality of data relating to specialised publicly funded mental health services continues to improve. In previous years, data were preliminary and subject to ongoing validation. From 2005-06, these data are collected under the Mental Health Establishments National Minimum Data Set (MHE NMDS). Data collected under the MHE NMDS are further advanced in the validation process at time of publication but are subject to ongoing historical validation. Results reported in this section may therefore differ slightly to those in the upcoming Mental Health Services in Australia publication and the next National Mental Health Report.

---

### Box 12.17 **Some common terms relating to mental health**

**acute services:** mental health services that primarily provide specialised psychiatric care for people with acute episodes of mental illness. Acute episodes are characterised by the recent onset of severe clinical symptoms of mental illness, that have potential for prolonged dysfunction or risk to self and/or others. The key characteristic of acute services is that treatment effort is focused on the short term. Acute services may focus on assisting people who have had no prior contact or previous psychiatric history, or individuals with a continuing mental illness for whom there has been an acute exacerbation of symptoms.

**ambulatory care services:** mental health services dedicated to the assessment, treatment, rehabilitation and/or care of non-admitted patients, including but not confined to crisis assessment and treatment services, mobile assessment and treatment services, outpatient clinic services (whether provided from a hospital or community mental health centre), child and adolescent outpatient treatment teams, social and living skills programs (including day programs, day hospitals and living skills centres), and psychogeriatric assessment teams and day programs.

**community residential services:** mental health services that employ mental health-trained staff on-site; provide rehabilitation, treatment or extended care to residents in a domestic-like environment and that is intended to be on an overnight basis; and encourage the resident to take responsibility for their daily living activities. These services include those that employ mental health trained staff on-site 24 hours per day and other services with less intensive staffing. However, all these services employ on-site mental health trained staff for some part of each day.

**early intervention:** actions that are appropriate for and specifically target people displaying the early signs and symptoms of a mental health problem or mental illness and people developing or experiencing a first episode of mental illness.

**inpatient services:** mental health services that provide admitted patient care. These are stand-alone psychiatric hospitals or specialised psychiatric units located within general (non-psychiatric) hospitals.

**mental illness:** a diagnosable illness that significantly interferes with an individual's cognitive, emotional and/or social abilities. For the purposes of this chapter, it includes psychiatric disability.

**mental health:** the capacity of individuals within groups and the environment to interact with one another in ways that promote subjective wellbeing, the optimal development and use of mental abilities (cognitive, affective and relational) and the achievement of individual and collective goals consistent with justice.

**mental health problem:** diminished cognitive, emotional and/or social abilities, but not to the extent that the criteria for a mental illness are met.

(Continued on next page)

---

Box 12.17 (Continued)

**mental health promotion:** any action taken to maximise mental health and wellbeing among populations and individuals. It is aimed at changing environments (social, physical, economic, educational, cultural) and enhancing the 'coping' capacity of communities, families and individuals by giving power, knowledge, skills and the necessary resources.

**mental illness prevention:** interventions that occur before the initial onset of an illness to prevent its development. The goal of prevention interventions is to reduce the incidence and prevalence of mental health problems and illnesses.

**non-acute services:** rehabilitation services that have a primary focus on intervention to reduce functional impairments that limit the independence of patients. Rehabilitation services focus on disability and the promotion of personal recovery. They are also characterised by an expectation of substantial improvement over the short to medium term. Patients treated by rehabilitation services usually have a relatively stable pattern of clinical symptoms. Non-acute services also consist of extended care services that provide care over an indefinite period for patients who have a stable but severe level of functional impairment and inability to function independently without extensive care and support. Patients of extended care services usually show a relatively stable pattern of clinical symptoms, which may include high levels of severe unremitting symptoms of mental illness. Treatment effort focuses on preventing deterioration and reducing impairment. Improvement is expected only over a long period.

**non-government organisations:** private not-for-profit community managed organisations that receive State and Territory government funding specifically to provide community support services for people affected by a mental illness. Programs provided by non-government organisations may include supported accommodation services (including community-based crisis and respite beds), vocational rehabilitation programs, advocacy programs (including system advocacy), consumer self-help services, and support services for families and primary carers.

**prevalence:** the number of cases of a disease present in a population at a given time (point prevalence) or during a given period (period prevalence).

**specialised care service:** services whose primary function is to provide treatment, rehabilitation or community support targeted to people affected by a mental illness. This criterion is applicable regardless of the source of funds. Such activities are delivered from a service or facility that is readily identifiable as both specialised and serving a mental health function.

Source: AIHW (2006); DoHA (2005).

### *Prevalence of mental illness*

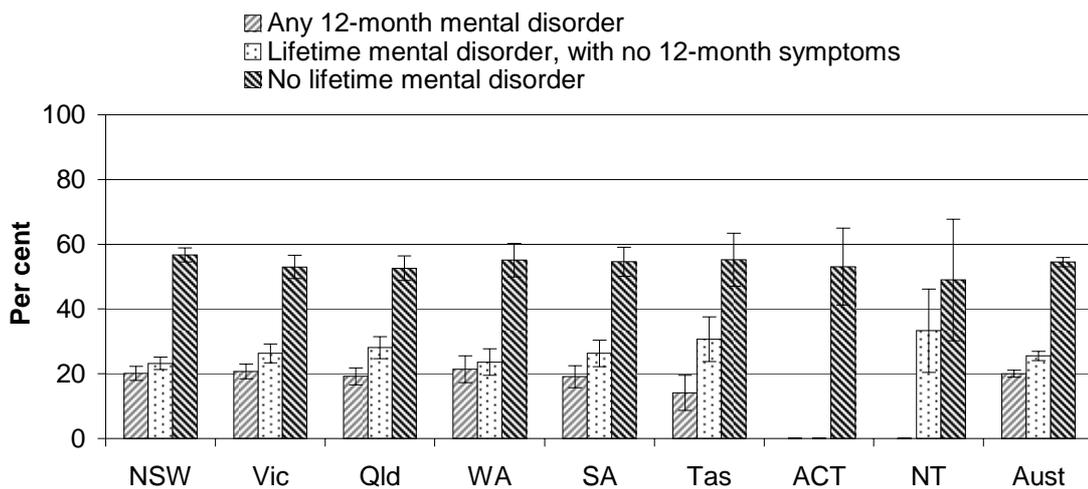
Prevalence of mental illness data are derived using the National Survey of Mental Health and Wellbeing (SMHWB). The term mental disorder is used when referring

directly to SMHWB data (as it is used in that survey). Elsewhere, the term mental illness is used to describe the illness associated with mental disorders.

The SMHWB data are reported with 95 per cent confidence intervals. These intervals assist with making comparisons between jurisdictions, and between different mental disorder status groups. Confidence intervals are a standard way of expressing the degree of uncertainty associated with survey estimates. An estimate of 80 with a confidence interval of  $\pm 2$ , for example, means that if another sample had been drawn, or if another combination of test items had been used, there is a 95 per cent chance that the result would lie between 78 and 82. Where ranges do not overlap, there is a high likelihood that there is a statistically significant difference. A statistically significant difference means there is a high probability that there is an actual difference — it does not imply that the difference is necessarily large or important.

According to the 2007 SMHWB,  $20.0 \pm 1.1$  per cent of adults aged 16–85 years (or approximately 3.2 million adults) met the criteria for diagnosis of a lifetime mental disorder and had symptoms in the 12 months before the survey. A further  $25.5 \pm 1.4$  per cent of adults aged 16–85 years had experienced a mental disorder at some point in their life, but did not have symptoms in the previous 12 months. These proportions were generally not statistically significantly different across jurisdictions (figure 12.18).

Figure 12.18 **Prevalence of mental disorders, 2007<sup>a, b</sup>**



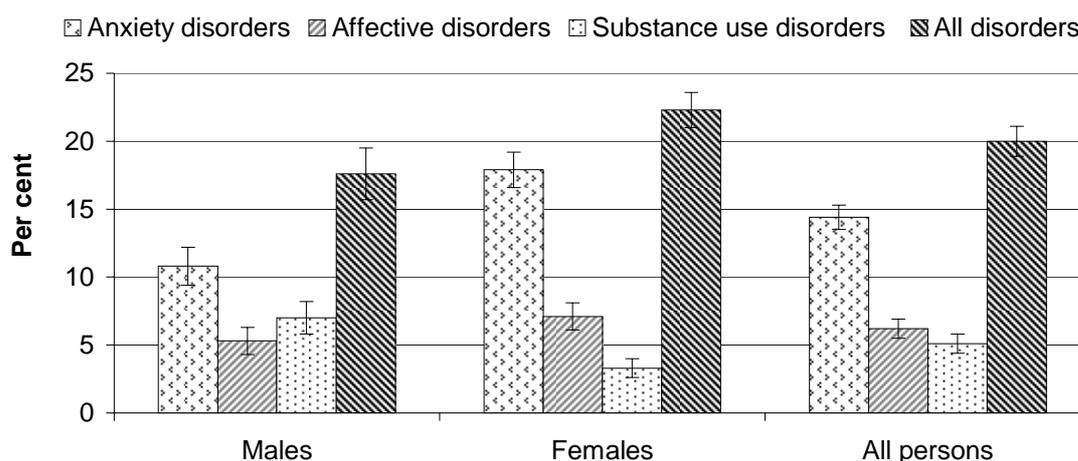
<sup>a</sup> Error bars represent the 95 per cent confidence interval associated with each point estimate. <sup>b</sup> Estimates with relative standard errors (RSEs) greater than 25 per cent are not reported.

Source: ABS (unpublished), derived from the 2007 SMHWB, Cat. no. 4326.0; table 12A.22.

Overall, anxiety disorders (such as agoraphobia, post-traumatic stress disorder and social phobia) were the most common type of mental disorder reported with symptoms in the previous 12 months ( $14.4 \pm 0.9$  per cent of people). Persons with affective disorders (such as depression, mania and bipolar disorder) accounted for  $6.2 \pm 0.7$  per cent and persons reporting substance use disorders accounted for a further  $5.1 \pm 0.7$  per cent (figure 12.19).

There were differences in the prevalence of mental disorders between males and females (figure 12.19). Females most commonly experienced anxiety disorders ( $17.9 \pm 1.3$  per cent of all females), followed by affective disorders ( $7.1 \pm 1.0$  per cent) and substance abuse ( $3.3 \pm 0.7$  per cent). Males most commonly suffered anxiety disorders ( $10.8 \pm 1.4$  per cent of males), followed by substance use disorders ( $7.0 \pm 1.2$  per cent) and affective disorders ( $5.3 \pm 1.0$  per cent).

Figure 12.19 Prevalence of mental disorders, by gender, 2007<sup>a, b, c</sup>



<sup>a</sup> Error bars represent the 95 per cent confidence interval associated with each point estimate. <sup>b</sup> A person may have more than one mental disorder. Therefore the components may not add to the total of all disorders. <sup>c</sup> Persons who had a mental disorder with symptoms in the 12 months prior to the survey.

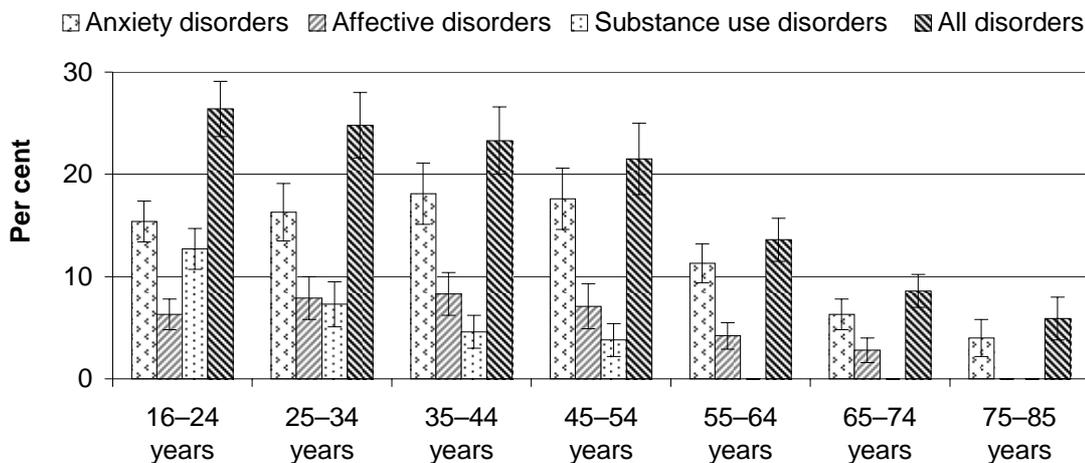
Source: ABS (unpublished), derived from the 2007 SMHWB, Cat. no. 4326.0; table 12A.23.

The prevalence of mental illness was higher for younger people than older people (figure 12.20). Of adults aged 16–24 years,  $26.4 \pm 2.7$  per cent experienced symptoms of a mental disorder in the 12 months before the survey compared with  $8.6 \pm 1.6$  per cent of people aged 65–74 years and  $5.9 \pm 2.1$  per cent of people aged 75–85 years. The prevalence of anxiety disorders was highest for adults aged 35–44 years ( $18.1 \pm 3.0$  per cent), as was the prevalence of affective disorders ( $8.3 \pm 2.1$  per cent) (although the differences were not statistically significant to those of other age groups below 55–64 years). The prevalence of substance use

disorders was significantly higher in adults aged 16–24 years ( $12.7 \pm 2.0$  per cent) than other age groups.

The prevalence of mental illness did not vary with geographic location (table 12A.25). Of adults aged 16–85 years residing outside capital cities,  $19.1 \pm 1.9$  per cent had a lifetime mental disorder and had experienced symptoms in the 12 months before the survey, compared with  $20.5 \pm 1.4$  per cent of adults living in capital cities. A similar pattern was recorded for individual disorders.

Figure 12.20 **Prevalence of mental disorders, by age, 2007<sup>a, b, c, d</sup>**



<sup>a</sup> Error bars represent the 95 per cent confidence interval associated with each point estimate. <sup>b</sup> A person may have more than one mental disorder. Therefore the components may not add to the total. of all disorders. <sup>c</sup> Persons who had a mental disorder with symptoms in the 12 months prior to the survey. <sup>d</sup> Estimates with RSEs over 25 per cent are not published.

Source: ABS (unpublished), derived from the 2007 SMHWB, Cat. no. 4326.0; table 12A.24.

### Impact of mental illness

Mental illnesses contribute significantly to the total burden of disease and injury in Australia (13.3 per cent of the total burden in 2003) (AIHW: Begg et al. 2007). The total burden comprises the amount of ‘years’ lost due to fatal events (years of life lost due to premature death) and non-fatal events (years of ‘healthy’ life lost due to disability). Mental illness is also the leading cause of ‘healthy’ life years lost due to disability (24 per cent of the total non-fatal burden in 2003) (AIHW: Begg et al. 2007).

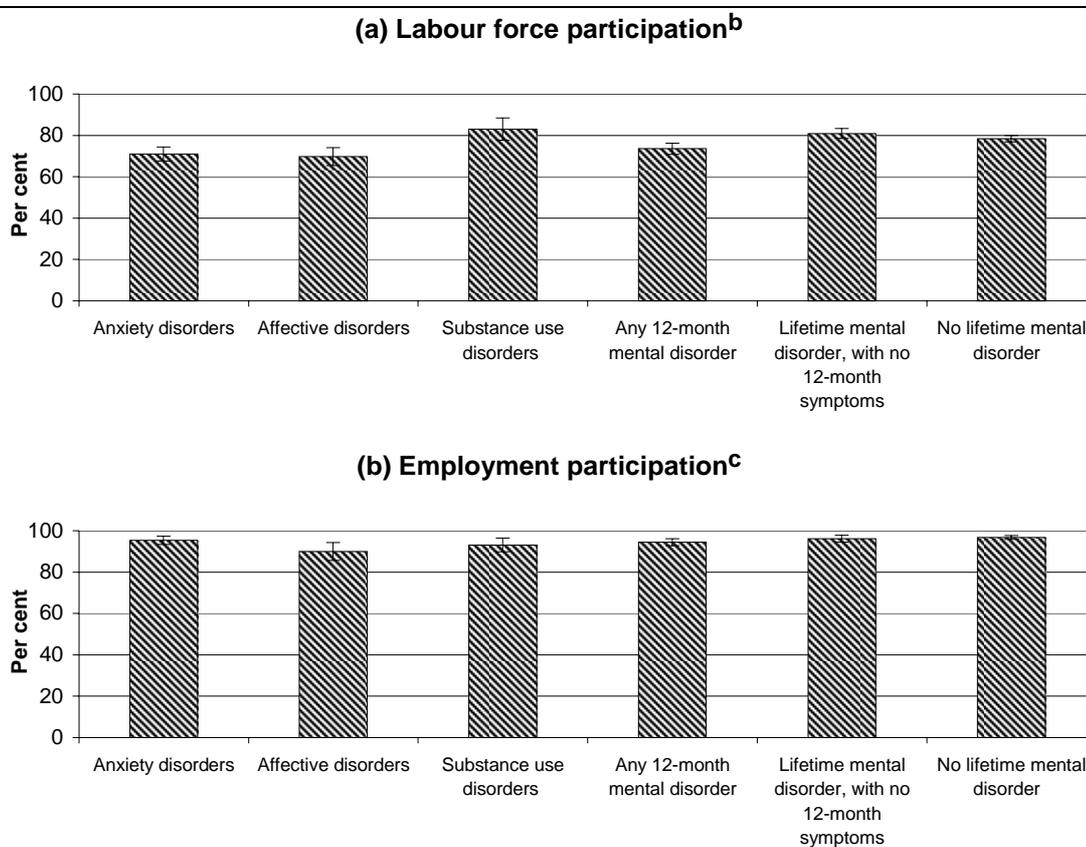
Mental illness can affect an individual’s functioning and quality of life. For example, it can act as a barrier to gaining and maintaining employment (AHMC 2008). Nationally, in 2007, the labour force participation rate for people

---

with a lifetime mental disorder who had symptoms in the previous 12 months was  $73.6 \pm 2.7$  per cent, below the rate of those who did not have a mental disorder ( $78.4 \pm 1.6$  per cent). The labour force participation rate of people who had a mental disorder at some point in their life, but who did not have symptoms in the previous 12 months was not significantly different to the rate for people who did not have a mental disorder (figure 12.21a). Of those in the labour force,  $94.5 \pm 1.7$  per cent of people with a mental disorder who had symptoms in the previous 12 months were employed, not significantly different to the rate of those without a mental disorder ( $96.8 \pm 0.9$  per cent). People who had a mental disorder at some point in their life, but who did not have symptoms in the previous 12 months also had employment rates that were similar to the rate of those without a mental disorder (figure 12.21b).

The labour force participation rates of those who had symptoms of a mental disorder in the previous 12 months varied across disorder type. The rates were higher for those with substance abuse disorders than for those with anxiety or affective disorders (figure 12.21a). Employment rates did not vary significantly across mental disorder type (figure 12.21b).

Figure 12.21 **Labour force and employment participation of people aged 16–64 years, by mental disorder status, 2007<sup>a</sup>**

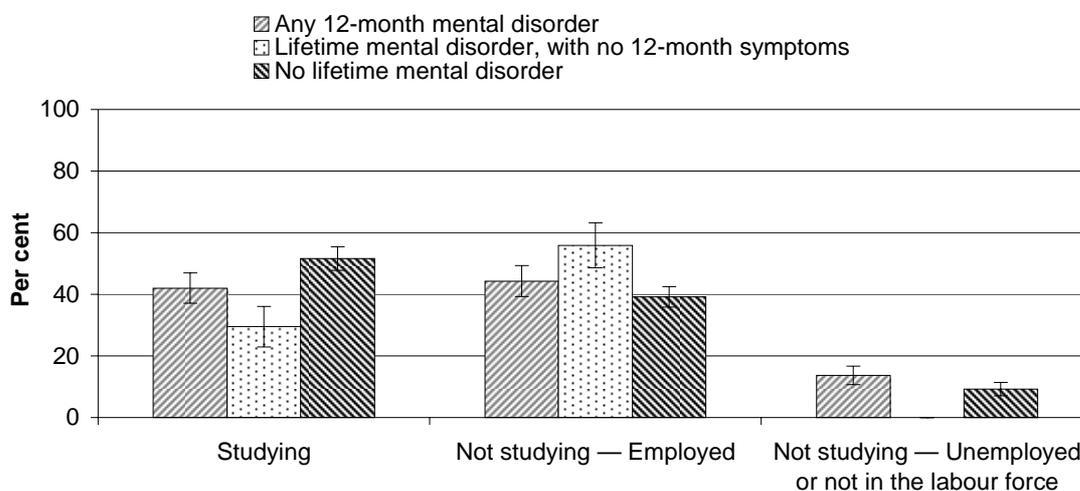


<sup>a</sup> Error bars represent the 95 per cent confidence interval associated with each point estimate. <sup>b</sup> The labour force participation rate is the proportion of the total population who are employed or unemployed. <sup>c</sup> The employment participation rate is the proportion of the labour force who are employed.

Source: ABS (unpublished), derived from the 2007 SMHWB, Cat. no. 4326.0; table 12A.26.

Mental illness in early adult years can lead to disrupted education and premature exit from school or tertiary training, or disruptions in the transition from school to work (AHMC 2008). The impact of these disruptions can be long term, restricting the person's capacity to participate in a range of social and vocational roles over their lifetime (AHMC 2008). Nationally, in 2007, the proportion of people aged 16–30 years who had a mental disorder with symptoms in the previous 12 months who were participating in study was  $42.0 \pm 4.9$  per cent, lower than the rate for those without a mental disorder ( $51.6 \pm 3.8$  per cent) (figure 12.22). Of people who were not studying, people with a mental disorder who had symptoms in the previous 12 months were more likely to be unemployed or not in the labour force than those without a mental disorder (although the difference was not statistically significant). Further information on the participation of people aged 16–30 years in the labour force and study is in tables 12A.27 and 12A.28.

**Figure 12.22 Participation in study or the labour force of people aged 16–30 years, by mental disorder status, 2007<sup>a, b, c</sup>**



<sup>a</sup> Includes persons studying full-time and part-time, persons still at school, and persons employed full-time and part-time. <sup>b</sup> Error bars represent the 95 per cent confidence interval associated with each point estimate. <sup>c</sup> Estimates with RSEs greater than 25 per cent are not published.

Source: ABS (unpublished), derived from 2007 SMHWB, Cat. no. 4326.0; table 12A.27.

The 2007 SMHWB also shows that people with a mental disorder who had symptoms in the previous 12 months are overrepresented in the homeless and incarcerated populations. While they were an estimated 20.0 per cent of the total population, they represented 53.6 per cent of the population who had ever been homeless and 41.4 per cent of the population who had ever been incarcerated (ABS 2008b). In addition, people with a mental disorder who had symptoms in the previous 12 months were more likely to have attempted suicide over the 12 months before the Survey ( $1.9 \pm 0.8$  per cent) than all people ( $0.4 \pm 0.2$  per cent) (ABS unpublished).

### *Roles and responsibilities*

State and Territory governments are responsible for the funding, delivery and management of specialised public mental health services including admitted patient care in hospitals; ambulatory care services and community residential care (for further detail see box 12.17). As noted above, performance information in this section focuses on these mental health services.

Under the Australian Health Care Agreements, the Australian Government provides base grants and funding to states and territories to undertake reforms in the directions advocated by the NMHS, for mental health services (DoHA 2007). The Australian Government also funds health related services for people with mental

---

illnesses through the following mechanisms: the Medicare Benefits Schedule (MBS), which funds services provided by GPs (both general and specific mental health items), private psychiatrists and allied mental health professionals (clinical psychologists, psychologists, social workers and occupational therapists); the Pharmaceutical Benefits Scheme (PBS), which funds mental health related medications, the Medicare Safety Net, the Department of Veteran's Affairs (DVA) and the Private Hospital Insurance Premium Rebates. Other specific programs designed to increase the level of social support and community-based care for people with a mental illness and to prevent suicide are also funded by the Australian Government.

The Australian, State and Territory governments also fund/provide other services that people with mental illnesses can access, such as emergency relief, employment, accommodation, income support, rehabilitation, residential aged care and other services for older people and people with a disability (see chapters 13 and 14, respectively).

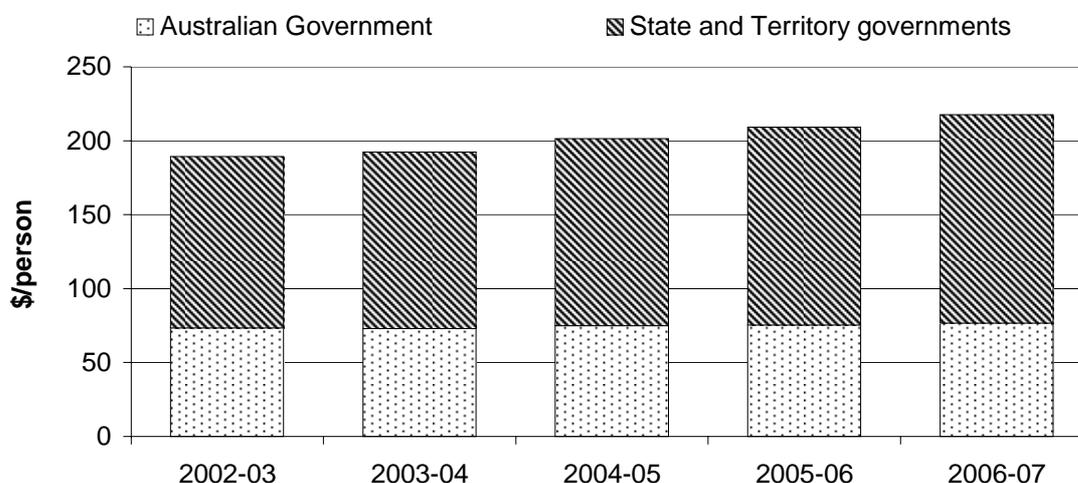
### *Funding*

Real government recurrent expenditure of around \$4.5 billion<sup>3</sup> was allocated to mental health services in 2006-07 (tables 12A.31 and 12A.32). State and Territory governments made the largest contribution (\$2.9 billion, or 64.8 per cent), although this included some Australian Government funds under the Australian Health Care Agreements (table 12A.32). The Australian Government spent \$1.6 billion. Real Australian Government expenditure per person rose from \$73 in 2002-03 to \$77 in 2006-07. National average State and Territory expenditure per person in 2006-07 was \$141, up from \$116 in 2002-03 (figure 12.23).

---

<sup>3</sup> This includes expenditure sourced from patient fees and reimbursement by third party compensation insurers and 'other Australian Government funds'.

Figure 12.23 Real government recurrent expenditure on mental health services per person (2006-07 dollars)<sup>a, b</sup>



<sup>a</sup> Constant price expenditure for all years (2006-07 dollars), using the implicit price deflator for non-farm gross domestic product (table 12A.70) for Australian Government expenditure, and the State and Territory implicit price deflators for general government final consumption expenditure on hospital clinical services for State and Territory expenditure (table 12A.69). <sup>b</sup> All Australian Government 2006-07 expenditure data are preliminary. Final data will be as published in the *National Mental Health Report 2008*.

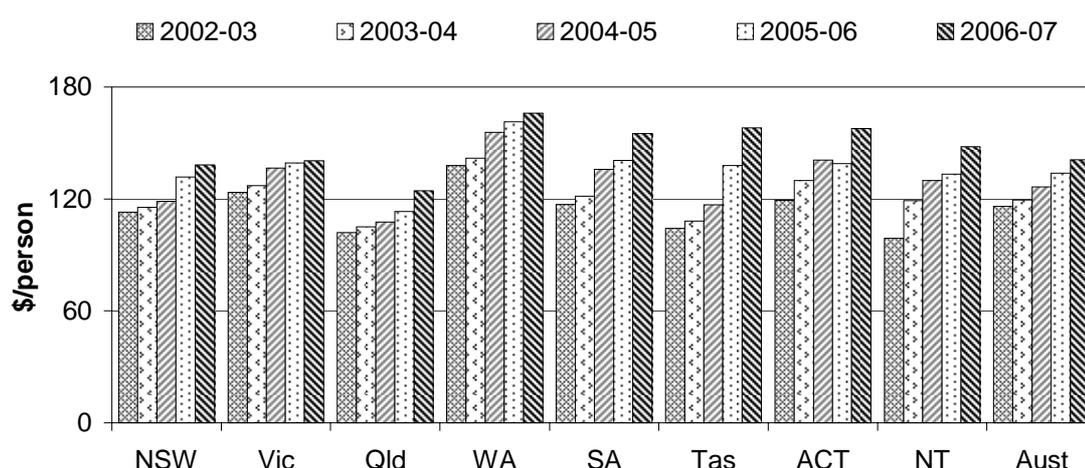
Source: Department of Health and Ageing (DoHA) (unpublished); State and Territory governments (unpublished); AIHW (unpublished), derived from the *MHE NMDS*; tables 12A.32 and 12A.33.

The largest component of Australian Government expenditure on mental health services in 2006-07 was expenditure under the Pharmaceutical Benefits Schedule for psychiatric medication (\$664 million). Expenditure on psychiatric medication increased by an annual average rate of 0.7 per cent between 2002-03 and 2006-07, but fell from 44.5 per cent of Australian Government expenditure on mental health services in 2002-03 to 41.6 per cent in 2006-07. The annual rate of growth of expenditure on psychiatric medication has declined over the reporting period (from 5.2 per cent between 2002-03 and 2003-04 to -0.7 per cent between 2005-06 and 2006-07) (table 12A.31). The reduced rate of growth in expenditure on psychiatric medication is due to a number of frequently prescribed medications coming off patent, which allowed lower cost generic medicines to be used.

In 2006-07, the next largest component of Australian Government expenditure for mental health services was MBS payments for consultant psychiatrists (15.1 per cent), followed by GPs (10.7 per cent). The residual included DVA (9.0 per cent), the NMHS (8.3 per cent), private hospital insurance premium rebates (4.2 per cent) and MBS payments for clinical psychologists and other allied health professionals (3.5 per cent) (table 12A.31).

Real expenditure per person at State and Territory discretion has increased over time (figure 12.24). Data in figure 12.24 for State and Territory government expenditure include Australian Government funds provided as part of base grants under the Australian Health Care Agreements, but exclude special purpose grants provided for mental health reform and also funding provided to states and territories by the DVA. The data are therefore referred to as expenditure 'at State and Territory discretion'. The data in figure 12.24 exclude depreciation. Estimates of depreciation are presented in table 12A.35. State and Territory government expenditure estimates excluding revenue from other sources and other Australian Government funds are presented in table 12A.34. The revenue categories are subject to minimal validation and may be inconsistently treated across jurisdictions. In addition, it is not possible to extract revenue from other sources and other Australian Government funds uniformly across time.

Figure 12.24 **Real recurrent expenditure at the discretion of State and Territory governments, per person (2006-07 dollars)<sup>a, b, c</sup>**

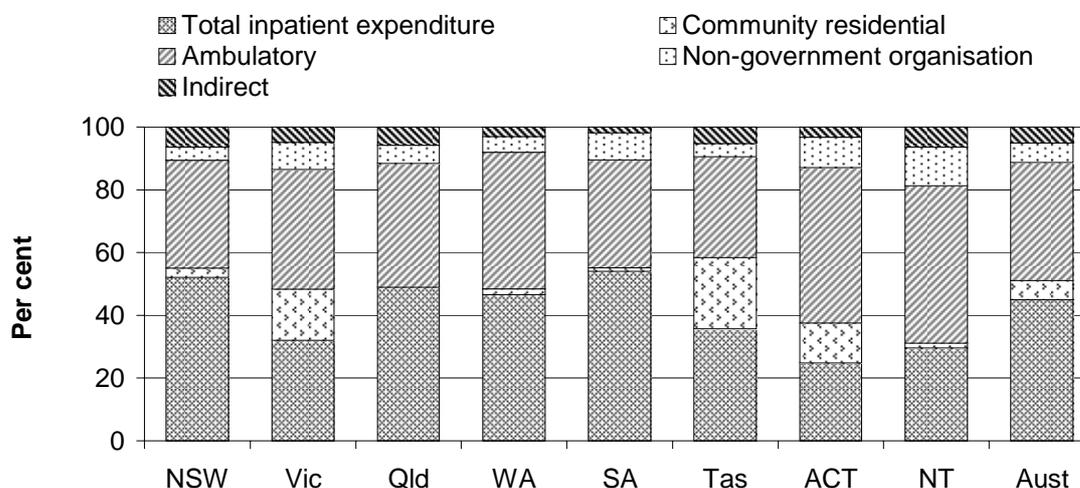


<sup>a</sup> Constant price expenditure (2006-07 dollars), using State and Territory implicit price deflators for general government final consumption on hospital clinical services (table 12A.69). <sup>b</sup> Estimates of State and Territory government spending include revenue from other sources (including patient fees and reimbursement by third party compensation insurers) and 'other Australian Government funds', but exclude Australian Government funding provided under the NMHS and through the DVA. <sup>c</sup> Depreciation is excluded for all years. Depreciation estimates are reported in table 12A.35.

Source: DoHA (unpublished); State and Territory governments (unpublished); AIHW (unpublished), derived from the *MHE NMDS*; table 12A.32.

Figure 12.25 shows how expenditure at the discretion of State and Territory governments was distributed across the range of mental health services in 2006-07. It does not show the distribution of the Australian Government expenditure reported in figure 12.23.

Figure 12.25 **State and Territory recurrent expenditure, by service category, 2006-07<sup>a, b, c, d, e</sup>**



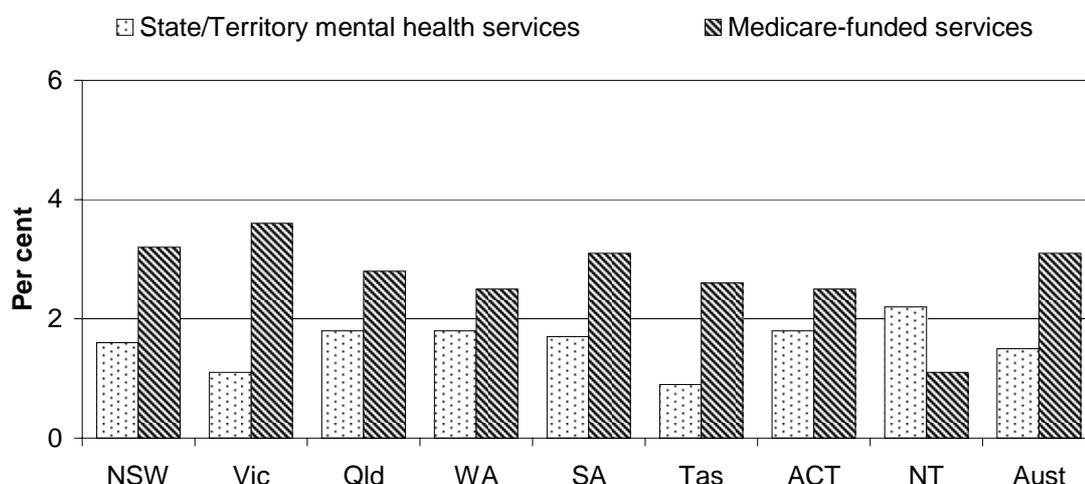
<sup>a</sup> Includes all State and Territory expenditure on mental health services, regardless of source of funds. <sup>b</sup> Depreciation is excluded. Depreciation estimates are reported in table 12A.35. <sup>c</sup> A community residential mental health service is a specialised mental health service that: employs mental health-trained staff on-site; provides rehabilitation, treatment or extended care to residents that is in a domestic-like environment and that is intended to be on an overnight basis; and encourages the resident to take responsibility for their daily living activities. These services include those that employ mental health trained staff on-site 24 hours per day and other services with less intensive staffing. However, all these services employ on-site mental health trained staff for some part of each day. <sup>d</sup> The differential reporting of clinical service providers and non-government organisations artificially segregates the mental health data. Given that the role of non-government organisations varies across jurisdictions, the level of non-government organisation resourcing does not accurately reflect the level of community support services available. <sup>e</sup> Queensland does not fund community residential services, but it funds a number of extended treatment services (both campus-based and non-campus-based) that provide longer term inpatient treatment and rehabilitation services with full clinical staffing for 24 hours a day, seven days a week.

Source: AIHW (unpublished), derived from the *MHE NMDS*; table 12A.36.

### Size and scope

In 2006-07, 3.1 per cent and 1.5 per cent of the total population received Medicare-funded and State and Territory clinical mental health care services, respectively (figure 12.26). These data need to be interpreted carefully. Data for some Medicare-funded mental health services were only for seven months (from November 2006). Data for state/territory mental health services are based on people who received one or more ambulatory mental health service (most people who have received a state and territory inpatient service have also received an ambulatory mental health service). Comparisons across state and territory services need to be made with caution as states and territories differ in the way they count the number of people under care (AHMC 2008).

Figure 12.26 Population receiving clinical mental health care, 2006-07<sup>a, b, c, d</sup>

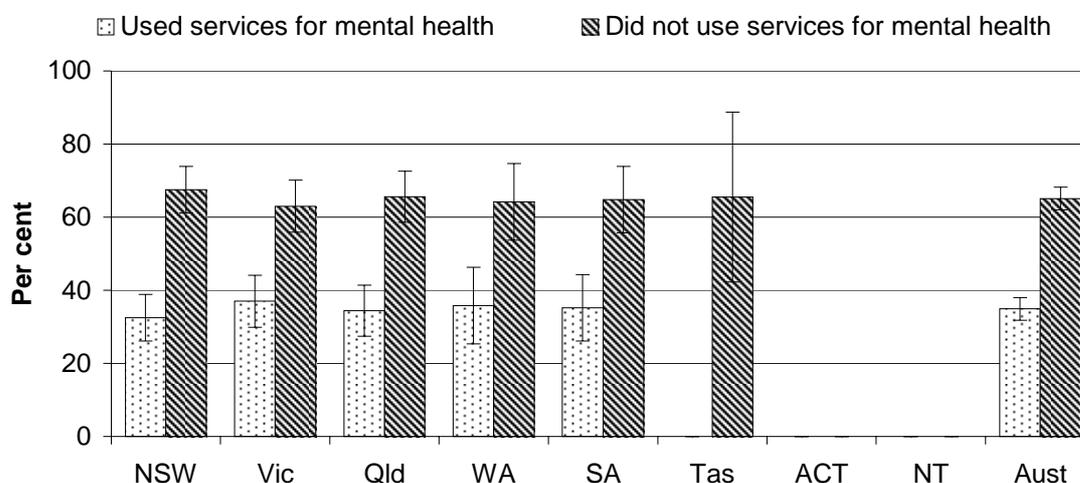


<sup>a</sup> Estimates are preliminary only and based on unique counts of individuals receiving care from the particular services within the year. An individual is only counted once, regardless of the number of services received. An individual could have received a Medicare-funded and a State/Territory mental health service in the given year. <sup>b</sup> Person counts for State and Territory mental health services are confined to those receiving one or more contacts provided by ambulatory mental health services. All service contacts are counted in defining whether a person receives a service, including those delivered 'on behalf' of the consumer. <sup>c</sup> Jurisdictions differ in their capacity to provide accurate estimates of persons receiving services due to the lack of unique patient identifiers, or data matching systems. NSW, Tasmania and SA data are not derived using a unique patient identifier or data matching approaches. <sup>d</sup> All Medicare funded data are based on year of processing, as provided by the Australian Government (DoHA) and billing data maintained by Medicare Australia. A significant component of the data includes services provided under the Australian Government *Better Access to Mental Health Care* initiative, which commenced on 1 November 2006. Data related to GPs' MBS mental health related items for 2007-08 are contained in table 12.6.

Source: AHMC (2008) *Council of Australian Governments National Action Plan for Mental Health 2006-2011: Progress Report 2006-07*, Report prepared under the auspice of the Mental Health Standing Committee of the Australian Health Ministers' Advisory Council; table 12A.37.

Nationally,  $34.9 \pm 3.1$  per cent of people with a mental disorder who had symptoms in the previous 12 months used a service for mental health (figure 12.27). Low rates of service use by people with mental illnesses may occur for a number of reasons; including the unavailability of appropriate services, lack of awareness that services are available and negative experiences associated with the previous use of services (AHMC 2008). In addition, it may not be appropriate for all people with a mental illness to use a service, for example, some may seek and receive assistance from outside the health system (AHMC 2008). Data on the proportions of people with a mental disorder with symptoms in the previous 12 months who used different types of health services are reported in table 12A.29.

**Figure 12.27 People with 12-month mental disorder, use of services for mental health, 2007<sup>a, b, c</sup>**



<sup>a</sup> Services used for mental health included: hospitals, GPs, psychiatrists, psychologists, other mental health professionals and other health professionals. <sup>b</sup> Error bars represent the 95 per cent confidence interval associated with each point estimate. <sup>c</sup> Estimates with RSEs over 25 per cent are not published.

Source: ABS (unpublished), derived from 2007 SMHWB, Cat. no. 4326.0; table 12A.30.

### *Services provided by general practitioners*

Information on GP services for people with mental illnesses is available from Medicare Australia and from the BEACH (Bettering the Evaluation and Care of Health) survey data. Medicare Australia provides data on the number of services provided through the GP mental health specific MBS items. These items ‘define services for which Medicare rebates are payable where GPs undertake early intervention, assessment and management of patients with mental disorders’ (DoHA 2008a), as distinct from general surgery consultations where a mental health related problem is managed.

There were 1.2 million MBS-subsidised GP mental health services provided in 2007-08, equivalent to 57.5 per 1000 people (table 12.6). The majority (97.0 per cent) of these services were for the preparation or review of GP Mental Health Care Plans or the related surgery consultation (MBS items 2710, 2712 and 2713, respectively).

**Table 12.6 Use of GP mental health MBS items, 2007-08**

	<i>Unit</i>	<i>NSW</i>	<i>Vic</i>	<i>Qld</i>	<i>WA</i>	<i>SA</i>	<i>Tas</i>	<i>ACT</i>	<i>NT</i>	<i>Total</i>
<b>GP Mental Health Care Plans<sup>a</sup></b>										
Number	'000	407.9	335.8	209.5	106.3	80.8	23.3	14.9	5.1	1 183.7
Rate	per 1000 people <sup>b</sup>	58.3	63.8	49.8	50.9	50.1	46.6	42.9	24.2	55.7
<b>Focussed Psychological Strategies<sup>c</sup></b>										
Number	'000	13.3	10.4	7.1	1.5	4.2	0.4	0.4	–	37.1
Rate	per 1000 people <sup>b</sup>	1.9	2.0	1.7	0.7	2.6	0.8	1.1	0.2	1.8
<b>All GP mental health MBS items</b>										
Number	'000	421.1	346.2	216.6	107.8	84.9	23.7	15.3	5.1	1 220.8
Rate	per 1000 people <sup>b</sup>	60.2	65.8	51.4	50.8	53.6	47.4	44.0	24.4	57.5

<sup>a</sup> GP Mental Health Care Plans are defined under MBS items 2710, 2712 and 2713. See the Medicare Benefits Schedule for more information on these items. <sup>b</sup> Rates are derived from the *Medicare Item Reports* per capita counts. The Medicare per capita counts are expressed per 100 000 people and are derived by dividing the number of services processed in the financial year by the average monthly number of people enrolled in Medicare across the financial year. <sup>c</sup> Focussed Psychological Strategies are defined under MBS items 2721, 2723, 2725 and 2727. See the Medicare Benefits Schedule for more information on these items.

Source: Medicare Australia (2008) *Medicare Item Reports*, ([www.medicareaustralia.gov.au/statistics/mbs\\_item.shtml](http://www.medicareaustralia.gov.au/statistics/mbs_item.shtml)); table 12A.38.

Data for the BEACH survey are collected from a sample of 1000 GPs. In 2007-08, on average 11.5 psychological/mental health problems were managed by GPs in every 100 encounters (more than one problem can be managed in a single encounter). The most frequently reported mental health related problem managed was depression (4.0 per 100 GP encounters). Anxiety (1.8 per 100 GP encounters) and sleep disturbance (1.6 per 100 GP encounters) were the next most common psychological problems managed. In 2007-08, depression was the fifth most frequently managed problem by a GP (Britt et al. 2008).<sup>4</sup>

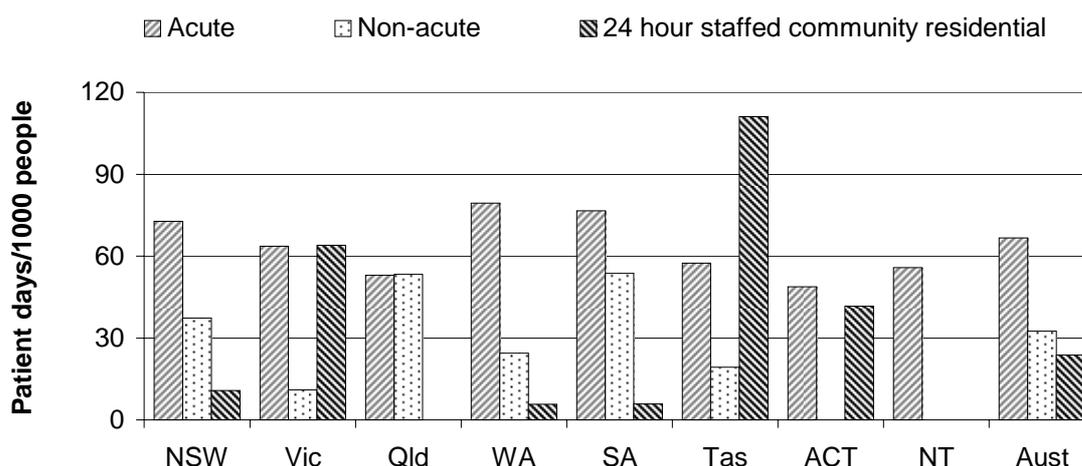
The BEACH survey asks GPs to record an MBS item for each encounter. Analysis by the AIHW of BEACH survey data for 2006-07 showed that, of encounters where a mental health related problem was managed, only 2.2 per cent of these encounters had the MBS item recorded as a specific mental health item. The large majority of these encounters (over 90 per cent) recorded the MBS item as some form of general surgery consultation (AIHW 2008b).

<sup>4</sup> A GP may manage more than one problem at a single encounter. Problems managed reflect the GP's understanding of the health problem presented by the patient.

*State and Territory publicly funded specialised mental health services — service activity*

Estimating activity across the specialised publicly funded mental health services sector is problematic. Data for patient days are provided in figure 12.28 by acute, non-acute and 24 hour staffed community residential care (as defined in box 12.17).<sup>5</sup> Hospital inpatient days and community residential patient days are included in figure 12.28, but other types of community services are not covered. Collection of data outlining community mental health care patient contacts commenced in July 2000 as part of the NMDS, but there are continuing difficulties with data quality. Queensland does not fund community residential services, but funds a number of campus-based and non-campus-based extended treatment services. Patient days in these services are included as non-acute.

**Figure 12.28 Mental health patient days, 2006-07<sup>a, b, c</sup>**



<sup>a</sup> Queensland does not fund community residential services, but funds a number of campus-based and non-campus-based extended treatment services. Data from these services are included as non-acute.

<sup>b</sup> The ACT and the NT did not provide mental health care in non-acute units. <sup>c</sup> The NT did not provide mental health care in 24 hour staffed community residential facilities.

Source: State and Territory governments (unpublished); table 12A.42.

In 2005-06, there were 76 091 separations with specialised psychiatric care in public acute hospitals and 13 255 specialised psychiatric care separations in public psychiatric hospitals (table 12A.43). Schizophrenia accounted for a large proportion of separations with specialised psychiatric care in public hospitals (22.9 per cent in public acute hospitals and 24.4 per cent in public psychiatric hospitals) (table 12A.43).

<sup>5</sup> Patient days are all days or part days for which the patient was in care during the relevant period, regardless of the original date of admission.

---

In 2005-06, there were 7606 ambulatory equivalent same day separations with specialised psychiatric care in public acute hospitals and 1388 in public psychiatric hospitals (AIHW 2008b). Unlike the general acute hospital sector, mental health has few procedural same day admissions. Electroconvulsive therapy treatment of people living in the community represented 6–10 per cent of all same day separations. Work for the Mental Health Classification and Service Costs Project suggested that the majority of same day hospitalisations are better described as ambulatory care and involve consumer attendance at a variety of day and group-based programs that otherwise could be provided in community settings (Buckingham *et al.* 1998).

### *Indigenous patients*

Limited data are available on specialised psychiatric care of Indigenous patients in hospital. Comparisons are difficult because data on Indigenous status are incomplete and Indigenous and non-Indigenous people may differ in their use of hospital services relative to other health services. The data reflect a range of factors, such as: the spectrum of public, primary care and post-hospital care available; Indigenous people's access to these as well as hospital services; social and physical infrastructure services for Indigenous people; and differences in the complexity, incidence and prevalence of illnesses. For the jurisdictions for which data are available, Indigenous people were 1.8 times more likely to receive specialised psychiatric care in hospitals than non-Indigenous people. However, the average length of stay for Indigenous people (18.5) was shorter than for non-Indigenous people (21.7) (table 12.7).

**Table 12.7 Specialised psychiatric care, by Indigenous status, 2005-06<sup>a, b, c</sup>**

	<i>Unit</i>	<i>NSW</i>	<i>Vic</i>	<i>Qld</i>	<i>WA</i>	<i>SA</i>	<i>Tas</i>	<i>ACT</i>	<i>NT</i>	<i>Total</i>
Indigenous										
Separation rate <sup>d</sup>	per 1000 people	13.6	10.9	8.2	9.3	12.2	np	np	7.9	10.4
Average length of stay <sup>e</sup>	no.	18.0	14.5	22.5	23.3	15.0	20.1	10.6	10.3	18.5
Non-Indigenous										
Separation rate <sup>d</sup>	per 1000 people	5.5	5.0	6.6	5.6	6.4	np	np	4.2	5.7
Average length of stay <sup>e</sup>	no.	23.0	19.4	21.3	19.9	27.2	19.8	15.3	9.8	21.7
Rate ratio <sup>f</sup>		2.5	2.2	1.2	1.7	1.9	np	np	1.9	1.8

<sup>a</sup> The completeness of data on Indigenous status varies, so these data need to be used with care. <sup>b</sup> Specialised psychiatric care refers to separations in which at least one day of specialised psychiatric care was received. <sup>c</sup> Indigenous identification is likely to be incomplete and to vary among jurisdictions. <sup>d</sup> Data for NSW, Victoria, Queensland, WA, SA and the NT (public hospitals only for the NT) are considered to be of acceptable quality for analytical purposes. <sup>e</sup> Includes data for overnight separations only. <sup>f</sup> The rate ratio is equal to the separation rate for Indigenous persons divided by the separation rate for non-Indigenous. **np** Not published.

Source: AIHW (2008) *Mental Health Services in Australia 2005-06*, Cat. no. HSE 56, Mental Health Series no. 10, [www.aihw.gov.au/publications/hse/mhsa05-06/mhsia\\_05-06\\_internet.xls](http://www.aihw.gov.au/publications/hse/mhsa05-06/mhsia_05-06_internet.xls) (accessed 2 December 2008); table 12A.44.

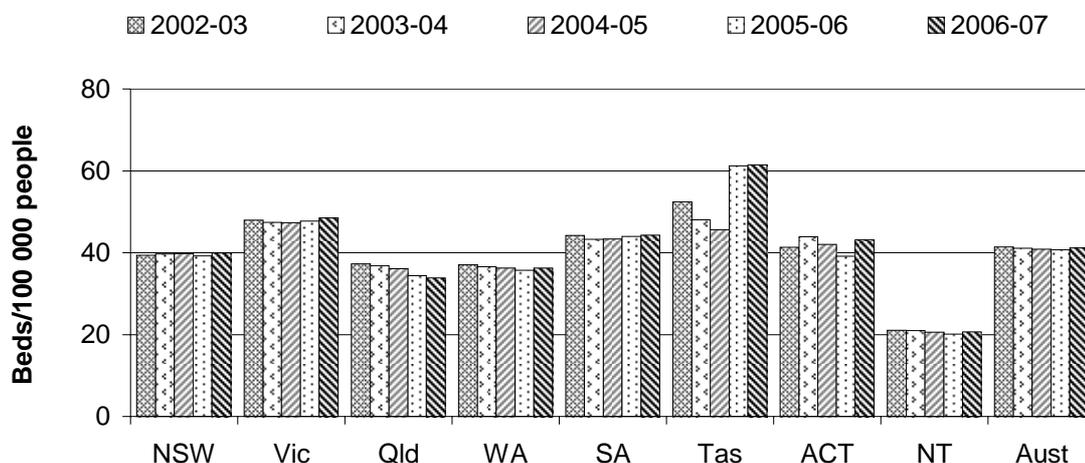
### *State and Territory publicly funded specialised mental health services — mental health beds*

Beds are counted as those immediately available for use by admitted patients if required. They are available for use immediately — or within a reasonable period of time — if located in a suitable place for care with nursing or other auxiliary staff available.

Available beds are counted differently across years. For 2005-06 and 2006-07, available beds are counted as the average of monthly available bed numbers. For previous years, available beds are counted at 30 June. In addition, for 2005-06 and 2006-07, available beds counts excluded beds in wards that were closed for any reason (except weekend closures for beds/wards staffed and available on weekdays only). For previous years, available beds counts included wards that were temporarily closed for reasons such as renovation or strike, but that would normally be open.

Figure 12.29 presents the number of beds per 100 000 people for public hospitals and community residential facilities combined.

Figure 12.29 **Mental health beds in public hospitals and publicly funded community residential units<sup>a, b, c, d</sup>**

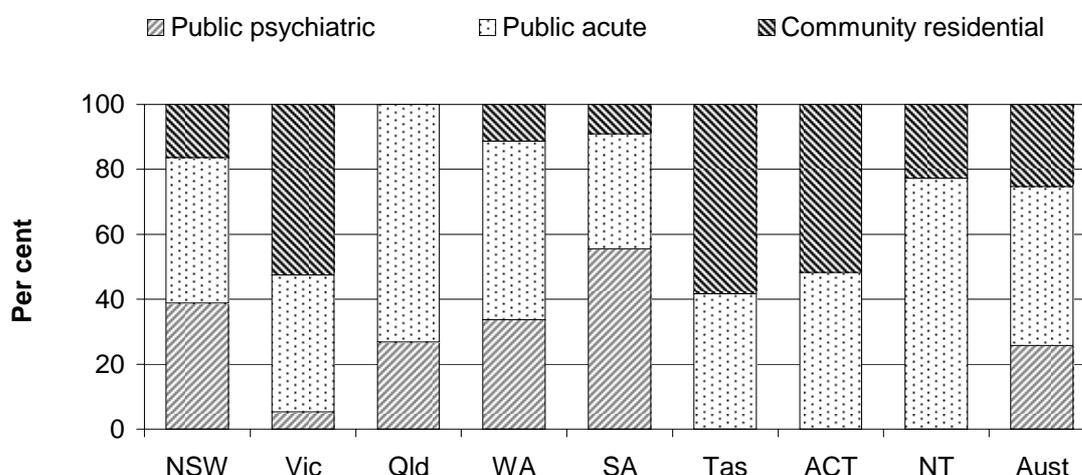


<sup>a</sup> Includes beds in public hospitals and publicly funded community residential units. <sup>b</sup> The reduction in the number of beds in Queensland is a result of a temporary closure of some acute beds in one hospital and the permanent closure of some transitional extended treatment beds. <sup>c</sup> Bed numbers in WA for 2005-06 include emergency department observation beds in one hospital. <sup>d</sup> In Tasmania, for 2005-06, non-government organisations' residential beds funded by government are included for the first time in the publicly funded community residential facilities category. This has led to a significant change in the bed numbers between 2004-05 and 2005-06.

Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.39.

Figure 12.30 presents the number of beds by service setting for 2006-07. These data show the differences in service mix across states and territories. As noted above, Queensland funds a number of extended treatment services (both campus- and non-campus-based) that provide longer term inpatient treatment and rehabilitation services with full clinical staffing for 24 hours a day, seven days a week. Queensland does not report these beds as community residential beds.

Figure 12.30 Available beds, by service setting, 2006-07<sup>a, b</sup>



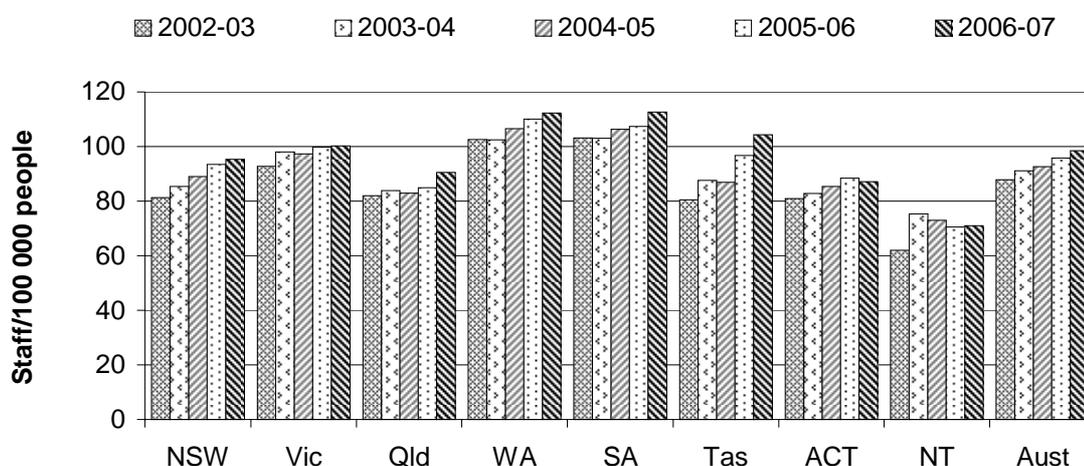
<sup>a</sup> Queensland does not fund community residential services, but it funds a number of campus-based and non-campus-based extended treatment services. These services are reported either as beds in public acute hospitals or beds in public psychiatric hospitals. <sup>b</sup> Tasmania, the ACT and the NT do not have public psychiatric hospitals.

Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.39.

### *State and Territory publicly funded specialised mental health services — staff*

Figure 12.31 reports full time equivalent (FTE) health professional direct care staff per 100 000 people. It includes only staff within the health professional categories of ‘medical’, ‘nursing’ and ‘allied health’. ‘Medical’ staff consist of consultant psychiatrists, psychiatry registrars, and other medical officers who are neither registered as psychiatrists within the State or Territory, nor are formal trainees of the Royal Australian and New Zealand College of Psychiatrists’ Postgraduate Training Program. ‘Nursing’ staff consist of registered and non-registered nurses. ‘Allied health’ staff consist of occupational therapists, social workers, psychologists and other allied health staff. ‘Other personal care’ direct care staff are excluded. ‘Other personal care’ staff include attendants, assistants, home companions, family aides, ward helpers, orderlies, ward assistants and nursing assistants who are engaged primarily in the provision of personal care to patients or residents and who are not formally qualified or are still training in nursing or allied health professions. Definitions for staffing categories are provided in more detail in section 12.7.

Figure 12.31 FTE health professional direct care staff<sup>a</sup>



<sup>a</sup> Includes health professional occupational categories only.

Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.40.

Nursing staff comprise the largest FTE component of health care professionals employed in mental health services. Across Australia in 2006-07, 63.7 nurses per 100 000 people were working in specialised mental health services, compared with 23.4 allied health care staff and 11.4 medical staff (table 12A.40). FTE direct care staff employed in specialised mental health services, by service setting, are reported in table 12A.41.

## Framework of performance indicators

Preventing the onset of mental illness is challenging, primarily because individual illnesses have many origins. Most efforts have been directed at treating mental illness when it occurs, determining the most appropriate setting for providing treatment and emphasising early intervention.

The framework of performance indicators for specialised mental health services draws on governments' broad objectives for national mental health policy, as encompassed in the NMHS and the Council of Australian Governments (COAG) National Action Plan on Mental Health (box 12.18). The framework reports on the equity, effectiveness and efficiency of specialised mental health services. It covers a number of service delivery types (admitted patient and community-based services) and includes outcome indicators of systemwide performance. Improving the framework is a priority of the Steering Committee.

---

### Box 12.18 **Broad objectives of National Mental Health Policy**

Key broad objectives include to:

- improve the effectiveness and quality of service delivery and outcomes
- promote, where appropriate, community awareness of mental health problems
- prevent, where possible, the development of mental health problems and mental illnesses
- undertake, where appropriate, early intervention for mental health problems and mental illnesses
- reduce, where possible, the impact of mental illnesses on individuals, families and the community
- assure the rights of persons with mental illnesses
- encourage partnerships among service providers and between service providers and the community
- provide services in an equitable (including improved access to mental health services, particularly in Indigenous and rural communities) and efficient manner.

Governments also aim to improve mental health and facilitate recovery from illness through more stable accommodation and support and meaningful participation in recreational, social, employment and other activities in the community.

In 1991, Australian Health Ministers signed the Mental Health Statement of Rights and Responsibilities. This Statement of Rights and Responsibilities seeks to ensure that consumers, carers, advocates, service providers and the community are aware of their rights and responsibilities and can be confident in exercising them (Australian Health Ministers 1991). The Statement underpins the NMHS endorsed by Australian, State and Territory governments in 1992 (AIHW 2008b).

The NMHS was established to guide the reform agenda for mental health in Australia across the whole of government. The NMHS consists of the National Mental Health Policy and the National Mental Health Plan.

- The National Mental Health Policy describes the broad aims and objectives of the Strategy. The Policy has 38 objectives, including those that relate to the shift from institutional to community-based services, and the delivery of services in mainstream settings (AIHW 2008b).
- The National Mental Health Plan describes the approach to implementing the aims and objectives of the Policy. A Third Plan (2003–2008) was endorsed by all Australian Health Ministers in July 2003. This plan consolidates reforms begun under the first two plans (the first ran from 1993–1998 and the second from 1998–2003) (AIHW 2008b).

---

An evaluation of the third National Mental Health Plan (2003–2008) and associated Framework commenced in May 2007. On 22 July 2008, Australian Health Ministers noted the findings of the evaluation and agreed to the development of a fourth National Mental Health Plan in the context of a whole-of-government framework. Ministers further agreed to an initial Forum to inform the development of the Plan, which was convened by NSW on 11 September 2008.

The National Strategic Framework for Aboriginal and Torres Strait Islander People's Mental Health and Social and Emotional Well Being 2004–2009 (the Social and Emotional Well Being Framework) was endorsed by the Australian Health Ministers' Advisory Council in December 2004. It aims to provide a framework for action by all governments and communities to improve the social and emotional wellbeing and mental health needs of Indigenous Australians over the next five years.

In 2006, COAG agreed to the National Action Plan on Mental Health 2006–2011 (COAG 2006). This plan involves a joint package of measures and new investments by all governments aimed at promoting better mental health and providing additional support to people with mental illness, their families and their carers. The Action Plan is designed to further promote mental health reform and focuses on areas that have not progressed sufficiently under the NMHS. The Action Plan is directed at achieving four outcomes:

- reducing the prevalence and severity of mental illness in Australia
- reducing the prevalence of risk factors that contribute to the onset of mental illness and prevent longer term recovery
- increasing the proportion of people with an emerging or established mental illness who are able to access the right health care and other relevant community services at the right time, with a particular focus on early intervention
- increasing the ability of people with a mental illness to participate in the community, employment, education and training, including through an increase in access to stable accommodation.

A series of measures have been identified to monitor progress against these outcomes. Australian Health Ministers agreed to report annually to COAG on implementation of the Plan, and on progress against the agreed outcomes. Governments also agreed to an independent evaluation and review of the Plan after five years (COAG 2006).

The performance indicator framework shows which data are comparable in the 2009 Report (figure 12.32). For data that are not considered directly comparable, the text includes relevant caveats and supporting commentary. Chapter 1 discusses

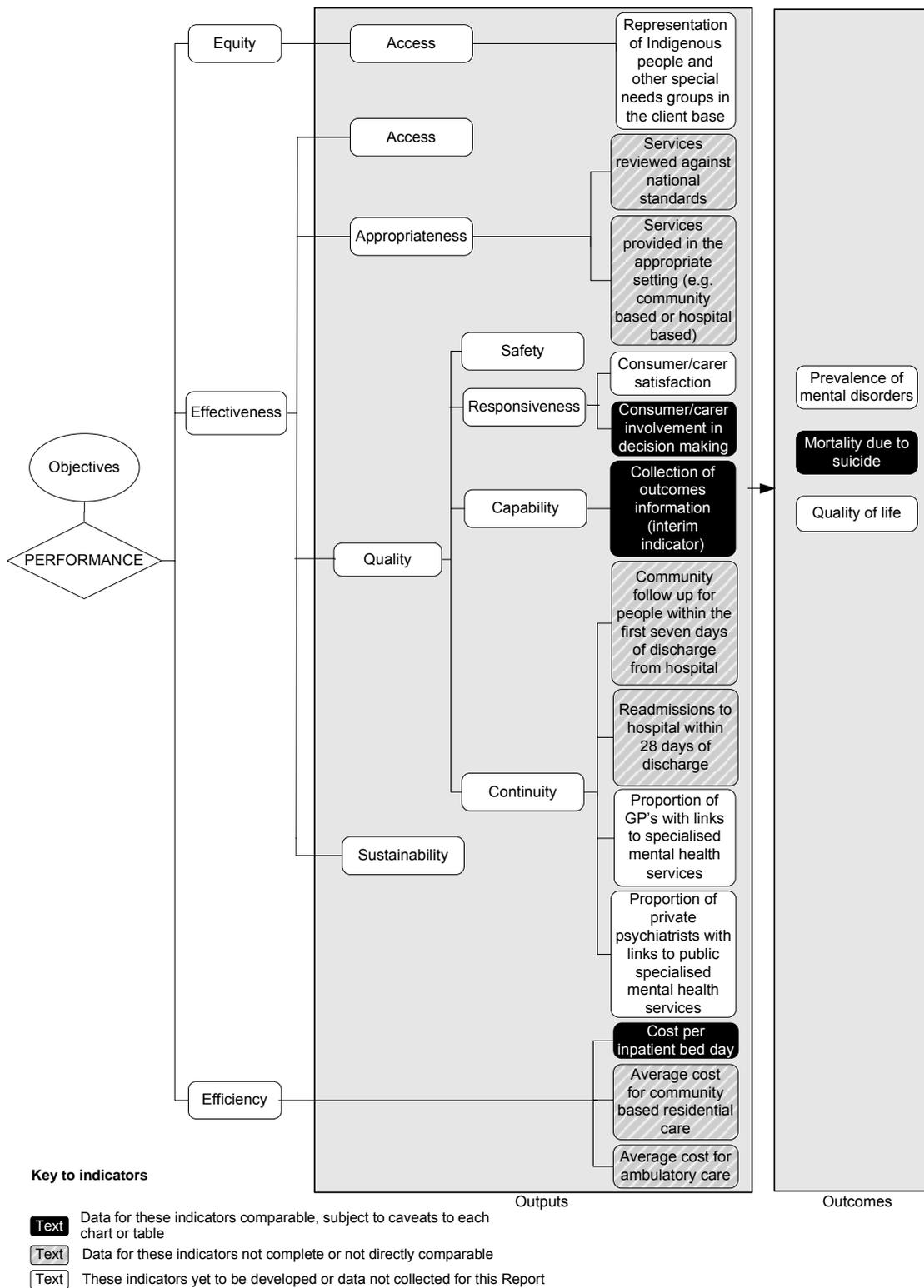
---

data comparability from a Report-wide perspective (see section 1.6). The ‘Health preface’ explains the performance indicator framework for health services as a whole, including the sub-dimensions for quality and sustainability that have been added to the standard Review framework.

Some changes have been made to the mental health framework for the 2009 Report. Data for the following indicators are now included:

- ‘community follow up for people within seven days of discharge from hospital’
- ‘readmissions to hospital within 28 days of discharge’.

Figure 12.32 Performance indicators for mental health management



---

## Key performance indicator results

### *Outputs*

Outputs are the actual services delivered (while outcomes are the impact of these services on the status of an individual or group) (see chapter 1, section 1.5).

### *Equity — representation of Indigenous people and others in the client base*

‘Representation of Indigenous people and other special needs groups in the client base’ is an indicator of governments’ objective to provide mental health services in an equitable manner, including access to services by special needs groups such as Indigenous people (box 12.19).

**Box 12.19 Representation of Indigenous people and other special needs groups in the client base**

‘Representation of Indigenous people and other special needs groups in the client base’ is yet to be defined.

Data for this indicator were not available for the 2009 Report.

### *Access*

The Steering Committee has identified access as an area for reporting, but no indicators have yet been developed.

### *Appropriateness — services reviewed against the National Standards*

‘Services reviewed against the National Standards’ is an indicator of governments’ objective to provide mental health services that are appropriate (box 12.20). It is a process indicator of appropriateness, reflecting progress being made in meeting the national standards for mental health care. The National Standards are outlined in box 12.21 (these standards are currently being revised).

---

**Box 12.20 Services reviewed against the National Standards**

'Services reviewed against the National Standards' is defined as the proportion of mental health services assessed at level 1 and at level 2, where level 1 and level 2 are defined as:

- *Services assessed at level 1.* The number of specialised public mental health services that have been reviewed against the National Standards for Mental Health Services by an external accreditation agency and assessed as meeting all Standards.
- *Services assessed at level 2.* The number of specialised public mental health services that have been reviewed against the National Standards for Mental Health Services by an external accreditation agency and assessed as meeting some but not all Standards.

A higher proportion of services that have been assessed at level 1 and level 2 is desirable.

A comprehensive review of the National Standards was completed in May 2008. The review was conducted to align the Standards with developments in mental health reform, current legislation, and to assist mental health services to provide quality care that is evidence-based, integrated and recovery-focussed, for people with a mental illness (consumers). The National Standards are currently being revised.

Data reported for this indicator are not directly comparable.

External accreditation agencies, such as the Australian Council on Healthcare Standards, undertake accreditation of a parent health organisation (for example, a hospital) that may cover a number of specialised services, including mental health services. Accreditation of a parent organisation does not currently require a mental health service to be separately assessed against the national standards; rather, assessment against the National Standards must be specifically requested and involves a separate review process.

---

**Box 12.21 The National Standards for Mental Health Services**

The National Standards for Mental Health Services were developed under the First National Mental Health Plan for use in assessing service quality and as a guide for continuous quality improvement in all Australian mental health services. They comprise 11 major criteria:

1. rights
2. safety
3. consumer and carer participation
4. promoting community acceptance
5. privacy and confidentiality
6. prevention and mental health promotion
7. cultural awareness
8. integration
9. service development
10. documentation
11. delivery of care.

*Source: DoHA (2002).*

Table 12.8 shows the percentage of specialised public mental health services that have completed an external review process against the National Standards for Mental Health Services and have been assessed as meeting ‘all standards’ (level 1) or of meeting ‘some but not all standards’ (level 2).

**Table 12.8 Specialised public mental health services reviewed against the National Standards for Mental Health Services, 30 June (per cent)<sup>a</sup>**

	<i>NSW</i>	<i>Vic<sup>b</sup></i>	<i>Qld</i>	<i>WA<sup>c</sup></i>	<i>SA</i>	<i>Tas</i>	<i>ACT</i>	<i>NT</i>
2003								
Level 1	na	na	31.1	na	11.7	na	81.3	–
Level 2	na	na	62.2	na	14.6	na	..	–
2004								
Level 1	na	100	74.2	na	49.5	na	81.3	50.0
Level 2	na	–	8.3	na	5.6	na	..	–
2005								
Level 1	73.4	100.0	75.0	64.5	72.7	46.9	87.5	50.0
Level 2	0.6	–	6.7	12.9	2.7	–	..	50.0
2006								
Level 1	78.0	100.0	78.5	51.6	62.9	36.4	100.0	100.0
Level 2	0.9	–	1.7	9.7	3.4	15.2	–	–
2007								
Level 1	77.5	96.0	82.8	44.1	71.8	37.9	100.0	100.0
Level 2	0.9	–	0.8	41.2	1.8	6.9	–	–

<sup>a</sup> NSW, Queensland, SA, Tasmania and the ACT report at the service unit level. Victoria, WA and the NT report at the organisation level. <sup>b</sup> In Victoria, two agencies did not report as at 'Level 1' for 2007. However, both agencies were in the process of being re-accredited and therefore should be deemed as having gained accreditation. <sup>c</sup> WA has a number of services currently involved in re-accreditation as well as internal review against the National Standards that are not included in this table. **na** Not available. **..** Not applicable – Nil or rounded to zero.

Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.45.

### *Appropriateness — services provided in the appropriate setting*

'Services provided in the appropriate setting' is an indicator of governments' objective to provide mental health services in an appropriate setting (box 12.22). The development of local comprehensive mental health service systems is advocated by the NMHS. Mental health services must be capable of responding to the individual needs of people with mental illnesses and of providing continuity of care, so consumers can move between services as their needs change. The Strategy advocates:

- a reduced reliance on stand-alone psychiatric hospitals
- the expanded delivery of community-based care integrated with inpatient care
- mental health services being mainstreamed with other components of health care.

---

More appropriate treatment options can be provided by encouraging the treatment of patients in community settings and public (non-psychiatric) hospitals, rather than in stand-alone psychiatric hospitals.

One of the indicator measures in previous reports has been replaced to reflect the progress that has been made toward reforms under the Strategy: 'recurrent expenditure on stand-alone psychiatric hospitals as a proportion of total expenditure on mental health services' has been replaced by 'recurrent expenditure on community-based services as a proportion of total expenditure on mental health services'.

**Box 12.22 Services provided in the appropriate setting**

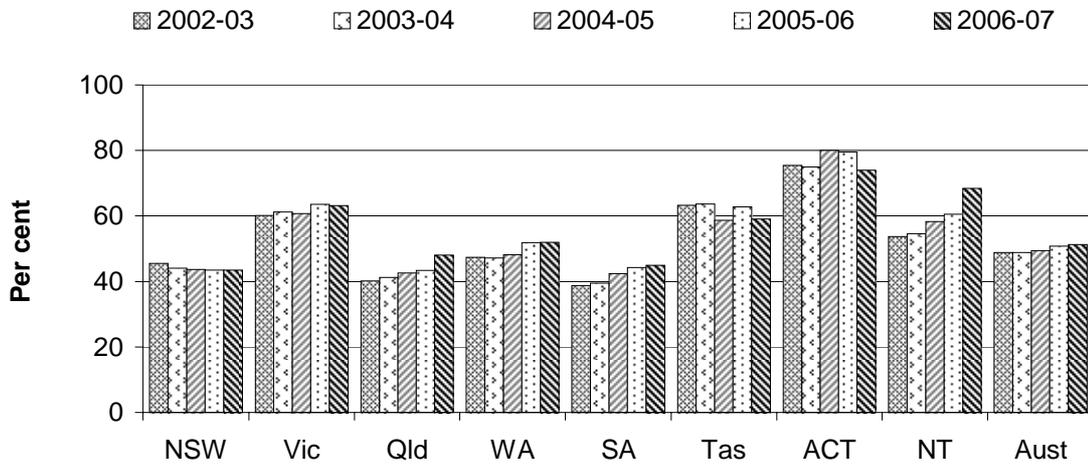
Two measures of 'services provided in the appropriate setting' are reported. These measures are defined, and results should be interpreted, as follows:

- Recurrent expenditure on community-based services as a proportion of total expenditure on mental health services. Aged care community residential expenditure is excluded to improve comparability. A high proportion for this indicator is desirable, reflecting a greater reliance on services that are based in community settings.
- Acute patient days in public acute hospitals as a proportion of the total acute inpatient bed days in public acute and psychiatric hospitals. A high proportion for this indicator is desirable, reflecting a reduced reliance on stand-alone psychiatric hospitals and greater mainstreaming of mental health services.

Data reported for this indicator are not directly comparable.

Figure 12.33 shows recurrent expenditure on community-based services as a proportion of total expenditure on mental health services.

Figure 12.33 Recurrent expenditure on community-based services as a proportion of total expenditure on mental health services<sup>a, b</sup>

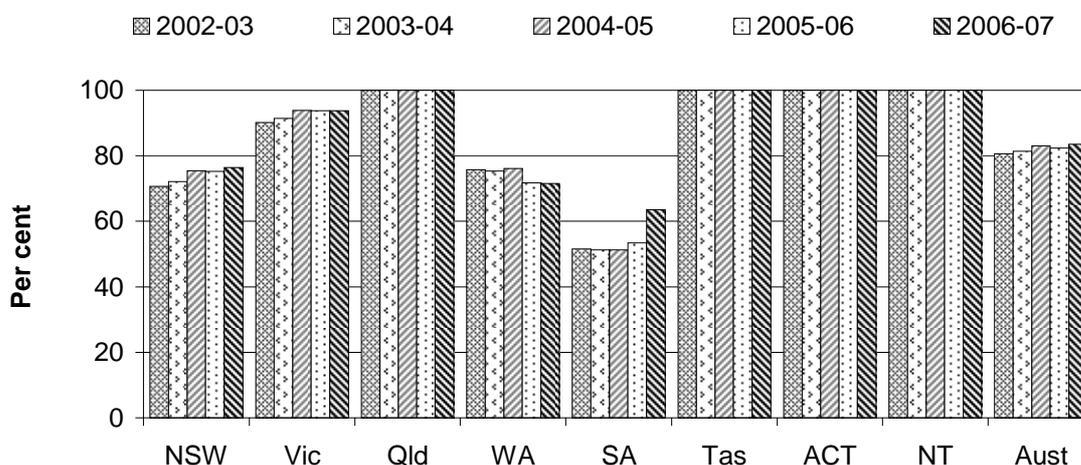


<sup>a</sup> Community-based expenditure includes expenditure on ambulatory, non-government and adult community residential services. Aged care community residential expenditure is excluded to improve comparability.  
<sup>b</sup> Total expenditure on mental health services excludes indirect/residual expenditure that could not be apportioned directly to services and aged care community residential expenditure.

Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.46.

Figure 12.34 shows acute patient days in public acute hospitals as a proportion of the total acute inpatient bed days in public acute and psychiatric hospitals. Nationally, the proportion of acute patient days in public acute hospitals as a proportion of total acute inpatient bed days in public acute and psychiatric hospitals has increased slightly over the period from 2002-03 to 2006-07.

**Figure 12.34 Acute patient days in public acute hospitals as a proportion of total acute inpatient bed days in public acute and psychiatric hospitals**



Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.46.

### *Quality — consumer and carer satisfaction*

‘Consumer and carer satisfaction’ is an indicator of governments objective that services are responsive to the needs of consumers and their carers (box 12.23). Consumers and their carers should be satisfied with both clinicians’ responses and with services provided, in all areas of mental health. Both are important aspects of the NMHS.

#### **Box 12.23 Consumer and carer satisfaction**

‘Consumer and carer satisfaction’ is yet to be defined.

Data for this indicator were not available for the 2009 Report.

### *Quality — consumer and carer involvement in decision making*

‘Consumer and carer involvement in decision making’ is an indicator of governments’ objective that consumers’ and carers’ are involved at the service delivery level, where they have the opportunity to influence the services they receive (box 12.24). Consumer and carer involvement is an important aspect of the NMHS.

---

**Box 12.24 Consumer and carer involvement in decision making**

'Consumer and carer involvement in decision making' has the following two measures:

- 'Organisations with consumer participation in decision making'
- 'Paid consumer and carer consultants per 10 000 clinicians'.

'Organisations with consumer participation in decision making' is defined as the proportions of organisations that have in place certain arrangements that allow consumers to contribute to local service planning and delivery in specialised mental health services. An organisation can be classified at only one level. Arrangements are grouped into four categories:

- level 1 — organisation has a formal position for mental health consumers on the management committee or a specific mental health consumer advisory group exists to advise on all aspects of service delivery
- level 2 — organisation has a specific mental health consumer advisory group to advise on some but not all aspects of service delivery
- level 3 — organisation includes mental health consumers on a broadly based advisory committee
- level 4 — organisation has minimal/no arrangements for mental health consumer participation in planning and evaluation of services.

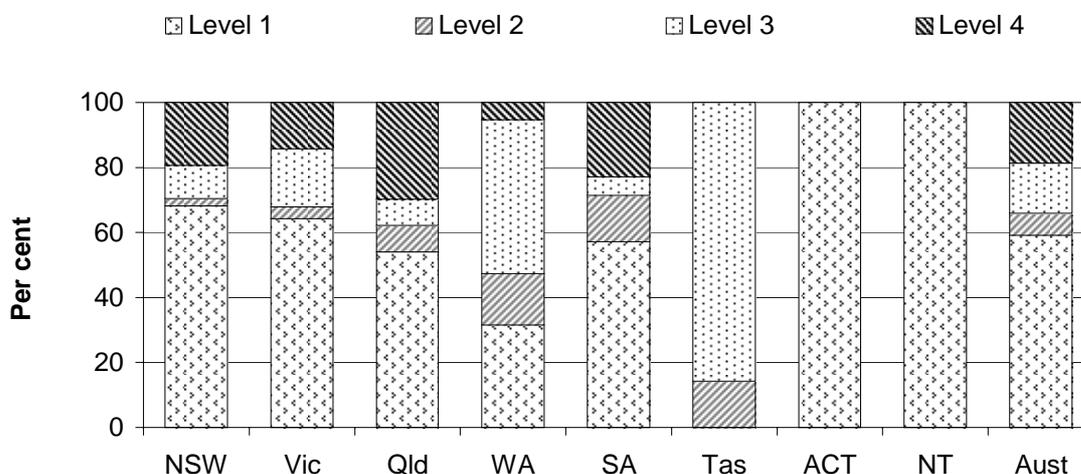
A high proportion of organisations with level 1 arrangements is desirable, while a high proportion of organisations with level 4 arrangements is undesirable.

'Paid consumer and carer consultants per 10 000 clinicians' is defined as the number of paid consumer consultants per 10 000 clinical staff and the number of paid carer consultants per 10 000 clinical staff. Higher numbers of such staff imply a greater chance that paid consumers and carers can be involved in decision making.

Data reported for this indicator are comparable.

Figure 12.35 illustrates the degree of consumer participation in decision making. As notes to figure 12.35 indicate, current categories do not match all jurisdictions' arrangements for consumer participation in decision making. The Steering Committee has identified that work to improve reporting in this area is needed.

Figure 12.35 Organisations with consumer participation in decision making, 2006-07<sup>a, b, c</sup>



<sup>a</sup> Non-government organisations are included only where they provide staffed residential services. <sup>b</sup> WA advised that several key consumer and carer advisory groups are supported and provided with financial assistance at a state level and, collectively, these groups provide advice and representation on consumer and carer issues. The information obtained through the MHE NMDS is restricted to the service organisation level. <sup>c</sup> An expanded range of indicators of consumer and carer participation for 2004-05 are reported in the *National Mental Health Report 2007*.

Source: AIHW (unpublished), derived from the *MHE NMDS*; table 12A.47.

Table 12.9 illustrates the number of paid FTE consumer and carer consultants per 10 000 FTE clinicians.

Table 12.9 Paid FTE consumer and carer consultants per 10 000 FTE clinical staff

	NSW	Vic	Qld	WA	SA	Tas	ACT	NT	Aust
Paid consumer consultants per 10 000 clinicians									
2003-04	na	na	21.6	na	16.6	na	na	–	na
2004-05	26.7	na	24.4	na	23.8	na	na	–	na
2005-06	43.0	38.8	28.5	2.2	16.7	–	–	–	30.5
2006-07	37.9	36.7	27.5	3.5	11.8	–	–	–	27.9
Paid carer consultants per 10 000 clinicians									
2003-04	na	na	3.1	na	–	na	na	–	na
2004-05	na	na	3.1	na	–	na	na	–	na
2005-06	4.3	23.2	1.2	–	–	–	–	–	0.8
2006-07	13.2	27.0	2.4	–	–	–	–	–	1.1

na Not available. – Nil or rounded to zero.

Source: AIHW (unpublished), derived from the *MHE NMDS*; State and Territory governments (unpublished); table 12A.47.

---

*Quality — collection of outcomes information (interim indicator)*

The ‘collection of outcomes information’ is an indicator of governments’ objective that consumer outcomes be monitored (box 12.25). It is an interim process indicator of this objective, reflecting the capability of services in establishing systems to collect consumer outcomes information. It will be replaced by information on consumer outcomes once they become available.

Establishing a system for the routine monitoring of consumer outcomes was introduced as part of the *National Mental Health Plan 2003–2008*. States and territories have taken the following approach to introducing consumer outcomes measurement as part of day-to-day service delivery:

- measures to include ratings by clinicians and self-ratings by consumers
- all clinical staff to have undergone training in collection
- processes established to ensure uniformity in collection
- funding for information systems to store, analyse and report on the data
- a national approach to data analysis, reporting and benchmarking (DoHA 2002).

**Box 12.25 Collection of outcomes information (interim indicator)**

‘Collection of outcomes information (interim indicator)’ is defined as the proportion of specialised mental health services that have introduced routine collection of consumer outcomes information.

A high proportion of services that are collecting consumers outcomes information is desirable.

Data reported for this indicator are comparable.

The proportions of specialised mental health services that have introduced routine consumer outcomes measurement are shown in table 12.10.

**Table 12.10 Specialised mental health services that introduced the routine collection of consumer outcomes measurement (per cent)<sup>a</sup>**

	<i>NSW</i>	<i>Vic</i>	<i>Qld</i>	<i>WA</i>	<i>SA</i>	<i>Tas</i>	<i>ACT</i>	<i>NT</i>	<i>Aust</i>
June 2003	77.3	72.6	47.1	7.4	–	94.4	100.0	100.0	63.3
June 2004	100.0	98.1	100.0	71.0	49.5	94.4	100.0	100.0	82.9
June 2005	100.0	98.2	100.0	100.0	78.1	96.9	100.0	100.0	93.2
June 2006	100.0	96.9	100.0	100.0	77.6	97.0	100.0	100.0	93.0
June 2007	100.0	100.0	100.0	100.0	84.6	96.6	100.0	100.0	95.3

<sup>a</sup> Data are based on reports from jurisdictions. Jurisdictions report at varying levels, reflecting differences in service structure — for example, data may be reported at area health service level or at hospital level, with each level containing a number of specialised mental health services. Data are thus aggregated. – Nil or rounded to zero.

Source: State and Territory governments (unpublished); table 12A.48.

*Quality — community follow up for people within the first seven days of discharge from hospital*

‘Community follow up for people within the first seven days of discharge from hospital’ is an indicator of governments’ objective to provide continuity of care in the delivery of mental health services (box 12.26). Continuity of care involves prompt community follow up in the vulnerable period following discharge from hospital (AHMC 2008). A community support system for people who are discharged from hospital after an acute psychiatric episode is essential to maintain clinical and functional stability (NMHWG 2005). Patients leaving hospital with a discharge plan, involving linkages with community services and supports, are less likely to need early readmission.

Data for this indicator are reported in this chapter for the first time and are drawn from the *Council of Australian Governments National Action Plan for Mental Health 2006-2011: Progress Report 2006-07* (figure 12.36). Data are not comparable across jurisdictions. NSW, SA and Tasmania are not able to accurately track post-discharge follow up between hospitals and community service organisations, due to the lack of unique patient identifiers or data matching systems. For these jurisdictions, post discharge follow up is regarded to have occurred only when the community mental health contact was recorded by the discharging organisation. Results for these jurisdictions could appear ‘lower’ relative to jurisdictions that are able to track utilisation across services.

**Box 12.26 Community follow up for people within the first seven days of discharge from hospital**

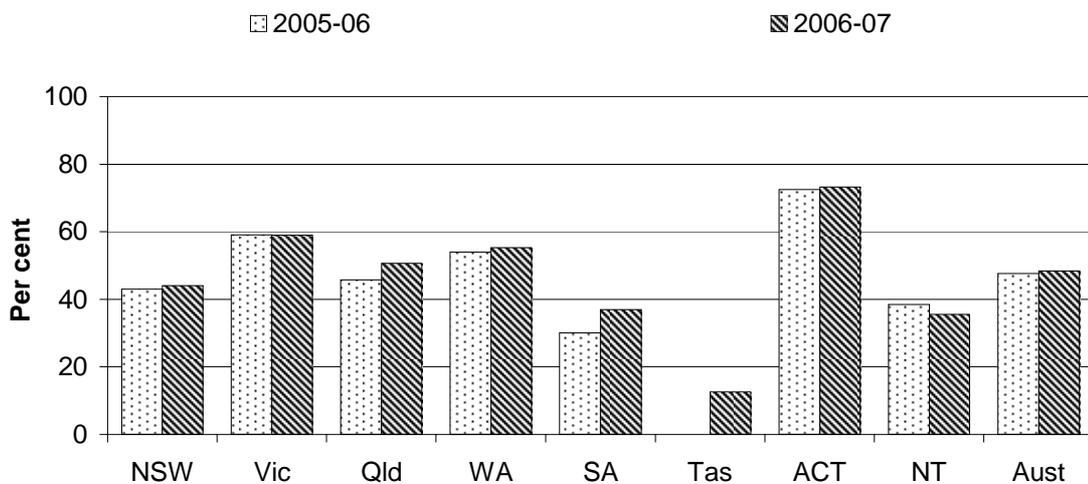
‘Community follow up for people within the first seven days of discharge from hospital’ is defined as the proportion of admitted patient overnight separations from State and Territory psychiatric inpatient services for which a community mental health contact was recorded in the seven days following separation.

A higher rate of community follow up within the first seven days of discharge from hospitals is desirable.

The indicator does not measure the frequency of contacts recorded in the seven days following separation. It also does not distinguish qualitative differences between phone and face-to-face community contacts.

Data reported for this indicator are not directly comparable.

**Figure 12.36 Community follow up for people within the first seven days of discharge from hospital<sup>a, b, c</sup>**



<sup>a</sup> Data for 2005-06 are for the full year, but for 2006-07, the data are based on the first 9 months of the year.

<sup>b</sup> Community mental health contacts counted for determining whether follow up occurred are restricted to those in which the consumer participated, except for the NT where the data includes all contacts (the NT has advised that the impact on the indicator is marginal). Contacts made on the day of discharge are also excluded. <sup>c</sup> Data are not comparable. NSW, SA and Tasmania do not have a unique patient identifier or data matching approaches. This could contribute to lower follow up rates for these jurisdictions.

Source: AHMC (2008) *Council of Australian Governments National Action Plan for Mental Health 2006-2011: Progress Report 2006-07*, Report prepared under the auspice of the Mental Health Standing Committee of the Australian Health Ministers’ Advisory Council; table 12A.49.

---

### *Quality — readmissions to hospital within 28 days of discharge*

'Readmissions to hospital within 28 days of discharge' is an indicator of the governments' objective to provide effective care and continuity of care in the delivery of mental health services (box 12.27). While inpatient services aim to provide treatment that enables individuals to return to the community as soon as possible, readmissions following a recent discharge may indicate that inpatient treatment was either incomplete or ineffective, or that follow up care was inadequate to maintain the person out of hospital (AHMC 2008).

Data for this indicator are reported in this chapter for the first time and are drawn from the *Council of Australian Governments National Action Plan for Mental Health 2006-2011: Progress Report 2006-07* (figure 12.37). Data are not comparable across jurisdictions. Due to the lack of unique patient identifiers or data matching systems, NSW, SA and Tasmania can only track readmission back to the same hospital from which the person was discharged. For these jurisdictions, readmissions are regarded to have occurred only when it is recorded by the discharging organisation. Results for these jurisdictions, could appear 'lower' relative to jurisdictions that are able to track utilisation across services.

#### **Box 12.27 Readmissions to hospital within 28 days of discharge**

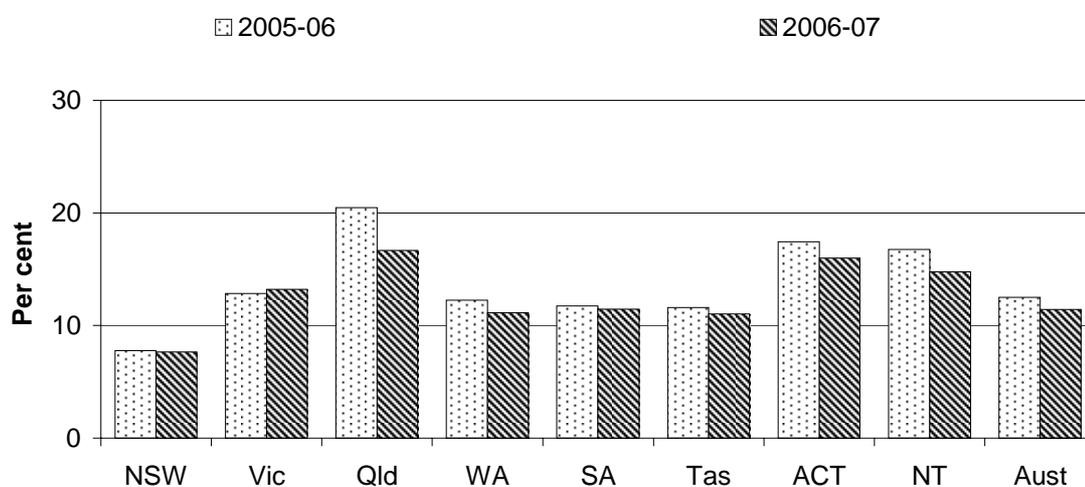
'Readmissions to hospital within 28 days of discharge' is defined as the proportion of admitted patient overnight separations from State and Territory psychiatric inpatient services that were followed by readmission to psychiatric inpatient services within 28 days of discharge.

A lower rate of readmissions to hospital within 28 days of discharge from hospitals is desirable. High rates may indicate deficiencies in hospital treatment or community follow up, or a combination of the two (NMHWG 2005).

Readmission rates are affected by other factors, such as the cyclic and episodic nature of some illnesses or other issues that are beyond the control of the mental health system (NMHWG 2005). The indicator includes all readmissions to hospital as data collection systems in most Australian mental health services do not include a reliable and consistent method to distinguish a planned from an unplanned admission.

Data reported for this indicator are not directly comparable.

Figure 12.37 Readmissions to hospital within 28 days of discharge<sup>a, b, c</sup>



<sup>a</sup> Data for 2005-06 are for the full year, but for 2006-07, the data are based on the first 9 months of the year.

<sup>b</sup> No distinction is made between planned and unplanned readmissions because data collection systems in most Australian mental health services do not include a reliable and consistent method to distinguish a planned from an unplanned admission to hospital. <sup>c</sup> Data are not comparable. NSW, SA and Tasmania do not have a unique patient identifier or data matching approaches. This could contribute to lower re-admission rates for these jurisdictions.

Source: AHMC (2008) *Council of Australian Governments National Action Plan for Mental Health 2006-2011: Progress Report 2006-07*, Report prepared under the auspice of the Mental Health Standing Committee of the Australian Health Ministers' Advisory Council; table 12A.50.

### *Quality — proportion of GPs with links to specialised mental health services*

The 'proportion of GPs with links to specialised public mental health services' is an indicator of governments' objective to provide continuity of care in the delivery of mental health services. GPs can be an important first point of contact for those with a mental illness (box 12.28).

#### **Box 12.28 Proportion of GPs with links to specialised public mental health services**

'Proportion of GPs with links to specialised public mental health services' is yet to be defined.

Data for this indicator were not available for the 2009 Report.

---

*Quality — proportion of private psychiatrists with links to public specialised mental health services*

The ‘proportion of private psychiatrists with links to public specialised mental health services’ is an indicator of governments’ objective to provide continuity of care in the delivery of mental health services (box 12.29).

**Box 12.29 Proportion of private psychiatrists with links to public specialised mental health services**

‘Proportion of private psychiatrists with links to public specialised mental health services’ is yet to be defined.

Data for this indicator were not available for the 2009 Report.

*Sustainability*

The Steering Committee has identified sustainability as an area for reporting but no indicators have yet been identified.

*Efficiency*

*Efficiency — cost per inpatient bed day*

‘Cost per inpatient bed day’ is an indicator of governments’ objective that mental health services be delivered in an efficient manner (box 12.30).

---

**Box 12.30 Cost per inpatient bed day**

'Cost per inpatient bed day' is defined as the cost of providing inpatient services per inpatient bed day. Reported real inpatient costs per day are disaggregated by inpatient program type (general mental health services, child and adolescent mental health services, older persons' mental health services and forensic mental health services) and hospital type (psychiatric hospitals (acute units), psychiatric hospitals (non-acute units) and general hospitals). Disaggregating these data improves comparability across jurisdictions.

A low cost per inpatient bed day can indicate efficiency, although caution must be used because the cost per inpatient bed day does not provide any information on the quality of service provided.

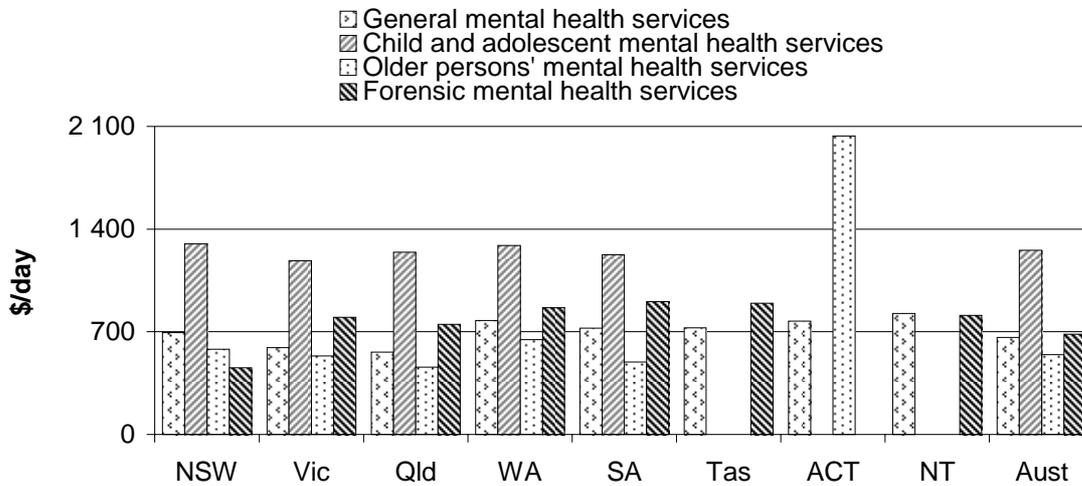
This indicator is affected by factors such as differences in the client mix and average length of stay. The client mix in inpatient settings may differ — for example, some jurisdictions treat a higher proportion of less complex patients in inpatient settings rather than in the community. Longer lengths of stay may also be associated with lower average inpatient day costs because the costs of admission, discharge and more intensive treatment early in a stay are spread over more days of care.

The most suitable indicator for mental health services would be to adjust the number of separations by the type and complexity of cases, to develop a cost per casemix adjusted separation similar to that presented for public hospitals (chapter 10), but casemix data for specialised mental health services are not available.

Data reported for this indicator are comparable.

Inpatient costs per day are presented in figures 12.38 (by inpatient target population) and 12.39 (by hospital type). Changes over time partly reflect institutional change in accordance with the NMHS (for example, a shift to the delivery of services in mainstream settings).

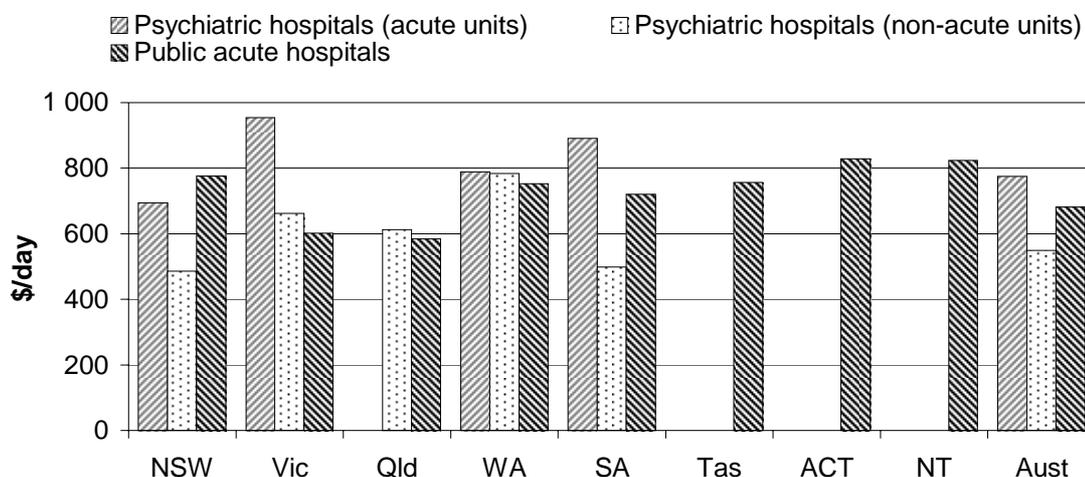
**Figure 12.38 Average recurrent cost per inpatient bed day, public hospitals, by target population, 2006-07<sup>a, b, c, d, e</sup>**



<sup>a</sup> Depreciation is excluded. <sup>b</sup> Costs are not adjusted for differences in the complexity of cases across jurisdictions and may reflect differences in the rate of institutional change (that is, the mainstreaming of mental health services). <sup>c</sup> Queensland advised that it provides older persons' mental health services using different service models, including campus-based and non-campus-based options. All service types are reported as older persons' mental health services, which may have the effect of lowering the average patient day costs compared with the costs of jurisdictions that report older persons' care units separately. <sup>d</sup> Tasmania and the NT do not provide, or cannot separately identify, child and adolescent mental health services or older persons' mental health services. <sup>e</sup> ACT average costs for older person's mental health services are based on a new 20 bed unit opened in March 2007. During 2006-07, only 6–10 beds operated due to issues related to staffing resources. This has artificially inflated the average cost of older persons' mental health services. The ACT does not have separate forensic or child and adolescent mental health inpatient services.

Source: AIHW (unpublished), derived from the *MHE NMDS*; table 12A.51.

Figure 12.39 **Average recurrent cost per inpatient bed day, public hospitals, by hospital type, 2006-07<sup>a, b, c, d, e</sup>**



**a** Depreciation is excluded. **b** Costs are not adjusted for differences in the complexity of cases across jurisdictions and may reflect differences in the rate of institutional change (that is, the mainstreaming of mental health services). **c** Mainstreaming has occurred at different rates in different jurisdictions. Victoria advised that the data for psychiatric hospitals comprise mainly forensic services, because nearly all general psychiatric treatment occurs in mainstreamed units in general acute hospitals. This means the client profile and service costs are very different from those of a jurisdiction in which general psychiatric treatment still occurs mostly in psychiatric hospitals. **d** Queensland data for general hospitals include costs associated with two extended treatment units that report through general acute hospitals. Queensland does not provide acute services in psychiatric hospitals. **e** Tasmania, the ACT and the NT do not have psychiatric hospitals.

Source: AIHW (unpublished), derived from the *MHE NMDS*; table 12A.52.

### *Efficiency — average cost for community-based residential care*

‘Average cost for community-based residential care’ is an indicator of governments’ objective that mental health services be delivered in an efficient manner (box 12.31).

The average recurrent cost to government per patient day for community residential services is presented in table 12.11. For general adult units in 2006-07, the average cost to government per patient day for 24 hour staffed community residential services was an estimated \$368 nationally. For non-24 hour staffed community residential units, the average cost to government per patient day was \$126 nationally.

### Box 12.31 Average cost for community-based residential care

'Average cost for community-based residential care' is defined as the cost of providing community-based residential care per patient day.

A low average cost can indicate efficiency, although caution must be used because the average cost does not provide any information on the quality of service provided.

These data are likely to be affected by institutional changes occurring as a result of the NMHS (for example, a shift to the delivery of services in mainstream settings). In addition, differences across jurisdictions in the types of patient admitted to community residential care affect average costs in these facilities. Average recurrent costs to government per patient day for these services are reported for both the care of adults and the care of older people. The distinction is made to reflect the differing unit costs of treating the two groups.

Data reported for this indicator are not directly comparable.

For jurisdictions that had community-based older persons' care units in 2006-07, the average recurrent cost to government per patient day for 24 hour staffed community residential services was \$297 nationally (table 12.11).

Table 12.11 Average recurrent cost to government per patient day for community residential services, 2006-07<sup>a, b</sup>

	NSW	Vic	Qld <sup>c</sup>	WA	SA	Tas	ACT	NT	Aust
General adult units									
24 hour staffed units	269	421	..	400	203	296	499	..	368
Non-24 hour staffed units	82	151	..	130	270	..	106	242	126
Older persons' care units									
24 hour staffed units	352	280	..	..	..	437	163	..	297
Non-24 hour staffed units	280	516	..	..	..	..	..	..	345

<sup>a</sup> Depreciation is excluded. <sup>b</sup> Costs are not adjusted for differences in the complexity of cases across jurisdictions and may reflect differences in the rate of institutional change (that is, the mainstreaming of mental health services). <sup>c</sup> Queensland does not fund community residential services, although it funds a number of campus-based and non-campus-based extended treatment services. .. Not applicable.

Source: AIHW (unpublished), derived from the *MHE NMDS*; table 12A.53.

### Efficiency — average cost for ambulatory care

'Average cost for ambulatory care' is an indicator of governments' objective that mental health services be delivered in an efficient manner (box 12.32).

---

**Box 12.32 Average cost for ambulatory care**

'Average cost for ambulatory care' is defined as the cost of providing ambulatory care per treated patient in the community.

A low average cost can indicate efficiency, although caution must be used because the average cost does not provide any information on the quality of service provided.

The provision of ambulatory treatment, rehabilitation and support to non-inpatients, and post-acute care are important components of service provision, and the Steering Committee has identified continued improvement in reporting in these areas as a priority.

Data reported for this indicator are not directly comparable.

Unit costs (dollars per treated patient in the community) for 2006-07 are reported for all states and territories. However, this indicator is considered to be of insufficient quality for use in any form of comparative analysis across jurisdictions for a number of reasons. First, information about service costs across jurisdictions is incomplete or inconsistent (for example, depreciation is not measured consistently across states and territories). Second, the absence of unique patient identifiers in many jurisdictions means clients who use mental health services other than their usual service may be counted twice. This double counting may artificially reduce average costs in some states or territories. Victoria, WA, the ACT and the NT have statewide systems of unique identifiers, so the potential for overcounting of patients in these jurisdictions is relatively low compared with that in other jurisdictions. Third, differences across jurisdictions in the complexity of cases treated, the service options available for treatment and the admission practices adopted reduce the comparability of data across states and territories.

- NSW reported ambulatory care unit costs of \$1552 per treated patient in the community in 2006-07, with 3.9 per cent of services (accounting for 1.4 per cent of expenditure) not reporting (table 12A.54).
- Victoria reported ambulatory care unit costs of \$4772, with 10.7 per cent of services (accounting for 1.8 per cent of expenditure) not reporting (table 12A.55).
- Queensland reported ambulatory care unit costs of \$2366, with all services reporting (table 12A.56).
- WA reported ambulatory care unit costs of \$2936, with all services reporting (table 12A.57).
- SA reported ambulatory care unit costs of \$1690, with 2.4 per cent of services (accounting for 1.4 per cent of expenditure) not reporting (table 12A.58).

- 
- Tasmania reported ambulatory care unit costs of \$2854 with 4.8 per cent of services (accounting for 0.7 per cent of expenditure) not reporting (table 12A.59).
  - The ACT reported ambulatory care unit costs of \$2554, with all services reporting (table 12A.60).
  - The NT reported ambulatory care unit costs of \$2715, with all services reporting (table 12A.61).
  - Across Australia, average ambulatory care unit costs per treated patient in the community were \$2308, with 4.7 per cent of services (accounting for 1.0 per cent of expenditure) not reporting (table 12A.62).

### *Outcomes*

Outcomes are the impact of services on the status of an individual or group (while outputs are the actual services delivered) (see chapter 1, section 1.5).

The output indicators reported above have focussed on State and Territory governments' funded specialised mental health services. The outcome indicators identified and/or reported here are not direct measures of the outcomes for people who access these services. The outcomes identified and/or reported here tend to reflect the performance of governments (including the mental health sector) against the broad objectives of the NMHS.

The *National Mental Health Plan 2003—2008* notes that most of the risk and protective factors for mental health problems, mental illness and suicide lie outside the ambit of mental health services, in sectors that impact on the daily lives of individuals and communities (Australian Health Ministers 2003). Changes to these factors usually require long-term sustained efforts across many sectors of the community and government, and cannot be achieved by the mental health sector alone. The Plan identifies that the mental health sector must form partnerships with other sectors in order to develop successful interventions that favourably shift risk and protective factors (Australian Health Ministers 2003).

### *Prevalence of mental illnesses*

'Prevalence of mental illnesses' is an indicator of governments' objective under the NMHS to prevent and reduce mental health problems where possible (box 12.33). Not all mental illnesses are preventable and a reduction of impact of symptoms and a good quality of life will be a good outcome for many people with a mental illness.

---

**Box 12.33 Prevalence of mental illnesses**

'Prevalence of mental illnesses' is defined as the proportion of the total population who have a mental illness. Data on the prevalence of selected mental illnesses are available from the ABS 2007 Survey of Mental Health and Wellbeing and are reported in the profile section. They are not reported as an indicator as the Survey is conducted infrequently and is designed to provide reliable estimates only at the national level (for the smaller states and the territories data are subject to large standard errors). Data are available for the states with larger populations.

Data for this indicator were not available for the 2009 Report (see above paragraph).

*Mortality due to suicide*

'Mortality due to suicide' is an indicator of governments' objective under the NMHS to prevent mental health problems, mental illness and suicide, and identify and intervene early with people at risk (box 12.34). People with a mental illness are at a higher risk of suicide than are the general population. (They are also at a higher risk of death from other causes, such as cardiovascular disease.)

**Box 12.34 Mortality due to suicide**

Mortality due to suicide' is defined as the suicide rate per 100 000 people for all people, for males and females, for people of different ages (including those aged 15–24 years), people living in capital cities, people living in other urban areas, people living in rural areas and Indigenous people.

While the performance of mental health services contributes to reducing suicides, other government services also play a significant role. Public mental health programs are primarily concerned with providing treatment and support services for individual clients affected by severe mental illness, some of whom have either attempted, or indicated the intention, to commit suicide. Suicide prevention targeted at the wider population is also addressed through the initiatives of other government departments, non-government organisations and other special interest groups. Any impact on suicide rates, therefore, will be a result of a coordinated response across a range of collaborating agencies, including police, education, housing, justice and community services agencies.

(Continued on next page)

---

**Box 12.34 (Continued)**

In addition, many factors outside the control of mental health services may influence a person's decision to commit suicide. These include environmental, sociocultural and economic risk factors — for example, adverse childhood experiences (such as sexual abuse) can increase the risk of suicide, particularly in adolescents and young adults. Alcohol and other drugs are also often associated with an increased risk of suicidal behaviour. Other factors that can influence suicide rates include economic growth rates, which affect unemployment rates and social disadvantage. Often, a combination of these factors can increase the risk of suicidal behaviour.

Data reported for this indicator are comparable.

A number of factors impact on the quality of suicide data.

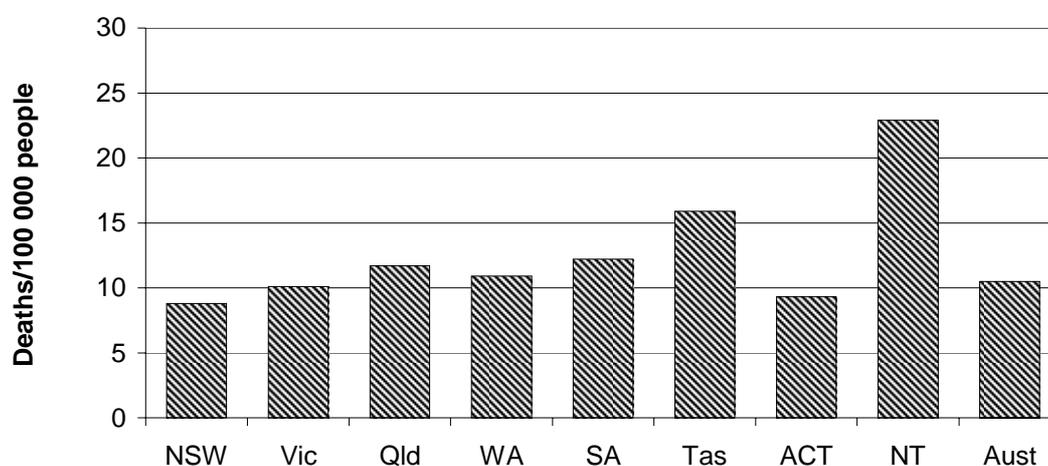
- Coroners may take different approaches to the determination of intent. Determination of intent of a death relates to whether the death results from intentional self harm, accident, homicide or undetermined intent.
  - In general, coroners may be reluctant to determine suicidal intent (particularly in children and young people). In some cases, no statement of intent will be made by a coroner (ABS 2007).
  - For deaths where it is difficult to determine suicidal intent (for example, single vehicle accidents or drownings), the burden of proof needed for the coroner to establish that the death was suicide may make a finding of suicide less likely (ABS 2007).
- Incomplete information is available on the National Coronial Information System when the ABS compiles the *Causes of Deaths* data (ABS 2007).
  - Not all coronial cases are finalised (that is, closed) when *Causes of Deaths* data are compiled. In order to classify a death as suicide (intentional self-harm) specific documentation from a medical or legal authority need to be available regarding the self-inflicted nature and suicidal intent of the incident. If this is not available, then the death must be classified as accidental. The case generally needs to be closed to code a suicide as such, unless there is conclusive information in the police report or the autopsy report to show that the death was intentional (ABS 2007). Any reported decline in the number of deaths due to suicide, therefore, may reflect an increase in open coroners' cases when the statistics were finalised.

In the period 2002–2006, 10 533 deaths by suicide were recorded in Australia (table 12A.65) — equivalent to 10.5 deaths per 100 000 people (figure 12.40). The rate for males (16.5 per 100 000 males) was almost four times that for females

(4.5 per 100 000 females) in that period — a ratio that was relatively constant over all age groups, except for those aged over 85 years where the male suicide rate was over eight times the female rate (figure 12.41). Table 12A.66 shows suicide death rates per 100 000 people aged 15–24 years for all states and territories.

Nationally the suicide rate in the period 2002–2006 was higher in rural areas. There were 9.5 suicides per 100 000 people in capital cities and 10.9 suicides per 100 000 people in other urban areas, compared with 13.5 suicides per 100 000 people in rural areas in Australia (figure 12.42).

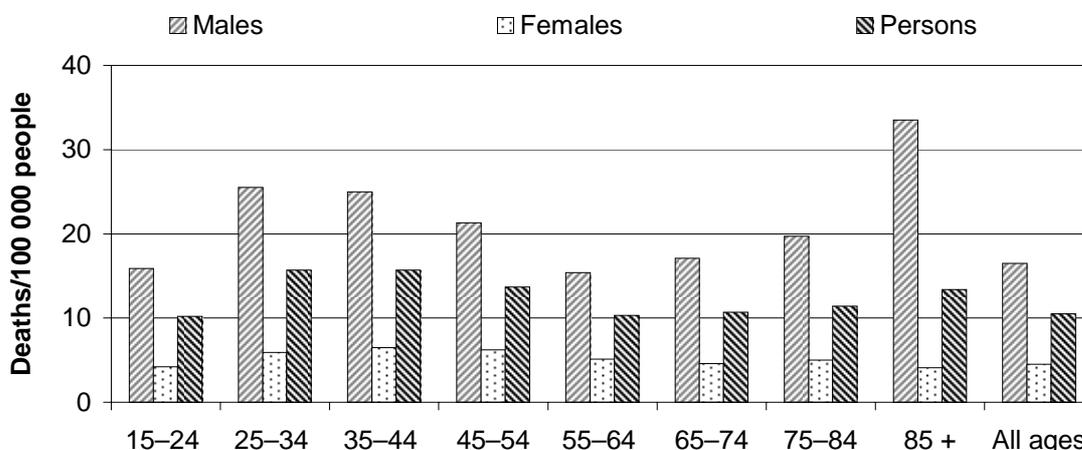
Figure 12.40 **Suicide rates, 2002–2006<sup>a, b</sup>**



<sup>a</sup> By year of registration of death. Year-to-year variation can be influenced by coronial workloads. <sup>b</sup> The death rate is age standardised to the mid-year 2001 population.

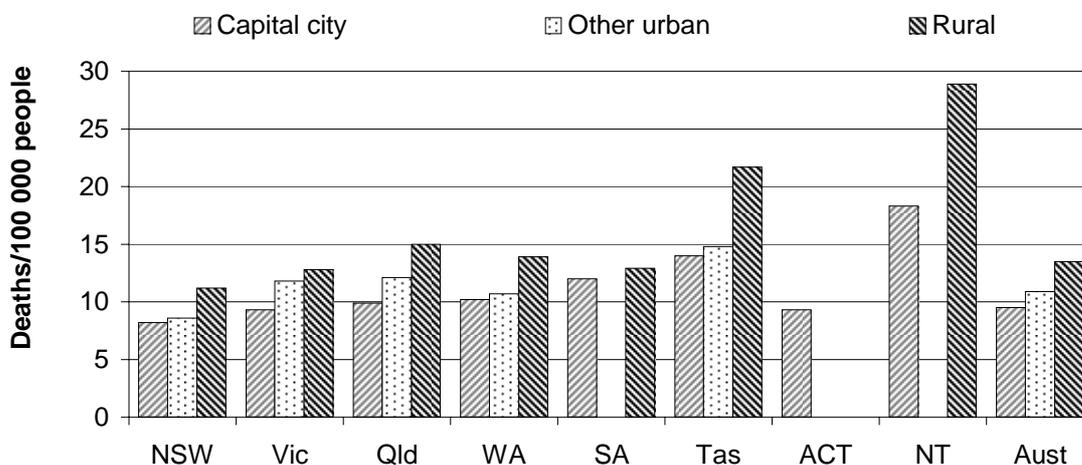
Source: ABS (unpublished), derived from *Causes of Deaths, Australia*; Cat. no. 3303.0; table 12A.65.

Figure 12.41 Suicide rates, by age and gender, 2002–2006<sup>a, b, c</sup>



<sup>a</sup> By year of registration of death. Year-to-year variation can be influenced by coronial workloads. <sup>b</sup> The death rate is age standardised to the mid-year 2001 population. <sup>c</sup> Age specific death rates are calculated as the number of suicides for an age group per 100 000 population in the same age group, for the period 2002–2006.   
 Source: ABS (unpublished), derived from *Causes of Deaths, Australia*; Cat. no. 3303.0; table 12A.64.

Figure 12.42 Suicide rates, by area, 2002–2006<sup>a, b, c, d</sup>



<sup>a</sup> Area categories are defined as follows: ‘capital cities’ — comprising capital city statistical divisions; ‘urban centres’ — based on ‘statistical districts’ that are urban centres with population >25 000 people, excluding capital city statistical divisions, (three statistical districts cross state boundaries and have to be split across the relevant states/territories — Albury–Wodonga, Canberra–Queanbeyan and Gold Coast–Tweed); ‘rural’ — balance of State, that is all areas other than capital cities and urban centres. <sup>b</sup> Death rate is age standardised to the mid-year 2001 population. <sup>c</sup> By year of registration of death. <sup>d</sup> SA, the ACT and the NT do not have any ‘other urban’ areas. The ACT does not have ‘rural’ areas.

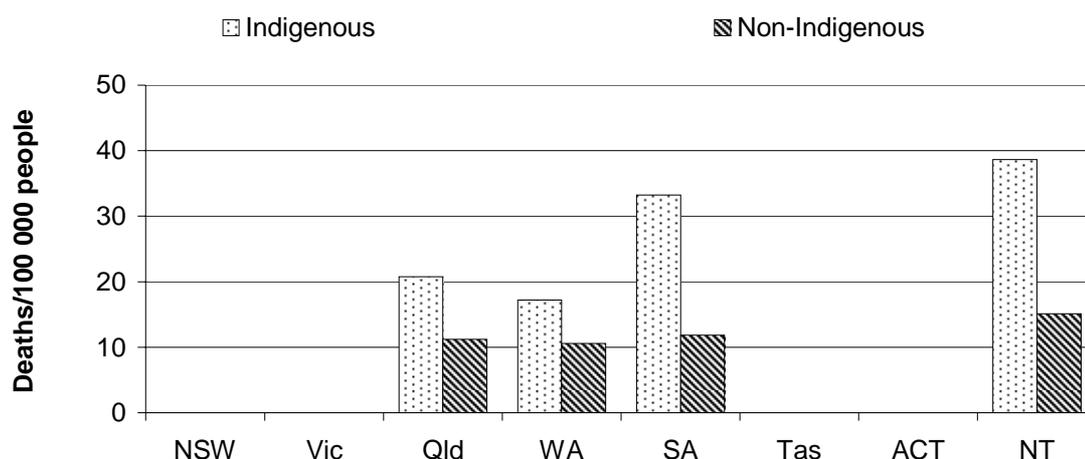
Source: ABS (unpublished), derived from *Causes of Deaths, Australia*; Cat. no. 3303.0; table 12A.67.

Tables 12A.63 and 12A.65–67 contain single year time series suicide data.

The Indigenous suicide rate is presented for the period 2002–2006 for four jurisdictions: Queensland, WA, SA and the NT (figure 12.43). After adjusting for age differences between populations, the suicide rates for Indigenous people for the period 2002–2006 in the jurisdictions for which data are presented are considerably higher than the corresponding rates for non-Indigenous people.

Care needs to be taken when interpreting these data because data for Indigenous people are incomplete and data for some jurisdictions are not published. Indigenous people are not always accurately identified in administrative collections (such as hospital records, and birth and death registrations) due to definition variations, different data collection methods and failure to record Indigenous status. The rate calculations have not been adjusted for differences in the completeness of identification of Indigenous deaths across jurisdictions. The ‘Health preface’ discusses the quality of Indigenous mortality and other data.

Figure 12.43 **Suicide rates, by Indigenous status, 2002–2006<sup>a, b</sup>**



<sup>a</sup> Indigenous population figures are based on ABS *Experimental Projections, Aboriginal and Torres Strait Islander Australians* (low series, 2001 base). There are no comparable population data for the non-Indigenous population. The non-Indigenous population figures are based on data derived by subtracting Indigenous population projections from total population estimates and should be used with care. Rates are calculated on an age standardised basis. <sup>b</sup> Data for NSW, Victoria, Tasmania and the ACT are not reported due to varying coverage across states and territories in the identification of Indigenous deaths in death registrations.

Source: ABS (unpublished), derived from *Causes of Deaths, Australia*; Cat. no. 3303.0; table 12A.68.

### Quality of life

‘Quality of life’ is an indicator of governments’ objective to prevent and reduce mental health problems so as to improve the quality of life for people with a mental illness (box 12.35).

---

**Box 12.35 Quality of life**

'Quality of life' is yet to be defined.

Data for this indicator were not available for the 2009 Report.

## 12.5 Future directions in performance reporting

### Reform of Specific Purpose Payments

In December 2007, the Council of Australian Governments (COAG) agreed to reform Specific Purpose Payments (SPPs). SPPs are financial agreements between the Australian Government and State and Territory governments involving a contribution by the Australian Government to the funding of services which are considered a joint Australian and State and Territory government responsibility. The Australian Health Care Agreement was such an SPP.

At its 29 November 2008 meeting, COAG agreed to six new National Agreements, five of which are associated with a National SPP. In the area of Health and Ageing, there is a National Health Care Agreement associated with the National Health Care SPP (COAG November 2008). Under the reforms, the National Health Care Agreement contains the objectives, outcomes, outputs and performance indicators for Health and Ageing services. The performance of governments in achieving these mutually agreed outcomes will be assessed by the COAG Reform Council (CRC). The Steering Committee has been requested by COAG to provide the SPP performance information to the CRC (COAG July 2008).

The National Agreements/SPPs will be supplemented by a range of National Partnerships (NPs): project, facilitation and reward agreements. Funding for NPs may be conditional on states and territories meeting agreed milestones and performance benchmarks.

The Steering Committee and the Health Working Group will ensure that reporting in this chapter reflects the COAG priorities identified in the National Health Care Agreement, National Health Care SPP and relevant NPs.

---

## **Breast cancer**

Key challenges for improving reporting of breast cancer include:

- expanding reporting on intervention and treatment and overall performance
- further developing indicators of outcomes
- improving the measurement and comparability of existing indicators.

Existing performance data for breast cancer management place more emphasis on the performance of State and Territory BreastScreen Australia programs than on the treatment and ongoing management of breast cancer. This emphasis is largely due to the relative availability of breast cancer screening data across jurisdictions. The Steering Committee aims to expand reporting to incorporate treatment and clinical outcomes data.

An evaluation of BreastScreen Australia is currently underway. The evaluation will address ongoing and emerging issues affecting the program, and identify opportunities for overall improvement. The evaluation is expected to be completed in 2009. The evaluation will examine benefits of the Program in terms of reduction in breast cancer death rates as well as risks associated with screening. It will consider overarching policy issues such as age range, screening interval and the appropriate management of women at higher risk of breast cancer. The evaluation will also consider the evidence for and use of new technologies, including capacity and workforce issues and will review the current governance and management structures, including the reporting and funding arrangements. The Steering Committee will draw upon this evaluation in the future development of indicators for this report.

## **Mental health**

Key challenges for improving the reporting of mental health management are similar to those of previous years:

- improving the reporting of effectiveness and efficiency indicators for Indigenous, rural/remote and other special needs groups
- revising the performance indicator framework to ensure reporting remains consistent with government policy objectives for mental health
- improving the reporting of effectiveness/efficiency indicators for community-based mental health care.

A set of key performance indicators for use in Australia's public sector mental health services has been developed, based on the National Health Performance

---

Framework and linked to the strategic directions of the National Mental Health Plan 2003–2008. Further work is required to develop indicators and data collections in the areas of safety and responsiveness of services. This will then provide data covering all the domains of the National Health Performance Framework. Further information can be found in National Mental Health Working Group Information Strategy Committee Performance Indicator Drafting Group (2005).

## **12.6 Jurisdictions' comments**

This section provides comments from each jurisdiction on the services covered in this section of the Report. Appendix A contains data that may assist in interpreting the performance indicators presented in this chapter. These data cover a range of demographic and geographic characteristics, including age profile, geographic distribution of the population, income levels, education levels, tenure of dwellings and cultural heritage (such as Indigenous and ethnic status).

---

## Australian Government comments

“

Through the Council of Australian Governments (COAG), the Commonwealth, states and territories are working together to develop initiatives in priority health reform areas. A collaborative reform agenda is being developed across a range of areas, including Indigenous health, hospital reform and the health workforce, and prevention for further COAG consideration.

COAG is overseeing major reform of Commonwealth/State financial arrangements replacing a large number of specific purpose payments with a single intergovernmental agreement and establishment of a new health agreement with a new accountability framework. The new framework will identify a number of performance indicators enabling different services across jurisdictions to be compared and to provide decision makers and administrators with better data for funding and policy decisions. COAG will consider funding arrangements for the new health agreement at the end of 2008.

Jurisdictions are reviewing roles and responsibilities of respective levels of government for aged care and disability services as well as certain mental health services.

The Australian Government has also established a National Health and Hospitals Reform Commission to develop a long-term health reform plan for a modern Australia.

Australian Government funding commitments in the 2008 Budget will contribute to further reforms of the health system. These include:

- a \$10 billion Health and Hospitals Fund to support national health infrastructure;
- \$600 million over four years to states and territories for the Elective Surgery Waiting List Reduction Plan; and
- funding of up to \$275 million, for GP Super Clinics, will be rolled out progressively over the next 5 years from 2007-08.

A National Preventative Health Taskforce has provided the Australian Government with advice on the framework for the Preventative Health Partnerships between it and the States and Territories. The taskforce is developing a strategy to tackle the burden of disease in areas of obesity, alcohol and tobacco use.

Work is progressing on a National Primary Health Care Strategy, to be presented to the Minister for Health and Ageing in mid-2009. The Strategy is expected to deliver better frontline care to families across Australia.

Following the Prime Minister's apology to Australia's Indigenous Peoples earlier this year, particular emphasis is on reducing the 17 year gap in life expectancy between the Indigenous peoples and other Australians. The Australian Government will invest \$3.1 billion in Indigenous health over the next four years.

”

---

### **New South Wales Government comments**

“

The NSW Health system faces many challenges in providing quality health services for the people of New South Wales, no matter where they live in the state. These challenges include an ageing population, providing care for the chronically ill, delivering a sustainable workforce, providing better services for those with mental illness, meeting the rise in demand for services and increasing costs of medical technology.

In response to these challenges, the NSW health system developed the State Health Plan — Towards 2010, which sets seven strategic directions for the future and clearly lays out the health priorities during this time. These priorities form an integral part of the NSW Government's State Plan, with NSW Health being the lead agency for achieving five of these:

- improved access to quality health care
- improved survival rates and quality of life for people with potentially fatal or chronic illness through improvements in health care
- improved health through reduced obesity, smoking, illicit drug use and risk drinking
- improved outcomes in mental health
- reduced avoidable hospital admissions.

The seven strategic directions identified in the NSW State Health Plan are:

- make prevention everybody's business
- create better experiences for people using the health system
- strengthen primary health and continuing care in the community
- build regional partnerships for health
- make smart choices about the costs and benefits of health and health support services
- build a sustainable health workforce
- be ready for new risks and opportunities.

Together these priorities and strategic directions will help guide the development and implementation of strategies to ensure the provision of high quality services to the population of NSW.

”

---

## Victorian Government comments

“

The Victorian Government strives to provide high quality, accessible health services to protect the health of Victorians and continues to support the ongoing development and monitoring of performance indicators in the Report on Government Services.

Increases in demand for services comes from many factors including a growing population, its relative ageing, and the increasing variety of treatment modalities made possible by new technology.

Funding has been provided in 2008-09 to meet systemic growth in new patient demand (including maternity services) by increasing the capacity of health services. Additional funding has also been provided in 2008-09 to increase perinatal support and enable a comprehensive statewide approach to identification of and responses to mental health problems among new parents as part of a new national program.

A focus has been placed on elective surgery activity and reducing long waits for patients. A commitment to addressing demand for elective surgery has been made through substantial funding in addition to the contribution made by the Commonwealth Government as part of the Elective Surgery Waiting List Reduction Plan.

The Victorian Government released a consultation paper during 2008 on reforming the State's mental health system, *Because Mental Health Matters*. The proposals set out in the paper aim to guide the development of the State's mental health service system over the next 10 years, including improving the accessibility of services, expanding prevention and early intervention services, reforming system governance and strengthening the focus on client and service system outcomes. A commitment to develop and report on a wider range of system performance and outcome measures has also been made.

Victoria is developing its community based primary health care services with a greater emphasis on area based planning. This should facilitate better service planning and population health actions such as the delivery of integrated care for those with chronic and complex conditions, and assist in reaching vulnerable populations particularly indigenous groups, refugees and those with the poorest health status. These services will be underpinned by the self-management of health and wellbeing needs, while ensuring that tertiary services are high quality, are accessible in a timely way, and are linked with community based services at the critical stages of entry to or exit from tertiary level care. The focus is on tackling cancer and addressing the rising prevalence of chronic diseases such as diabetes.

The challenge is also to continue to deliver world-class public hospitals, to keep reducing waiting times and be innovative in the way we deliver services and connect with other health services in the community.

”

---

## Queensland Government comments

“

The Queensland Government's plan for Tomorrow's Queensland — Q2 — sets long-term targets to achieve its ambition of making Queenslanders Australia's healthiest people by 2020. Through Q2, Queensland Health is implementing strategies to meet targets of cutting by one-third obesity, smoking, heavy drinking and unsafe sun exposure; and achieving the shortest public hospital waiting times in Australia.

Queensland hospital emergency department attendances have increased by 5.8 per cent and hospital admissions by 5.9 per cent over the past 12 months, in part due to an ageing population and a shortage of General Practitioners. However, Queensland has successfully reduced the waiting times for elective surgery to the best in the nation and in 2008-09 will introduce a Whole-of-Hospital Plan to further reduce Emergency Department and hospital admission waiting times.

In addition to reducing obesity, smoking, heavy drinking and unsafe sun exposure and public hospital waiting times, the Queensland Government through *Making Queenslanders Australia's Healthiest People: Advancing Health Action*, has set the following additional targets to address the key challenges impacting on the health system in Queensland:

- provide access to quality, best practice maternity and early childhood services for Queensland mothers no matter where they live
- provide accessible public health services for all Queenslanders living with a severe mental illness
- close the gap in health outcomes for Indigenous, and rural and remote Queenslanders.

The Queensland Government's \$10 billion Health Action Plan: Building a better health service for Queensland, which commenced in 2005, has laid the foundation for a better public health system. Halfway into the plan, Queensland Health now employs an extra 5834 nurses, 1675 doctors and 2030 allied health workers, including radiographers, physiotherapists, speech therapists and dieticians.

In 2008-09, the Queensland Health budget will grow to \$8.3 billion, an increase of 16.8 per cent on last year's budget, including \$114.7 million in new recurrent funding and \$330.9 million in additional capital funding.

In 2008-09, significant investment in hospital redevelopments will continue including the new Gold Coast University Hospital, Sunshine Coast Hospital, the Queensland Children's Hospital and facilities in Cairns, Mackay and Mt Isa.

In August 2008, Queensland Health announced a restructure that will remove a layer of bureaucracy and deliver more services, strengthening accountability for managers and redirecting savings of at least \$5 million to patient care.

”

---

## Western Australian Government comments

“

The WA Department of Health is committed to ensuring healthier, longer and better lives for all Western Australians, through the provision of a safe, high quality, accountable and sustainable health care system. In 2007-08 significant progress has been made in our six priority areas.

*Healthy Workforce* — A number of initiatives to boost the skills and sustainability of the health workforce were introduced. These include attraction of experienced nurses back into the profession, training for the Assistant in Nursing role and a pilot program of community residencies for junior doctors. In 2008, a record 586 new registered nursing graduates commenced with WA Health — an increase of 110 on the 2007 recruitment year.

*Healthy Hospitals, Health Services and Infrastructure* — The major program of infrastructure development and improvement continued. Projects completed include the new State Major Trauma Unit at Royal Perth Hospital, Fitzroy Crossing Hospital, Morawa Health Centre and construction of supported, community-based mental health accommodation at five sites across WA.

*Healthy Partnerships* — Innovative partnerships are being developed with NGOs, private sector providers, community groups and other government agencies to improve service delivery, boost research and development and maximise capital investment. Significant developments were made in 2007-08 in areas including genomics and Aboriginal health.

*Healthy Communities* — WA Health has continued to work towards improving lifestyles, preventing ill-health and implementing long term, integrated health promotion campaigns. Initiatives have been established to combat childhood obesity, and perinatal and postnatal depression. The Department also implemented the Australian Better Health Initiative at several WA locations and established licensing infrastructure for tobacco retailers and wholesalers.

*Healthy Resources* — The Department continues to deliver robust resource administration, planning and management practices to oversee and support the area health services. Advances in 2007-08 included upgrades to emergency communication facilities at rural hospitals and installation of video-conferencing equipment to allow the expansion of tele-psychiatry services in an additional 58 centres across WA.

*Healthy Leadership* — The Institute for Healthy Leadership was established in July 2007 and has commissioned a number of programs to develop WA Health's future leaders. These include the Emerging Leaders Development Program and the Delivering the Future Leadership Development Program, which target senior managers and potential future directors and executive directors and provide high-level leadership training. Nine graduate officers were recruited and commenced with WA Health in February 2008.

”

---

## South Australian Government comments

“

The South Australian Government released its Health Care Plan in June 2007, announcing a major step toward providing this State with one of the most integrated health systems in Australia. The Plan outlines the most significant single investment in health care in South Australia's history. The Government will build the 800-bed Marjorie Jackson-Nelson Hospital, a state-of-the-art facility in Adelaide's city centre, that will become Australia's most advanced hospital. The 10-year plan also proposes new investment in other major hospitals, promotes healthy lifestyles and illness prevention through new GP Plus Health Care Centres, and aims to make South Australia the best place for health professionals to work.

SA Health has progressed toward achieving a number of key objectives. These objectives relate to improvements in health infrastructure, programs and services, changes in health system governance and setting an agenda for health research as part of an integrated strategy to reform SA's health care system.

Engaging in governance reform has been a critical part of SA Health's agenda with the implementation of the *Health Care Act 2008* on 1 July 2008. This legislation has provided for a restructure of the governance arrangements of SA Health, as well as providing for the creation of South Australia's Health Performance Council and a range of Health Advisory Councils that will play an important role in providing advice to the Government of South Australia on health care needs and priorities.

In the 2007-08 financial year, \$154.4 million was spent on redeveloping hospital and health service infrastructure. This includes the development of a preliminary master plan for the Marjorie Jackson-Nelson Hospital, the Stage B Lyell McEwin Hospital Redevelopment to provide new inpatient accommodation and extend support facilities, progress on the redevelopment of both The Queen Elizabeth Hospital and Flinders Medical Centre, as well as the refurbishment of existing wards at the Royal Adelaide Hospital.

The release of the Glenside Campus Master Plan has been a significant step towards SA Health's goal of reforming mental health care in South Australia. New facilities will be integrated with public open spaces and cultural and commercial precincts.

Another significant step in the area of mental health care was the release of a draft Mental Health Bill for consultation. The Bill sets out a number of positive changes to improve the existing *Mental Health Act 1993* and reflects national and international obligations for the protection of persons with a mental illness. Feedback on the Bill was received and incorporated into the development of the Mental Health Bill 2008, which will be debated in Parliament.

”

---

## Tasmanian Government comments

“

The Tasmanian Government is building a health and human services system that will withstand the heavy demands of coming decades, including the future impact of demographic change, and provide the care and assistance Tasmanians need. The Government's reform agenda is vital to the future health and wellbeing of the Tasmanian Community. It includes putting *Tasmania's Health Plan* into action and implementing evidence-based changes to children and family services, disability services and housing, with the aim of increasing social inclusion and improving health and social outcomes in the State.

Implementation of *Tasmania's Health Plan* involves more than 100 projects, many of which will be put in place during the next two years and others within five years. Information about the implementation of projects is available through the *Tasmania's Health Plan* internet site ([www.dhhs.tas.gov.au/thp](http://www.dhhs.tas.gov.au/thp)).

The Service Capability Framework will develop and establish standard governance, funding and accountability arrangements for regional and state-wide services. The Tasmanian Clinical Advisory Council is being established to oversee all of the Statewide Clinical Networks that are being developed.

Planning is now well underway for the new Royal Hobart Hospital which will support the sustainable delivery of contemporary acute services and be flexible in its response to future health needs. Other initiatives for 2009 include additional nurses in acute care hospitals, developing and implementing *Tasmania's Elective Surgery Improvement Plan*, improving health information technology for better patient care, implementing a series of capital investment projects and improving access and service provision for acute patient transport and medical retrieval.

Oral Health Services will continue to implement the Better Dental Care Package with the further recruitment of dentists and the construction of dental units within acute hospitals in all regions of Tasmania. There will also be further development of the client information management system enabling enhanced reporting of both service activity and health indicators.

The *Mental Health Services Strategic Plan 2006–11* continues to lead service reform, including the introduction of an assertive case management model and a focus on working in partnership with others to address the mental health needs of Tasmania's population. Better service integration will result from a realignment of services: Mental Health Services now incorporates alcohol and drug, correctional primary health and forensic mental health services. In responding to alcohol and drug use in Tasmania, the State Government has allocated significant additional funding to alcohol, tobacco and other drug service reform over the next four years.

BreastScreen Tasmania is experiencing the impact of the ageing population which increases the size of its target group. Against a background of workforce shortages, there has been a decrease in the actual number of women screened for this reporting period as well as declining participation in recent years.

”

---

## Australian Capital Territory Government comments

“ The ACT Government provides health services to local residents through two major hospitals: The Canberra Hospital and Calvary Public Hospital (via a contractual agreement with the Little Company of Mary Health Care ACT). These public hospitals provide the full range of acute care, including inpatient, outpatient and emergency department services. Both hospitals are teaching hospitals in cooperation with the Australian National University’s Medical School and University of Canberra. The Canberra Hospital is the major trauma referral hospital for the ACT and surrounding of NSW with a quarter of public hospital separations were residents of New South Wales.

In 2006, ACT Health published its *Corporate Plan 2006–2010* which covers all the areas administered by ACT Health. It brings together into one central document the portfolio’s key performance areas as well as its performance measures. The Plan clarifies the overall direction for ACT Health’s operation and facilitates a simplified reporting structure.

The year 2006-07 demonstrated that ACT public hospitals have made considerable strides in working to meet the ACT Government’s objectives of reducing the ACT’s average cost of hospital services to within 10 per cent of the national average. The ACT’s 2005-06 average cost of about 15 per cent above the national average has been reduced to 13 per cent above the national average. At the same time considerable additional investment in elective surgery has improved access to surgery for people with extended waiting times, while also ensuring that those patient with more urgent clinical needs are seen on time. The increase in the median waiting time (days waited at 50th percentile) for people admitted to surgery in 2006-07 — up to 63 days from 61 days in 2005-06 — is a further demonstration of the effectiveness of the ACT Government’s strategy to address the number of people waiting longer than standard waiting times for a surgery. As ACT Health provides additional surgery for people who are waiting long time for a surgery — the reported median waiting time for all patients will increase.

As part of ACT Health’s commitment to provide service models that improve the patient’s journey from acute care, post-acute care, rehabilitation and community-based follow up, during 2006-07 ACT Health commissioned a 60-bed Old Persons Unit at Calvary. This unit incorporates an Older Persons Mental Health Unit and sub-acute rehabilitation and geriatric medicine units.

Continuous improvement in the quality of our health services is a high priority for ACT Health. In 2006-07 each of our clinical divisions (TCH, Calvary Public Hospital, Community Health, Mental Health, the Aged Care Rehabilitation Service and the Capital Region Cancer Service) underwent its respective accreditation phase under the Australian Council on Healthcare Standards. The outcome is that all of our services remain fully accredited with ACHS. ACT Health’s corporate office also underwent accreditation and received full accreditation status. From November 2006, ACT Health is pursuing accreditation as a single entity, rather than on a division-by-division basis.”

---

## Northern Territory Government comments

“

The Department of Health and Families (DHF), is the major provider and funding source for hospital and community services as well as a substantial portion of primary care in the Territory. Service integration is integral to providing coordinated care between public hospitals and a network of 104 government and non government community health centres. The NT population is 215 000, a third of whom are Indigenous.

There are five public hospitals located in each of the major population centres of Darwin, Nhulunbuy, Katherine, Tennant Creek and Alice Springs and inpatient mental health services in Darwin and Alice Springs. The public hospitals provide 694 inpatient beds and work closely with the one private hospital in the NT to meet demand for hospital beds. Smaller regional hospitals and the larger Royal Darwin and Alice Springs Hospitals form a network to ensure the full range of medical services are available to people living across the Territory and remote areas. Each hospital retains their local identity but is able to share resources within the network. Movement of people to access medical care is supported by expansion of the Shared Electronic Health records service and specialist health access programs for travel to hospital, between hospitals and interstate when required.

‘Closing the Gap of Indigenous Disadvantage: A Generational Plan of Action’ is the NT Government’s plan of action to overcome Indigenous disadvantage. A key action to close the gap is training and employment of Aboriginal Health Workers. The Department has launched a Cultural Security policy to embed cultural competency into workplace practises.

Prevention of illness and early intervention to maintain healthy Territorians are catered for through mental health and community health services delivered across the Territory. These services include: programs for nutrition, physical activity, preventable chronic disease, women’s health, hearing, children/youth, home birth, breast screening, injury prevention, immunisation and community mental health.

The NT is faced with increasing demand on health services, a significant gap in life expectancy between indigenous people and other Territorians and health systems requiring ongoing reforms to manage finite resources. Strategies that have emerged to meet these challenges include the Rapid Admission and Planning Unit, Chronic Disease Strategy, Mental Health Action Plan and the use of electronic health records. Workforce issues related to recruitment and retention due to chronic shortages of health workers are a major challenge with strategies such as redefining roles between doctors and nurses occurring.

Legislative reform can support better provision of health services. The *Care and Protection of Children Act 2007* provides improved and better coordinated child protection services with other agencies operating in the community. In 2008-09, the Department will contribute to the reform of the *NT Liquor Act* and the *Alcohol Court Act* in partnership with other agencies.

”

---

## 12.7 Definitions of key terms and indicators

<b>AR-DRG v5.1 (Australian refined diagnosis related group, version 5.1)</b>	A patient classification system that hospitals use to match their patient services (hospital procedures and diagnoses) with their resource needs. AR-DRG v5.1 is based on the ICD-10-AM classification.
<b>Casemix adjustment</b>	Adjustment of data on cases treated to account for the number and type of cases. Cases are sorted into diagnosis related groups (AR-DRGs) that represent a class of patients with similar clinical conditions requiring similar hospital services.
<b>General practice</b>	The organisational structure in which one or more GPs provide and supervise health care for a 'population' of patients. This definition includes medical practitioners who work solely with one specific population, such as women's health or Indigenous health.
<b>Health management</b>	The ongoing process beginning with initial client contact and including all actions relating to the client. Includes assessment/evaluation, education of the person, family or carer(s), and diagnosis and treatment. Involves problems with adherence to treatment and liaison with, or referral to, other agencies.
<b>Incidence rate</b>	Proportion of the population experiencing a disorder or illness for the first time during a given period (often expressed per 100 000 people).
<b>Separation</b>	An episode of care for an admitted patient, which can be a total hospital stay, or a portion of a hospital stay beginning or ending in a change of type of care (for example, from acute to rehabilitation). Separation also means the process by which an admitted patient completes an episode of care.
<b>Breast cancer Breast conserving surgery</b>	An operation to remove the breast cancer but not the breast. Types of breast conserving surgery include lumpectomy (removal of the lump), quadrantectomy (removal of one quarter of the breast) and segmental mastectomy (removal of the cancer as well as some of the breast tissue around the tumour and the lining over the chest muscles below the tumour).
<b>Cost per woman screened</b>	The total cost of the provision of breast screening services, divided by the number of women screened. The total cost includes the cost of providing the BreastScreen Australia program in each jurisdiction, in addition to the cost of providing the program to women.
<b>Detection rate for small cancers</b>	The rate of small (less than or equal to 15 millimetres) invasive breast cancers detected per 10 000 women screened.
<b>Ductal carcinoma in situ</b>	Abnormal cells that involve only the lining of a duct. The cells have not spread outside the duct to other tissues in the breast. Also known as intraductal carcinoma.
<b>Invasive cancer</b>	A tumour whose cells invade healthy or normal tissue.
<b>Modified radical mastectomy</b>	Surgery for breast cancer in which the breast, some of the lymph nodes under the arm, the lining over the chest muscles, and sometimes part of the chest wall muscles are removed.
<b>Mortality rate from breast cancer</b>	The age-specific and age standardised mortality rates of women who die as a result of breast cancer, expressed per 100 000 women in the population.

<b>Participation</b>	The number of women resident in the catchment area screened, divided by the number of women resident in the catchment area, expressed as a percentage. If a woman is screened more than once during the reference period, then only the first screen is counted. Catchment area is a geographic region based on service size in relation to the population, accessibility and the location of other services. It is uniquely defined for each service based on postcode or statistical local area.
<b>Radiation therapy</b>	The use of high energy radiation from X-rays, gamma rays, neutrons, and other sources to kill cancer cells and shrink tumours. Radiation may come from a machine outside the body (external beam radiation therapy) or from materials called radioisotopes. Radioisotopes produce radiation and can be placed in or near the tumour or in the area near cancer cells. This type of radiation treatment is called internal radiation therapy, implant radiation, interstitial radiation or brachytherapy. Systemic radiation therapy uses a radioactive substance (such as a radiolabelled monoclonal antibody) that circulates throughout the body.
<b>Screening</b>	The performance of tests on apparently well people to detect a medical condition at an earlier stage than otherwise would be the case.
<b>Screening round (first)</b>	A woman's first visit to a BreastScreen Australia mammography screening service.
<b>Screening round (subsequent)</b>	A woman's visit to a BreastScreen Australia mammography screening service when she has previously attended such a service.
<b>Size of detected cancers</b>	Invasive cancers detected, classified according to tumour size.
<b>Total mastectomy</b>	Removal of the breast — also known as simple mastectomy.

## **Mental health**

<b>Acute services</b>	<p>Services that primarily provide specialised psychiatric care for people with acute episodes of mental illness. These episodes are characterised by recent onset of severe clinical symptoms of mental illness that have potential for prolonged dysfunction or risk to self and/or others. The key characteristic of acute services is that the treatment effort focuses on symptom reduction with a reasonable expectation of substantial improvement. In general, acute psychiatric services provide relatively short term treatment. Acute services may:</p> <ul style="list-style-type: none"> <li>• focus on assisting people who have had no prior contact or previous psychiatric history, or individuals with a continuing psychiatric illness for whom there has been an acute exacerbation of symptoms</li> <li>• target the general population or be specialised in nature, targeting specific clinical populations. The latter group include psychogeriatric, child and adolescent, and forensic mental health services.</li> </ul>
<b>Affective disorders</b>	A mood disturbance, including mania, hypomania, bipolar affective disorder, depression and dysthymia.
<b>Ambulatory care services</b>	Mental health services dedicated to the assessment, treatment, rehabilitation or care of non-admitted inpatients, including but not confined to crisis assessment and treatment services, mobile assessment and treatment services, outpatient clinic services (whether provided from a hospital or community mental health centre), child and adolescent outpatient treatment teams, social and living skills programs (including day programs, day hospitals and living skills centres), and psychogeriatric assessment teams and day programs.

---

<b>Anxiety disorders</b>	Feelings of tension, distress or nervousness. Includes agoraphobia, social phobia, panic disorder, generalised anxiety disorder, obsessive–compulsive disorder and post-traumatic stress disorder.
<b>Available beds</b>	<p>The number of immediately available beds for use by admitted patients if required. Beds are immediately available for use if located in a suitable place of care with nursing or other auxiliary staff available within a reasonable period.</p> <p>In many cases, available beds will be less than the number of approved beds, with the former controlled by utilisation factors and resourcing levels, while the latter refers to the maximum capacity allowed for the hospital, given sufficient resources and community demand.</p>
<b>Child and adolescent mental health services</b>	Services principally targeted at children and young people up to the age of 18 years. Classification of services in this category requires recognition by the regional or central funding authority of the special focus of the inpatient service on children or adolescents. These services may include a forensic component.
<b>Co-located services</b>	Psychiatric inpatient services established physically and organisationally as part of a general hospital.
<b>Community-based residential services</b>	Staffed residential units established in community settings that provide specialised treatment, rehabilitation or care for people affected by a mental illness or psychiatric disability. To be defined as community-based residences, the services must: provide residential care to people with mental illnesses or psychiatric disability; be located in a community setting external to the campus of a general hospital or psychiatric institution; employ onsite staff for at least some part of the day; and be government funded.
<b>Co-morbidity</b>	The simultaneous occurrence of two or more illnesses such as depressive illness with anxiety disorder, or depressive disorder with anorexia.
<b>Consumer involvement in decision making</b>	Consumer participation arrangements in public sector mental health service organisations according to the scoring hierarchy (levels 1–4) developed for monitoring State and Territory performance under Medicare Agreements Schedule F1 indicators.
<b>Cost per inpatient bed day</b>	The average patient day cost according to the inpatient type.
<b>Depression</b>	A state of gloom, despondency or sadness lasting at least two weeks. The person usually suffers from low mood, loss of interest and enjoyment, and reduced energy. Sleep, appetite and concentration may be affected.
<b>Forensic mental health services</b>	Services principally providing assessment, treatment and care of mentally ill individuals whose behaviour has led them to commit criminal offences or makes it likely that they will offend in the future if not adequately treated and contained. This includes prison-based services, but excludes services that are primarily for children and adolescents and for older people even where they include a forensic component.
<b>General mental health services</b>	<p>Services that principally target the general adult population (18–65 years old) but that may provide services to children, adolescents or older people. Includes, therefore, those services that cannot be described as specialised child and adolescent, older persons' or forensic services.</p> <p>General mental health services include hospital units whose principal function is to provide some form of specialised service to the general adult population (for example, inpatient psychotherapy) or to focus on</p>

---

	specific clinical disorders within the adult population (for example, post-natal depression, anxiety disorders).
<b>Mental illness</b>	A diagnosable illness that significantly interferes with an individual's cognitive, emotional and/or social abilities.
<b>Mental health</b>	The capacity of individuals within groups and the environment to interact with one another in ways that promote subjective wellbeing, the optimal development and use of mental abilities (cognitive, affective and relational) and the achievement of individual and collective goals consistent with justice.
<b>Mental health problems</b>	Diminished cognitive, emotional or social abilities, but not to the extent of meeting the criteria for a mental illness.
<b>Mental health promotion</b>	Actions taken to maximise mental health and wellbeing among populations and individuals. It is aimed at changing environments (social, physical, economic, educational, cultural) and enhancing the 'coping' capacity of communities, families and individuals by giving power, knowledge, skills and necessary resources.
<b>Mental illness prevention</b>	Interventions that occur before the initial onset of a illness to prevent its development. The goal of prevention interventions is to reduce the incidence and prevalence of mental health problems and mental illnesses.
<b>Mortality rate from suicide</b>	The percentage of the population who die as a result of suicide.
<b>Non-acute services</b>	<p>Non-acute services are defined in two categories:</p> <ul style="list-style-type: none"> <li>• Rehabilitation services that have a primary focus on intervention to reduce functional impairments that limit the independence of patients. Rehabilitation services are focused on disability and the promotion of personal recovery. They are characterised by an expectation of substantial improvement over the short to mid term. Patients treated by rehabilitation services usually have a relatively stable pattern of clinical symptoms.</li> <li>• Extended care services that primarily provide care over an indefinite period for patients who have a stable but severe level of functional impairment and an inability to function independently, thus requiring extensive care and support. Patients of extended care services present a stable pattern of clinical symptoms, which may include high levels of severe unremitting symptoms of mental illness. Treatment is focused on preventing deterioration and reducing impairment; improvement is expected to occur slowly.</li> </ul>
<b>Non-government organisations</b>	Private not-for-profit community managed organisations that receive State and Territory government funding specifically for the purpose of providing community support services for people affected by a mental illness or psychiatric disability. Programs provided by the non-government organisation sector may include supported accommodation services (including community-based crisis and respite beds), vocational rehabilitation programs, advocacy programs (including system advocacy), consumer self-help services, and support services for families and primary carers.
<b>Older persons' mental health services</b>	Services principally targeting people in the age group 65 years or over. Classification of services in this category requires recognition by the regional or central funding authority of the special focus of the inpatient service on aged persons. These services may include a forensic component. Excludes general mental health services that may treat older people as part of a more general service.
<b>Outpatient services — community-based</b>	Services primarily provided to non-admitted patients on an appointment basis and delivered from health centres located in

---

	community settings, physically separated within hospital sites. They may include outreach or domiciliary care as an adjunct to services provided from the centre base.
<b>Outpatient services — hospital-based</b>	Services primarily provided to non-admitted patients on an appointment basis and delivered from clinics located within hospitals. They may include outreach or domiciliary care as an adjunct to services provided from the clinic base.
<b>Patient days (occupied bed days)</b>	All days or part days for which patient was in hospital during the reporting year (1 July to 30 June), regardless of the original date of admission or discharge. Key definitional rules include the following: <ul style="list-style-type: none"> <li>• For a patient admitted and discharged on different days, only the day of admission is counted as a patient day.</li> <li>• Admission and discharge on the same day are equal to one patient day.</li> <li>• Leave days are not included when they involve an overnight absence.</li> <li>• A patient day is recorded on the day of return from leave.</li> </ul>
<b>Percentage of facilities accredited</b>	The percentage of facilities providing mental health services that are accredited according to the National Standards for Mental Health Services.
<b>Prevalence</b>	The number of cases of a disease present in a population at a given time (point prevalence) or during a given period (period prevalence).
<b>Preventive interventions</b>	Programs designed to decrease the incidence, prevalence and negative outcomes of illnesses.
<b>Psychiatrist</b>	A medical practitioner with specialist training in psychiatry.
<b>Public health</b>	The organised, social response to protect and promote health, and to prevent illness, injury and disability. The starting point for identifying public health issues, problems and priorities, and for designing and implementing interventions, is the population as a whole or population subgroups. Public health is characterised by a focus on the health of the population (and particular at-risk groups) and complements clinical provision of health care services.
<b>Public (non-psychiatric) hospital</b>	A hospital that provides at least minimum medical, surgical or obstetric services for inpatient treatment and/or care, and around-the-clock, comprehensive, qualified nursing services, as well as other necessary professional services.
<b>Schizophrenia</b>	A combination of signs and symptoms that may include delusions, hallucinations, disorganised speech or behaviour, a flattening in emotions, and restrictions in thought, speech and goal directed behaviour.
<b>Specialised mental health inpatient services</b>	Services provided to admitted patients in stand-alone psychiatric hospitals or specialised psychiatric units located within general hospitals.
<b>Specialised mental health services</b>	Services whose primary function is specifically to provide treatment, rehabilitation or community support targeted towards people affected by a mental illness or psychiatric disability. Further, such activities are delivered from a service or facility that is readily identifiable as both specialised and serving a mental health function. This criterion applies regardless of the source of funds.
<b>Specialised residential services</b>	Services provided in the community that are staffed by mental health professionals on a 24 hour basis.
<b>Staffing categories (mental health)</b>	<i>Medical officers:</i> all medical officers employed or engaged by the organisation on a full time or part time basis. Includes visiting medical officers who are engaged on an hourly, sessional or fee-for-service

---

basis.

*Psychiatrists and consultant psychiatrists:* medical officers who are registered to practice psychiatry under the relevant state or territory medical registration board; or who are fellows of the Royal Australian and New Zealand College of Psychiatrists or registered with Health Insurance Commission as a specialist in Psychiatry.

*Psychiatry registrars and trainees:* medical officers who are formal trainees within the Royal Australian and New Zealand College of Psychiatrists' Postgraduate Training Program.

*Other medical officers:* medical officers employed or engaged by the organisation who are not registered as psychiatrists within the State or Territory, or as formal trainees within the Royal Australian and New Zealand College of Psychiatrists' Postgraduate Training Program.

*Nursing staff:* all categories of registered nurses and enrolled nurses, employed or engaged by the organisation.

*Registered nurses:* people with at least a three year training certificate or tertiary qualification who are certified as being a registered nurse with the State or Territory registration board. This is a comprehensive category and includes general and specialised categories of registered nurses.

*Enrolled nurses:* Refers to persons who are second level nurses who are enrolled in all states except Victoria where they are registered by the state registration board to practise in this capacity. Includes general enrolled nurse and specialist enrolled nurse (e.g. mothercraft nurses in some states).

*Diagnostic and health professionals:* qualified staff (other than qualified medical or nursing staff) who are engaged in duties of a diagnostic, professional or technical nature. This category covers all allied health professionals, such as social workers, psychologists, occupational therapists, physiotherapists, and other diagnostic and health professionals.

*Social workers:* people who have completed a course of recognised training and are eligible for membership of the Australian Association of Social Workers.

*Psychologists:* people who are registered as psychologists with the relevant State or Territory registration board.

*Occupational therapists:* people who have completed a course of recognised training and who are eligible for membership of the Australian Association of Occupational Therapists.

*Other personal care staff:* attendants, assistants, home companions, family aides, ward helpers, warders, orderlies, ward assistants and nursing assistants who are engaged primarily in the provision of personal care to patients or residents, and who are not formally qualified or who are undergoing training in nursing or allied health professions.

*Administrative and clerical staff:* staff engaged in administrative and clerical duties. Excludes medical, nursing, diagnostic and health professional and domestic staff wholly or partly involved in administrative and clerical duties, who should be counted under their appropriate occupational categories. Civil engineers and computing staff are included in this category.

*Domestic and other staff:* staff involved in the provision of food and cleaning services including domestic staff primarily engaged in administrative duties such as food services manager. Dieticians are excluded.

---

**Stand-alone psychiatric hospitals**

Health establishments that are primarily devoted to the treatment and care of inpatients with psychiatric, mental or behavioural disorders, and that are situated at physically separate locations from a general hospital. Stand-alone hospitals may or may not be managed by the mainstream health system. Psychiatric hospitals situated at physically separate locations from a general hospital are included within the 'stand-alone' category regardless of whether they are under the management control of a general hospital. A health establishment that operates in a separate building but is located on, or immediately adjoining, the acute care hospital campus may also be a stand-alone hospital if the following criteria are **not** met:

- a single organisational or management structure covers the acute care hospital and the psychiatric hospital
- a single employer covers the staff of the acute care hospital and the psychiatric hospital
- the location of the acute care hospital and psychiatric hospital can be regarded as part of a single overall hospital campus
- the patients of the psychiatric hospital are regarded as patients of the single integrated health service.

**Substance use disorders**

Disorders in which drugs or alcohol are used to such an extent that behaviour becomes maladaptive, social and occupational functioning is impaired, and control or abstinence becomes impossible. Reliance on the drug may be psychological (as in substance misuse) or physiological (as in substance dependence).

---

## 12.8 Attachment tables

Attachment tables are identified in references throughout this chapter by an '12A' suffix (for example, table 12A.3). Attachment tables are provided on the CD-ROM enclosed with the Report and on the Review website ([www.pc.gov.au/gsp](http://www.pc.gov.au/gsp)). Users without access to the CD-ROM or the website can contact the Secretariat to obtain the attachment tables (see contact details on the inside front cover of the Report).

### Breast cancer

<b>Table 12A.1</b>	Mortality rates from breast cancer for women, by age
<b>Table 12A.2</b>	Breast cancer five year relative survival at diagnosis
<b>Table 12A.3</b>	Number of new cases of breast cancer, five year averages
<b>Table 12A.4</b>	Incidence rates of breast cancer, five year averages
<b>Table 12A.5</b>	BreastScreen Australia: Scope of services provided in each jurisdiction, 2007
<b>Table 12A.6</b>	Expenditure on breast cancer screening (2006-07 dollars)
<b>Table 12A.7</b>	Number of women screened by BreastScreen Australia
<b>Table 12A.8</b>	Separations and separation rates for selected AR-DRGs related to breast cancer, public hospitals 2006-07
<b>Table 12A.9</b>	Participation rates of women in BreastScreen Australia, (24 month period)
<b>Table 12A.10</b>	Participation rates of Indigenous women screened by BreastScreen Australia (24 month period) (first and subsequent rounds) (per cent)
<b>Table 12A.11</b>	Participation rates of NESB women screened by BreastScreen Australia (24 month period) (first and subsequent rounds) (per cent)
<b>Table 12A.12</b>	Participation rates of women screened by BreastScreen Australia, by geographic location (24 month period) (first and subsequent rounds) (per cent)
<b>Table 12A.13</b>	Rate of cancers detected without the need for open biopsies, all women (per cent)
<b>Table 12A.14</b>	Real cost per woman screened (2007-08 dollars)
<b>Table 12A.15</b>	Scope of activities and expenditure items included in cost per woman screened calculations
<b>Table 12A.16</b>	Breast conserving surgery to mastectomy
<b>Table 12A.17</b>	Selected breast and other cancer AR-DRGs, public sector, population estimated, 2006-07
<b>Table 12A.18</b>	Interval cancer rate for women, by age, per 10 000 women at risk
<b>Table 12A.19</b>	Breast cancer detection rate, by BreastScreen Australia
<b>Table 12A.20</b>	Rate of detection of small diameter (15mm or less) invasive cancers, BreastScreen Australia, all rounds of screening
<b>Table 12A.21</b>	Number of detected invasive cancers, by size and round, women aged over 40 years

---

## Mental health

- Table 12A.22** Prevalence of lifetime mental disorders among adults aged 16–85 years, 2007 (per cent)
- Table 12A.23** Prevalence of lifetime mental disorders among adults aged 16–85 years, by gender, 2007 (per cent)
- Table 12A.24** Prevalence of lifetime mental disorders among adults, by age, 2007 (per cent)
- Table 12A.25** Prevalence of lifetime mental disorders among adults, by region, 2007 (per cent)
- Table 12A.26** Labour force and employment participation among adults aged 16–64 years, by mental disorder status, 2007 (per cent)
- Table 12A.27** Education, training and employment participation among adults aged 16–30 years, by mental disorder status, 2007 (per cent)
- Table 12A.28** Labour force and employment participation among adults aged 16–30 years, by mental disorder status, 2007 (per cent)
- Table 12A.29** Services used for mental health problems, Australia, 2007 (per cent)
- Table 12A.30** Services used for mental health, by mental disorder status, 2007 (per cent)
- Table 12A.31** Real estimated Australian Government expenditure on mental health services (2006-07 dollars) (\$'000)
- Table 12A.32** Real estimated recurrent expenditure at the discretion of State and Territory governments (2006-07 dollars)
- Table 12A.33** Real Australian Government recurrent expenditure on mental health services per person (2006-07 dollars)
- Table 12A.34** Real estimated recurrent expenditure at the discretion of State and Territory governments — excluding other revenue (2006-07 dollars)
- Table 12A.35** Depreciation (current prices) (\$'000s)
- Table 12A.36** Total state and territory recurrent expenditure on specialised mental health services (current prices)
- Table 12A.37** Percentage of population receiving clinical mental health care, 2006-07
- Table 12A.38** GP Mental Health Care, Medicare items processed, 2007-08
- Table 12A.39** Available beds in specialised mental health services
- Table 12A.40** Full time equivalent (FTE) direct care staff employed in specialised mental health services by staff type (per 100 000 people)
- Table 12A.41** Full time equivalent (FTE) direct care staff employed in specialised mental health services, by service setting (per 100 000 people)
- Table 12A.42** Mental health patient days
- Table 12A.43** Separations, with psychiatric care, public hospitals, Australia, 2005-06
- Table 12A.44** Specialised psychiatric care separations reported for Indigenous patients, Australia, 2005-06
- Table 12A.45** Specialised public mental health services reviewed against National Standards for Mental Health Services, 30 June
- Table 12A.46** Services provided in the appropriate setting (per cent)

---

<b>Table 12A.47</b>	Consumer and carer participation
<b>Table 12A.48</b>	Percent of specialised mental health services that have introduced routine consumer outcome measurement
<b>Table 12A.49</b>	Rates of community follow up for people within the first seven days of discharge from hospital
<b>Table 12A.50</b>	Readmissions to hospital within 28 days of discharge
<b>Table 12A.51</b>	Average recurrent costs per inpatient bed day, public hospitals, by target population (2006-07 dollars)
<b>Table 12A.52</b>	Average recurrent cost per inpatient bed day, by public hospital type (2006-07 dollars)
<b>Table 12A.53</b>	Average recurrent cost to government per patient day for community residential services (2006-07 dollars)
<b>Table 12A.54</b>	Average cost to government (recurrent) per treated patient in the community NSW (2006-07 dollars)
<b>Table 12A.55</b>	Average cost to government (recurrent) per treated patient in the community Victoria (2006-07 dollars)
<b>Table 12A.56</b>	Average cost to government (recurrent) per treated patient in the community Queensland (2006-07 dollars)
<b>Table 12A.57</b>	Average cost to government (recurrent) per treated patient in the community WA (2006-07 dollars)
<b>Table 12A.58</b>	Average cost to government (recurrent) per treated patient in the community SA (2006-07 dollars)
<b>Table 12A.59</b>	Average cost to government (recurrent) per treated patient in the community Tasmania (2006-07 dollars)
<b>Table 12A.60</b>	Average cost to government (recurrent) per treated patient in the community ACT (2006-07 dollars)
<b>Table 12A.61</b>	Average cost to government (recurrent) per treated patient in the community NT (2006-07 dollars)
<b>Table 12A.62</b>	Average cost to government (recurrent) per treated patient in the community Australia (2006-07 dollars)
<b>Table 12A.63</b>	Suicides and mortality rate, by sex, Australia
<b>Table 12A.64</b>	Suicides and mortality rate, by sex, Australia
<b>Table 12A.65</b>	Suicide deaths and death rate
<b>Table 12A.66</b>	Suicide deaths and death rate, 15–24 year olds
<b>Table 12A.67</b>	Suicide deaths and suicide death rate, by area
<b>Table 12A.68</b>	Suicide deaths, by Indigenous status
<b>Table 12A.69</b>	Deflators used to calculate real state and territory mental health expenditure
<b>Table 12A.70</b>	Deflator used to calculate real Australian Government mental health expenditure
<b>Table 12A.71</b>	Estimated resident populations used in mental health per person calculations

---

## 12.9 References

- ABS (Australian Bureau of Statistics) 2007, *Information Paper: External Causes of Death, Data Quality, 2005*, Cat. no. 3317.0.55.001, Ausinfo, Canberra
- 2008a, *Causes of Death, Australia*, Cat. no. 3303.0, Canberra.
- 2008b, *National Survey of Mental Health and Wellbeing: Summary of Results, 2007*, Cat. no. 4326.0, Canberra.
- Australian Health Ministers 1991, *Mental Health Statement of Rights and Responsibilities*, Australian Government Publishing Service, Canberra.
- Australian Health Ministers 2003, *National Mental Health Plan 2003–2008*, Canberra.
- AHMC (Australian Health Ministers' Conference) 2008, *Council of Australian Governments National Action Plan for Mental Health 2006-2011: Progress Report 2006-07*, Report prepared under the auspice of the Mental Health Standing Committee of the Australian Health Ministers' Advisory Council, [www.coag.gov.au/reports/docs/AHMC\\_COAG\\_mental\\_health.doc](http://www.coag.gov.au/reports/docs/AHMC_COAG_mental_health.doc) (accessed 10 December 2008).
- AIHW (Australian Institute of Health and Welfare) 2003a, *BreastScreen Australia Monitoring Report 2000-2001*, Cat. no. CAN 20, Cancer Series no. 25, Canberra.
- 2003b, *National Health Priority Areas*, [www.aihw.gov.au/nhpa/index.cfm](http://www.aihw.gov.au/nhpa/index.cfm) (accessed 18 November 2008).
- 2006, *Mental health establishments NMDS 2005-2006*, Exported from METeOR (AIHW's Metadata Online Registry), Canberra.
- 2008a, *BreastScreen Australia Monitoring Report 2004-2005*, Cat. no. CAN 37, Cancer series no. 42, AIHW, Canberra.
- 2008b, *Mental health services in Australia 2005–06*, Cat. no. HSE 56, Mental Health Series no. 10, Canberra.
- AIHW, BreastScreen Australia and the NCSP (National Cervical Screening Program) 1998, *Breast and Cervical Cancer Screening in Australia 1996 and 1997*, Cat. no. CAN 3, AIHW, Canberra.
- AIHW and AACR (Australasian Association of Cancer Registries) 2007, *Cancer in Australia: an overview, 2006*, Cat. no. CAN 32, Canberra (Cancer Series no. 37).
- AIHW and NBCC (National Breast Cancer Centre) 2006, *Breast cancer in Australia: an overview, 2006*, Cancer series no. 34, Cat. no. CAN 29, Canberra.

- 
- AIHW: Begg S, Vos T, Barker B, Stevenson C, Stanley L and Lopez A 2007, *The burden of disease and injury in Australia, 2003*, Cat. no. PHE 82, Canberra.
- BreastScreen Australia 2004, *BreastScreen Australia National Accreditation Standards*, July 2004, BreastScreen Australia.
- Britt H, Miller GC, Charles J, Henderson J, Bayram C, Harrison C, Valenti L, Fahridin S, Pan Y, O'Halloran J 2008, *General practice activity in Australia 2007–08*, General practice series no. 22, Cat. no. GEP 22, Canberra.
- Buckingham, W., Burgess, P., Solomon, S., Pirkis, J. and Eagar, K. 1998, *Developing a Casemix Classification for Mental Health Services*, vol. 1, p. 141, Department of Health and Family Services, Canberra.
- COAG (Council of Australian Governments) 2006, *National Action Plan on Mental Health 2006–2011*, COAG meeting 14 July 2006, [www.coag.gov.au/coag\\_meeting\\_outcomes/2006-07-14/docs/nap\\_mental\\_health.rtf](http://www.coag.gov.au/coag_meeting_outcomes/2006-07-14/docs/nap_mental_health.rtf) (accessed 10 December 2008).
- DoHA (Department of Health and Ageing) 2002, *National Mental Health Report 2002*, Australian Government, Canberra.
- 2005, *National Mental Health Report 2005*, Australian Government, Canberra.
- 2007, *National Mental Health Report 2007: Summary of Twelve Years of Reform in Australia's Mental Health Services under the National Mental Health Strategy 1993-2005*, Australian Government, Canberra.
- 2008a, *Medicare Benefits Schedule Book: Effective from 1 November 2008*, [www.health.gov.au/internet/mbsonline/publishing.nsf/Content/2F23FAD028B1699CCA2574E50003C125/\\$File/Medicare%20Benefits%20Schedule%20-%201%20Nov%202008.pdf](http://www.health.gov.au/internet/mbsonline/publishing.nsf/Content/2F23FAD028B1699CCA2574E50003C125/$File/Medicare%20Benefits%20Schedule%20-%201%20Nov%202008.pdf) (accessed 20 November 2008).
- 2008b, *National Hospital Cost Data Collection Cost Report Round 11, (2006-07)*, v5.1, Canberra.
- DHAC (Australian Government Department of Health and Community Services) and AIHW 1999, *National Health Priority Areas Report: Mental Health 1998*, AIHW Cat. no. PHE 13, Canberra.
- DHS (Department of Human Services Victoria) 1999, *Breast Disease Service Redevelopment Strategy. A Report by the Breast Care Implementation Advisory Committee 1999–2003*, Victorian Government Publishing Service, Melbourne
- NBOCC (National Breast and Ovarian Cancer Centre, formerly NBCC) 2003, [www/nbcc.org.au/bestpractice/statistics/index.htm](http://www/nbcc.org.au/bestpractice/statistics/index.htm) (accessed 15 November 2003).

---

—— 2004, *Early detection of breast cancer*, Position statement, downloaded from <http://www.nbcc.org.au/bestpractice/screening/> (accessed 17 October 2008).

National Mental Health Working Group (NMHWG) Information Strategy Committee Performance Indicator Drafting Group 2005, *Key Performance Indicators for Australian Public Mental Health Services*, ISC Discussion Paper no. 6. Australian Government Department of Health and Ageing, Canberra.

WHO (World Health Organization) 2001, *Strengthening mental health promotion*, (Fact sheet no. 220), Geneva.