

Population health profile of the Murray-Plains

Division of General Practice: supplement

Population Profile Series: No. 66a

PHIDU

March 2007



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Australian Government

Australian Institute of
Health and Welfare



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National Library of Australia Cataloguing in Publication entry

Population health profile of the Murray Plains Division of General Practice: supplement.

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ISBN 9 78073089 6647 (web).

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362.1099454

ISSN 1833-0452 Population Profile Series

Public Health Information Development Unit, The University of Adelaide
A Collaborating Unit of the Australian Institute of Health and Welfare

This profile was produced by PHIDU, the Public Health Information Development Unit at The University of Adelaide, South Australia. The work was funded under a grant from the Australian Government Department of Health and Ageing. The views expressed in this profile are solely those of the authors and should not be attributed to the Department of Health and Ageing or the Minister for Health and Ageing.

Interpretation of differences between data in this profile and similar data from other sources needs to be undertaken with care, as such differences may be due to the use of different methodology to produce the data.

Suggested citation:

PHIDU. (2007) *Population health profile of the Murray-Plains Division of General Practice: supplement*. Population Profile Series: No. 66a. Public Health Information Development Unit (PHIDU), Adelaide.

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This publication, the maps and supporting data, together with other publications on population health, are available from the PHIDU website (www.publichealth.gov.au).

Published by Public Health Information Development Unit, The University of Adelaide

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Population health profile of the Murray-Plains Division of General Practice: supplement

This profile is a supplement to the *Population health profile of the Murray-Plains Division of General Practice*, dated November 2005, available from www.publichealth.gov.au. This supplement includes an update of the population of the Murray-Plains Division of General Practice, as well as additional indicators and aspects of the Division's socioeconomic status, use of GP services and health. The contents are:

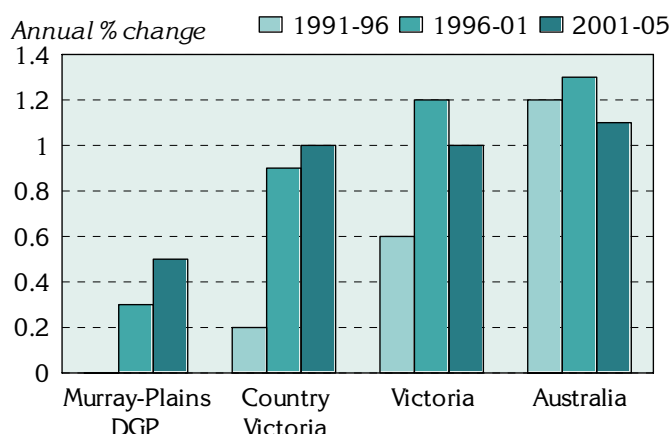
- Population [updated to June 2005]
- Additional socio-demographic indicators
- Unreferred attendances – patient flow/ GP catchment
- Additional prevalence estimates: chronic diseases and risk factors combined
- Avoidable hospitalisations: hospital admissions resulting from ambulatory care sensitive conditions
- Avoidable mortality

For further information on the way Division totals in this report have been estimated, please refer to the 'Notes on the data' section of the *Population health profile*, November 2005 (www.publichealth.gov.au).

Population

The Murray-Plains Division had an Estimated Resident Population of 65,556 at 30 June 2005.

Figure 1: Annual population change, Murray-Plains DGP, country Victoria, Victoria and Australia, 1991 to 1996, 1996 to 2001 and 2001 to 2005



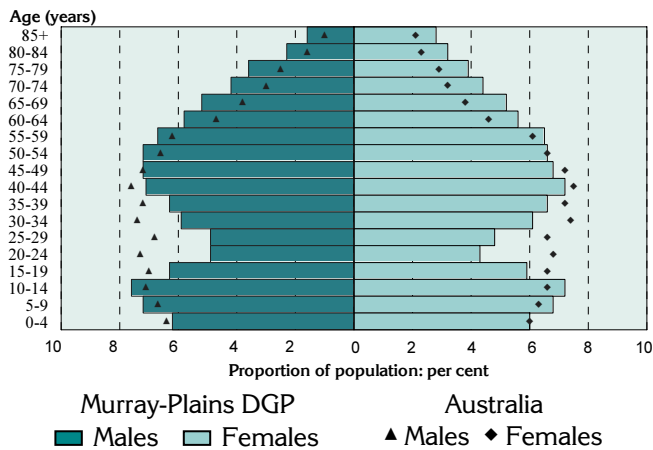
Over the five years from 1991 to 1996, the Division's population showed no growth, compared to increases of 0.2% for country Victoria, 0.6% for Victoria, and 1.2% for Australia as a whole. From 1996 to 2001, the annual percentage increase in the Division (0.3%) was lower than in country Victoria (0.9%), Victoria (1.2%) and Australia (1.3%). The Division's growth rate of 0.5% from 2001 to 2005 was again lower than the annual increases for country Victoria and Victoria (1.0%) and Australia (1.1%).

Table 1: Population by age, Murray-Plains DGP and Australia, 2005

Age group (years)	Murray-Plains DGP		Australia	
	No.	%	No.	%
0-14	13,467	20.5	3,978,221	19.6
15-24	6,995	10.7	2,819,834	13.9
25-44	15,982	24.4	5,878,107	28.9
45-64	17,215	26.3	4,984,446	24.5
65-74	6,220	9.5	1,398,831	6.9
75-84	4,255	6.5	954,143	4.7
85+	1,422	2.2	315,027	1.5
Total	65,556	100.0	20,328,609	100.0

As shown in the accompanying table and the age-sex pyramid below (Figure 2), the Murray-Plains DGP had more children aged 0 to 14 years (20.5%), but fewer young people aged 15 to 24 years (10.7%) compared to Australia as a whole (19.6% and 13.9%) (Table 1). While there were fewer people aged 25 to 44 years (24.4%, compared to 28.9%), the proportions of the Division's population at ages 45 years and over were higher than those for Australia.

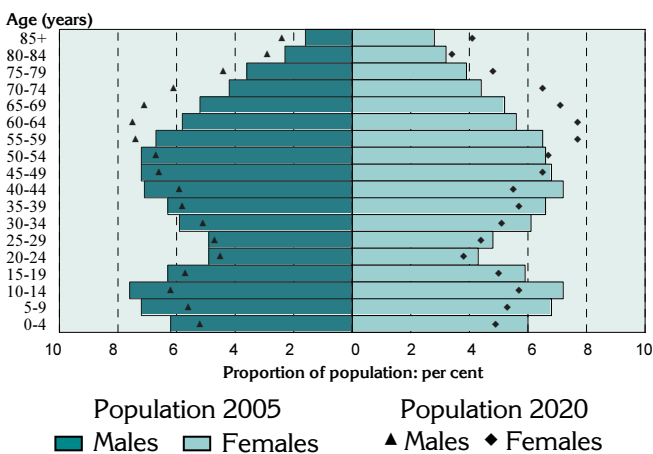
Figure 2: Population in Murray-Plains DGP and Australia, by age and sex, 2005



The most notable differences in the age distribution of the Division's population (when compared to Australia overall) are:

- at younger ages – relatively more children aged 5 to 14 years, and lower proportions of young people aged 15 to 19 years;
- from 20 to 44 years – relatively fewer males and females (most pronounced at ages 20 to 29 years; and
- at older ages – relatively more males aged 50 years and over and females at ages 55 years and above.

Figure 3: Population projections for Murray-Plains DGP, by age and sex, 2005 and 2020



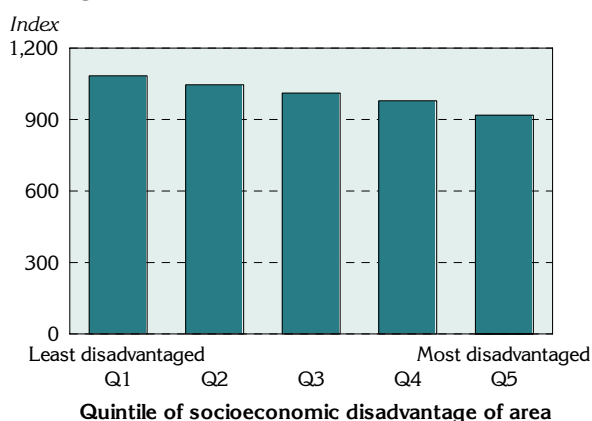
The population projections for the Division show a number of changes in age distribution, with the 2020 population projected to have:

- at younger ages – relatively fewer children and young people aged 0 to 19 years;
- from 20 to 54 years – relatively fewer males and females (to 49 years); and
- from 55 years onwards – relatively more males and females.

Additional socio-demographic indicators

Please refer to the earlier *Population health profile of the Murray-Plains Division of General Practice*, dated November 2005, available from www.publichealth.gov.au, for other socio-demographic indicators.

Figure 4: Index of Relative Socio-Economic Disadvantage, Murray-Plains DGP, 2001



One of four socioeconomic indexes for areas produced at the 2001 ABS Census is the Index of Relative Socio-Economic Disadvantage.

The Murray-Plains DGP has an index score of 1007, above the score for Australia of 1000: this score varies across the Division, from 918 in the most disadvantaged areas to 1083 in the least disadvantaged areas.

Note: each 'quintile' comprises approximately 20% of the population of the Division.

A new indicator, produced for the first time at the 2001 ABS Census, shows the number of jobless families with children under 15 years of age. There were notably fewer jobless families in the Murray-Plains DGP (14.5%), compared to country Victoria as a whole (17.4%) (Figure 5, Table 2).

With the introduction of the 30% rebate for private health insurance premiums, there was a once-off registration process, providing information of the postcode and residence of those who had such insurance (these data are not available at this area level for later dates). In 2001, the Division had a notably higher proportion of the population with private health insurance (48.5%), compared to country Victoria (43.0%) (Figure 5, Table 2).

Figure 5: Socio-demographic indicators, Murray-Plains DGP, country Victoria, Victoria and Australia, 2001

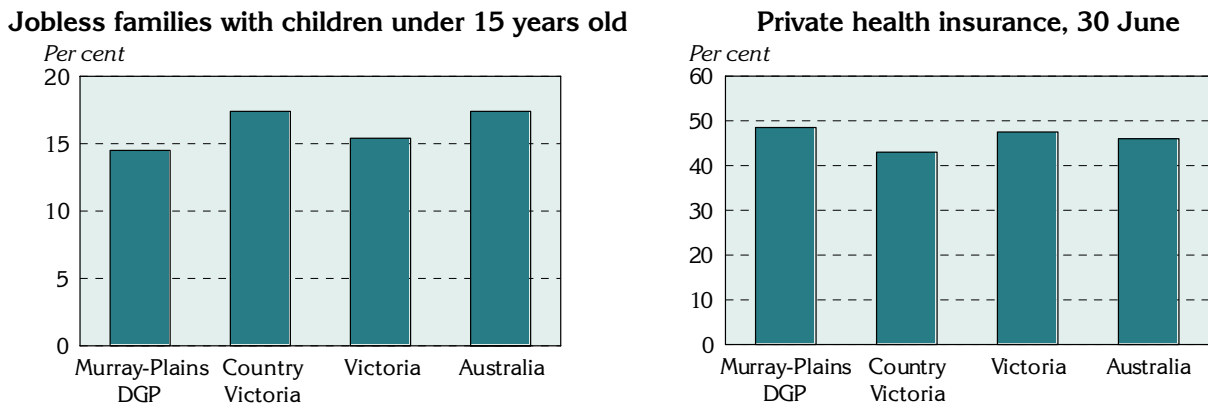
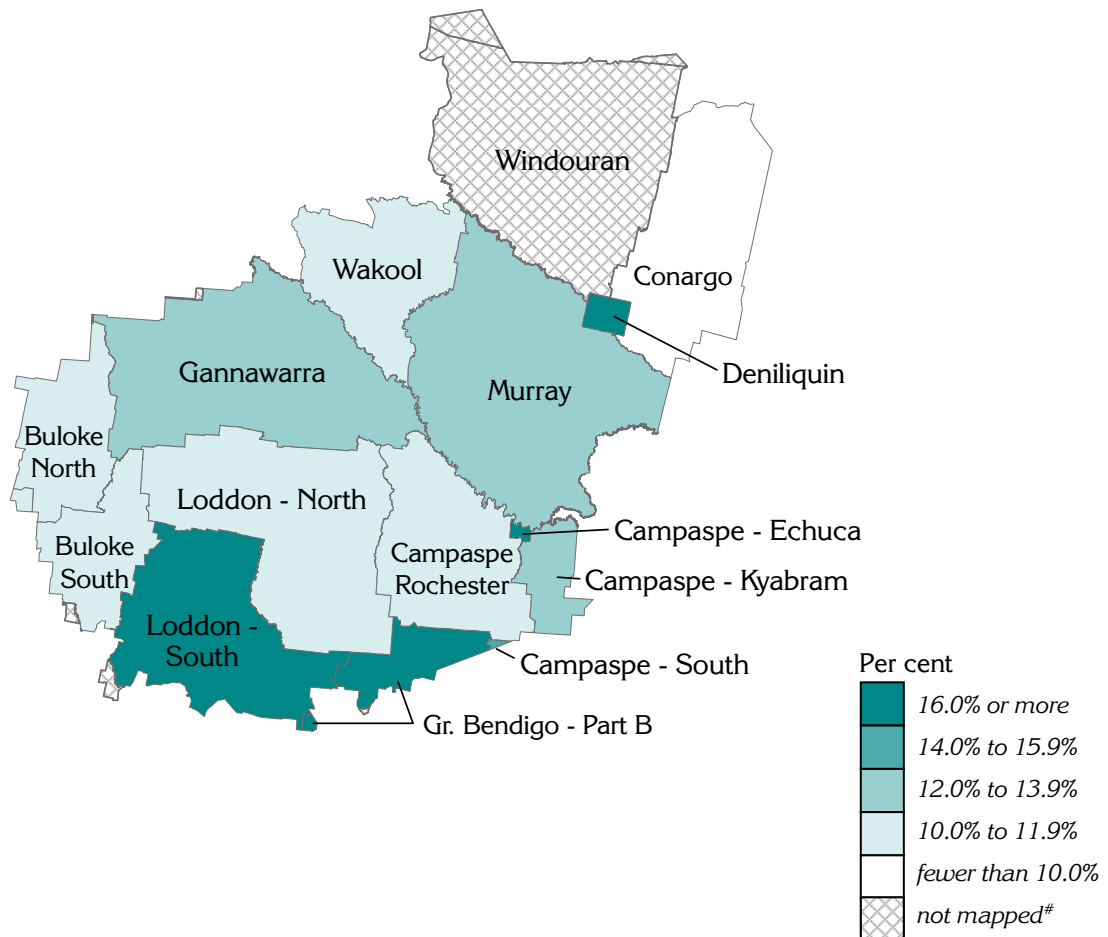


Table 2: Socio-demographic indicators, Murray-Plains DGP, country Victoria, Victoria and Australia, 2001

Indicator	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No.	%	No.	%	No.	%	No.	%
Jobless families with children under 15 years old	955	14.5	24,724	17.4	77,142	15.4	357,563	17.4
Private health insurance (30 June)	29,519	48.5	543,292	43.0	2,196,890	47.5	8,671,106	46.0

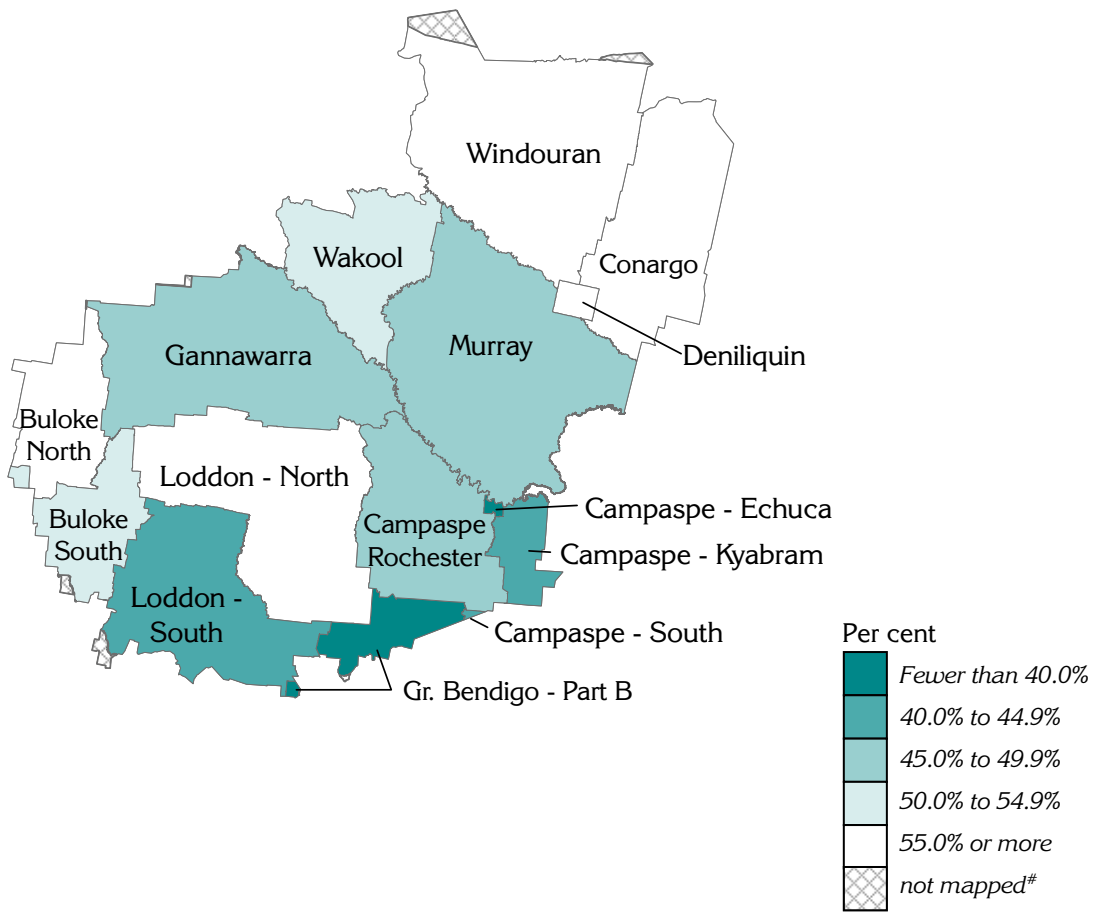
Details of the distribution of jobless families and of the population covered by private health insurance are shown by Statistical Local Area (SLA) in Maps 1 and 2, respectively.

Map 1: Jobless families with children under 15 years of age by SLA, Murray-Plains DGP, 2001



data were not mapped: see 'Mapping' note under Methods

Map 2: People covered by private health insurance by SLA, Murray-Plains DGP, 30 June 2001



[#] data were not mapped: see 'Mapping' note under Methods

GP services to residents of the Murray-Plains DGP

The following tables include information, purchased from Medicare Australia, of the movement of patients and GPs between Divisions. Note that the data only include unreferred attendances recorded under Medicare: unreferred attendances not included are those for which the cost is met by the Department of Veterans' Affairs or a compensation scheme; or are provided by salaried medical officers in hospitals, community health services or Aboriginal Medical Services, and which are not billed to Medicare. At any attendance, one or more services may have been provided.

The majority (87.5%) of all unreferred attendances to residents of Murray-Plains DGP were provided in the Division (ie. by a GP with a provider number in the Division): this represented 219,752 GP unreferred attendances (Table 3). A further 3.7% of unreferred attendances to residents were provided by GPs with a provider number in Bendigo & District DGP, with 1.2% provided by GPs in Goulburn Valley DGP.

Table 3: Patient flow – People living¹ in Murray-Plains DGP by Division where attendance occurred², 2003/04

Division		Unreferred attendances	
Number	Name	No.	% ³
331	Murray-Plains DGP	219,752	87.5
326	Bendigo & District DGP	9,368	3.7
327	Goulburn Valley DGP	3,001	1.2
301	Melbourne DGP	1,779	0.7
332	Mallee DGP	1,712	0.7
330	West Vic DGP	1,003	0.4
304	Southcity DGP	893	0.4
Other	..	13,650	5.4
Total	..	251,158	100.0

¹ Based on address in Medicare records

² Division of GP based on provider number

³ Proportion of all unreferred attendances of patients with an address in Division 331 by Division in which attendance occurred

The majority (91.3%) of unreferred attendances provided by GPs with a provider number in Murray-Plains DGP were also to people living in the Division (ie. their Medicare address was in the Division) (Table 4). A further 2.9% of unreferred attendances provided by GPs in the Division were to people living in Goulburn Valley DGP, with 1.0% to residents of Bendigo & Districts DGP.

Table 4: GP catchment – Unreferred attendances provided by GPs¹ in Murray-Plains DGP by Division of patient address², 2003/04

Division		Unreferred attendances	
Number	Name	No.	% ³
331	Murray-Plains DGP	219,752	91.3
327	Goulburn Valley DGP	7,064	2.9
326	Bendigo & District DGP	2,336	1.0
232	Murrumbidgee DGP	2,333	1.0
332	Mallee DGP	1,748	0.7
330	West Vic DGP	1,277	0.5
301	Melbourne DGP	402	0.2
Other	..	5,807	2.4
Total	..	240,719	100.0

¹ Division of GP based on provider number

² Based on address in Medicare records

³ Proportion of all unreferred attendances to GPs with a provider number in Division 331 by Division of patient address

Additional prevalence estimates: chronic diseases and risk factors combined

Please refer to the earlier *Population health profile of the Murray-Plains Division of General Practice*, dated November 2005, available from www.publichealth.gov.au, for the separate prevalence estimates of chronic disease; measures of self-reported health and risk factors. The process by which the estimates have been made, and details of their limitations, are also described in the 'Notes on the data' section of this earlier profile.

In this section two estimates, which combine the prevalence of selected chronic diseases with a risk factor, are shown for the Division. The measures are of people who *had asthma and were smokers*, and people who *had type 2 diabetes and were overweight or obese*: note that the estimates have been predicted from self-reported data, and are not based on clinical records or physical measures.

It is estimated that there were relatively more people in Murray-Plains DGP who had asthma and were smokers, compared to Australia as a whole (Figure 6, Table 5): that is, the prevalence rates per 1,000 population were higher. However, the rate was consistent with that for country Victoria. There were fewer people in Murray-Plains DGP who had type 2 diabetes and were overweight/ obese, compared to country Victoria or Australia.

Figure 6: Estimates of selected chronic diseases and risk factors, Murray-Plains DGP, country Victoria and Australia, 2001



Table 5: Estimates of selected chronic diseases and risk factors, Murray-Plains DGP, country Victoria, Victoria and Australia, 2001

Variable	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No. ¹	Rate ²	No. ¹	Rate ²	No. ¹	Rate ²	No. ¹	Rate ¹
Had asthma & smoked ³	1,309	24.3	29,424	24.6	95,664	19.9	397,734	20.8
Had type 2 diabetes & were overweight/ obese ⁴	853	11.7	19,136	14.1	69,192	15.1	283,176	15.2

¹ No. is a weighted estimate of the number of people in Murray-Plains DGP reporting these chronic conditions/ with these risk factors and is derived from synthetic predictions from the 2001 NHS

² Rate is the indirectly age-standardised rate per 1,000 population

³ Population aged 18 years and over

⁴ Population aged 15 years and over

Avoidable hospitalisations: hospital admissions resulting from ambulatory care sensitive conditions

The rationale underlying the concept of avoidable hospitalisations is that timely and effective care of certain conditions, delivered in a primary care setting, can reduce the risk of hospitalisation. Admissions to hospital for these ambulatory care sensitive (ACS) conditions can be avoided in three ways. Firstly, for conditions that are usually preventable through immunisation or nutritional intervention, disease can be prevented almost entirely. Secondly, diseases or conditions that can lead to rapid onset problems, such as dehydration and gastroenteritis, can be treated. Thirdly, chronic conditions, such as congestive heart failure, can be managed to prevent or reduce the severity of acute flare-ups to avoid hospitalisation.

This measure does not include other aspects of avoidable morbidity, namely potentially preventable hospitalisations (hospitalisations resulting from diseases preventable through population based health promotion strategies, e.g. alcohol-related conditions; and most cases of lung cancer) and hospitalisations avoidable through injury prevention (e.g. road traffic accidents).

For information on the ambulatory care sensitive conditions and ICD codes included in the analysis in this section, please refer to the *Atlas of Avoidable Hospitalisations in Australia: ambulatory care-sensitive conditions*, available from www.publichealth.gov.au.

In 2001 to 2002, the 3,030 admissions from ambulatory care sensitive (ACS) conditions accounted for 12.6% of all hospitalisations in the Murray-Plains DGP (Table 6, Figure 7), substantially above the levels in Victoria (8.8%) and Australia (8.7%).

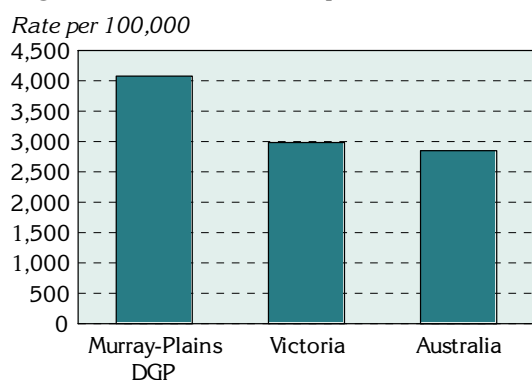
Table 6: Avoidable¹ and unavoidable hospitalisations, Murray-Plains DGP, Victoria, and Australia, 2001/02

Category	Murray-Plains DGP			Victoria			Australia		
	No.	Rate ²	%	No.	Rate ²	%	No.	Rate ²	%
Avoidable ¹	3,030	4,077.1	12.6	145,135	2,983.2	8.8	552,786	2,847.5	8.7
Unavoidable	21,090	30,204.6	87.4	1,510,437	31,088.3	91.2	5,818,199	29,970.7	91.3
Total	24,120	34,352.0	100.0	1,655,572	34,071.5	100.0	6,370,985	32,818.2	100.0

¹ Admissions resulting from ACS conditions

² Rate is the indirectly age-standardised rate per 100,000 population

Figure 7: Avoidable hospitalisations¹, Murray-Plains DGP, Victoria and Australia, 2001/02



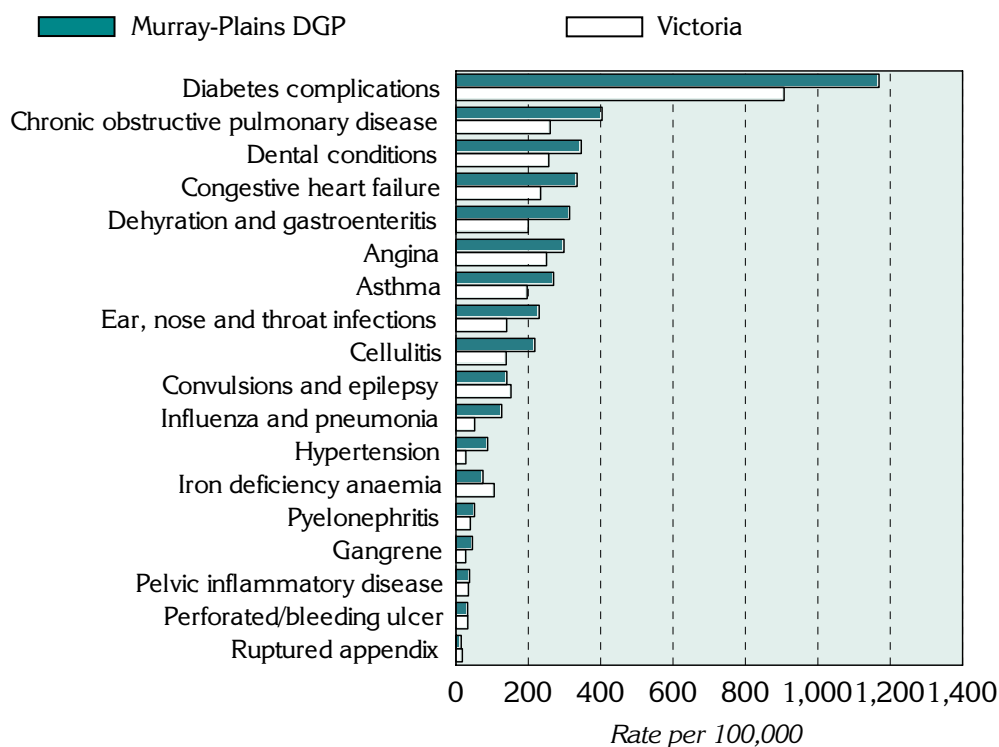
The rate of avoidable hospitalisations in Murray-Plains DGP is markedly higher, a rate of 4,077.1 admissions per 100,000 population, compared to both Victoria (a rate of 2,983.2) and Australia (2,847.5).

¹ Admissions resulting from ACS conditions

Diabetes complications, chronic obstructive pulmonary disease, dental conditions, congestive heart failure and dehydration and gastroenteritis were the five conditions with the highest rates of avoidable hospitalisations in the Murray-Plains DGP (Figure 8, Table 7).

Table 7 shows the number, rate and proportion of avoidable hospitalisations, for the individual ACS conditions, as well as the vaccine-preventable; acute; and chronic sub-categories. The majority of avoidable hospitalisations are attributable to chronic health conditions. The predominance of hospitalisations for chronic conditions in this period can be primarily attributed to the large number of admissions for diabetes complications. Dental conditions and dehydration and gastroenteritis have the highest rates of avoidable hospitalisations for the acute conditions.

Figure 8: Avoidable hospitalisations¹ by condition, Murray-Plains DGP and Victoria, 2001/02



¹ Admissions resulting from ACS conditions: excludes nutritional deficiencies as less than ten admissions, and other vaccine-preventable conditions as number of admissions insufficient

Table 7: Avoidable hospitalisations¹ by condition, Murray-Plains DGP, Victoria and Australia, 2001/02

Sub-category/ condition	Murray-Plains DGP		Victoria		Australia	
	No.	Rate ²	No.	Rate ²	No.	Rate ²
Vaccine-preventable	93	126.7	3,293	68.0	16,573	85.4
Influenza and pneumonia	93	126.7	2,525	52.0	13,021	67.1
Other vaccine preventable	#	..	768	16.0	3,552	18.3
Chronic³	2,091	2,640.1	97,133	1,982.6	352,545	1,816
Diabetes complications	929	1,169.2	44,409	906.9	141,345	728.1
Iron deficiency anaemia	57	75.1	5,196	105.9	16,451	84.7
Hypertension	67	87.6	1,362	27.7	6,354	32.7
Congestive heart failure	282	335.2	11,655	234.1	42,447	218.6
Angina	241	298.7	12,285	250.4	49,963	257.4
Chronic obstructive pulmonary disease	337	404.0	12,850	260.7	54,853	282.6
Asthma	178	270.3	9,376	196.9	41,009	211.3
Acute	961	1,432.3	50,153	1,041.7	200,913	1,035
Dehydration and gastroenteritis	216	314.1	9,761	200.0	37,766	194.5
Convulsions and epilepsy	92	140.7	7,297	152.4	31,137	160.4
Ear, nose and throat infections	149	230.2	6,653	140.5	32,075	165.2
Dental conditions	225	346.3	12,235	256.7	43,667	224.9
Perforated/bleeding ulcer	26	32.6	1,618	32.9	5,795	29.9
Ruptured appendix	9	14.9	855	17.9	3,866	19.9
Pyelonephritis	32	51.5	1,948	40.2	7,386	38.0
Pelvic inflammatory disease	21	38.0	1,693	34.8	6,547	33.7
Cellulitis	155	218.0	6,751	139.0	28,204	145.3
Gangrene	36	46.0	1,342	27.3	4,470	23.0
Total avoidable hospitalisations⁴	3,030	4,077.1	145,135	2,983.2	552,786	2,847.5

¹ Admissions resulting from ACS conditions

² Rate is the indirectly age-standardised rate per 100,000 population

³ Excludes nutritional deficiencies as less than ten admissions

⁴ Sub-category and condition numbers and rates do not add to the reported total avoidable admissions: five conditions (influenza & pneumonia, other vaccine preventable, diabetes complications, ruptured appendix and gangrene) are counted in 'any diagnosis', so may be included in more than one condition group

Not shown or not calculated as there are fewer than five admissions over the period

Avoidable mortality

Avoidable and amenable mortality comprises those causes of death that are potentially avoidable at the present time, given available knowledge about social and economic policy impacts, health behaviours, and health care (the latter relating to the subset of amenable causes).

For information on the avoidable and amenable mortality conditions and ICD codes included in the analysis in this section, please refer to the *Australian and New Zealand Atlas of Avoidable Mortality*, available from www.publichealth.gov.au.

Over two-thirds (70.7%) of all deaths in Murray-Plains DGP at ages 0 to 74 years over the period 1997 to 2001 are considered to be avoidable, consistent with the proportion for country Victoria (70.8%) (Table 8). Deaths amenable to health care (amenable mortality, a subset of avoidable mortality) accounted for 29.0% of all deaths at ages 0 to 74 years in Murray-Plains DGP, consistent with the 28.7% in country Victoria.

Table 8: Avoidable and unavoidable mortality (0 to 74 years) by area, Murray-Plains DGP, country Victoria, Victoria and Australia, 1997 to 2001

Mortality category	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹
Avoidable	808	224.8	14,812	221.0	45,466	201.3	189,845	211.8
% of total	70.7	..	70.8	..	70.9	..	71.5	..
(Amenable)	(331)	(90.2)	(6,001)	(88.2)	(18,406)	(81.4)	(76,249)	(85.1)
(% of total)	(29.0)	(..)	(28.7)	(..)	(28.7)	(..)	(28.7)	(..)
Unavoidable	334	91.6	6,100	90.0	18,617	82.4	75,582	84.3
% of total	29.2	..	29.2	..	29.1	..	28.5	..
Total mortality	1,143	316.5	20,912	311.0	64,083	283.7	265,427	296.1
%	100.0	..	100.0	..	100.0	..	100.0	..

¹ Rate is the indirectly age-standardised rate per 100,000 population

Rates of avoidable mortality were higher for males than for females in each of the comparator areas. Murray-Plains DGP's rate of avoidable mortality for males was 304.9 deaths per 100,000 males, higher than the rate of 142.9 for females. The rate of amenable mortality for males in the Division was also higher, 107.2, compared to 72.3 for females, a rate ratio of 1.48 (Figure 9, Table 9).

Figure 9: Avoidable and amenable mortality by sex (0 to 74 years), Murray-Plains DGP, country Victoria, Victoria and Australia, 1997 to 2001

Note: the different scales

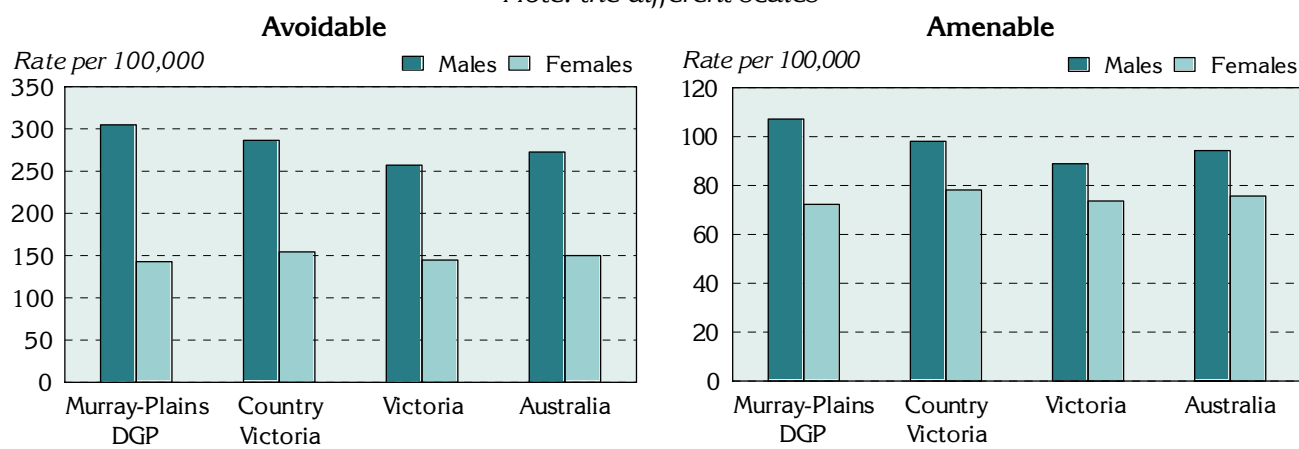


Table 9: Avoidable and amenable mortality (0 to 74 years) by sex, Murray-Plains DGP, country Victoria, Victoria and Australia, 1997 to 2001

Mortality category and sex	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹
Avoidable								
Males	561	304.9	9,664	286.5	29,042	257.0	123,026	272.6
Females	248	142.9	5,148	154.5	16,424	144.8	66,819	150.1
Total	808	224.8	14,812	221.0	45,466	201.3	189,845	211.8
Rate ratio–M:F²	..	2.13**	..	1.85**	..	1.77**	..	1.82**
Amenable								
Males	205	107.2	3,386	98.1	10,052	88.9	42,568	94.3
Females	126	72.3	2,615	78.2	8,354	73.7	33,681	75.7
Total	331	90.2	6,001	88.2	18,406	81.4	76,249	85.1
Rate ratio–M:F²	..	1.48**	..	1.25**	..	1.21**	..	1.25**

¹ Rate is the indirectly age-standardised rate per 100,000 population

² Rate ratio (M:F) is the ratio of male to female rates; rate ratios differing significantly from 1.0 are shown with * p < 0.05; ** p < 0.01

Another way of measuring premature mortality is to calculate the number of years of life lost (YLL)¹, which takes into account the years a person could have expected to live at each age of death based on the average life expectancy at that age.

The numbers of YLL for Murray-Plains DGP, country Victoria, Victoria and Australia over the period of analysis are shown in Table 10 by mortality category. However, given the substantial variations in the populations of these areas, a comparison of the proportion of YLL for each area is also shown.

YLL from avoidable mortality accounted for 70.6% of total YLL (0 to 74 years) for Murray-Plains DGP, slightly lower than the proportion for country Victoria. The proportion of YLL from amenable mortality for Murray-Plains DGP (28.4%) was consistent with that for country Victoria (28.1%).

Table 10: Years of life lost from avoidable mortality (0 to 74 years), Murray-Plains DGP, country Victoria, Victoria and Australia, 1997 to 2001

Mortality category	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No.	% of total	No.	% of total	No.	% of total	No.	% of total
Avoidable	13,611	70.6	253,666	71.2	790,054	71.5	3,327,375	71.9
(Amenable)	(5,481)	(28.4)	(100,131)	(28.1)	(310,758)	(28.1)	(1,298,430)	(28.0)
Unavoidable	5,678	29.4	102,576	28.8	315,555	28.5	1,303,289	28.1
Total	19,289	100.0	356,242	100.0	1,105,610	100.0	4,630,664	100.0

¹ Years of life lost were calculated using the remaining life expectancy method (this provides an estimate of the average time a person would have lived had he or she not died prematurely). The reference life table was the Coale and Demeny Model Life Table West level 26 female (for both males and females), with the YLL discounted to net present value at a rate of 3 per cent per year.

In each of the areas in Table 11, the majority of avoidable mortality at ages 0 to 74 years occurred in the 65 to 74 year age group (Table 11), with 1,436.4 deaths per 100,000 population in the Murray-Plains Division. The 45 to 64 year age group accounted for the next highest rate of avoidable death in all of the comparators, with a rate 318.6 in the Murray-Plains Division.

Table 11: Avoidable and amenable mortality by age, Murray-Plains DGP, country Victoria, Victoria and Australia, 1997 to 2001

Mortality category and age (years)	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹
Avoidable								
0-14	25	36.8	416	29.9	1,290	27.1	5,669	28.8
15-24	23	65.8	507	61.8	1,627	49.3	7,045	52.8
25-44	75	87.1	1,615	88.6	5,705	78.9	24,356	83.9
45-64	261	318.6	4,881	320.7	15,004	286.9	64,282	304.9
65-74	425	1,436.4	7,393	1396.1	21,840	1306.6	88,493	1,358.1
Total	808	224.8	14,812	221.0	45,466	201.3	189,845	211.8
Amenable								
0-24	19	17.4	352	15.5	1,189	14.9	5,083	15.4
25-44	24	27.1	419	22.3	1,382	19.1	5,946	20.5
45-64	107	131.2	2,091	137.4	6,489	123.8	27,464	130.3
65-74	181	613.2	3,139	593.1	9,348	558.6	37,756	579.4
Total	331	90.2	6,001	88.2	18,406	81.4	76,249	85.1

¹ Rate is the indirectly age-standardised rate per 100,000 population

Table 12 shows the number and age-standardised death rate by selected major condition group and selected causes included in the avoidable mortality classification.

The highest rates of avoidable mortality for the selected major condition groups in the Murray-Plains DGP were for cancer, with a rate of 75.5 deaths per 100,000 population, and cardiovascular disease, 66.0 deaths per 100,000 population (Table 12, Figure 10). For the selected causes within the condition groups, the two major causes of avoidable mortality were ischaemic heart disease and lung cancer, with rates of 51.2 per 100,000 population and 25.3 per 100,000, respectively.

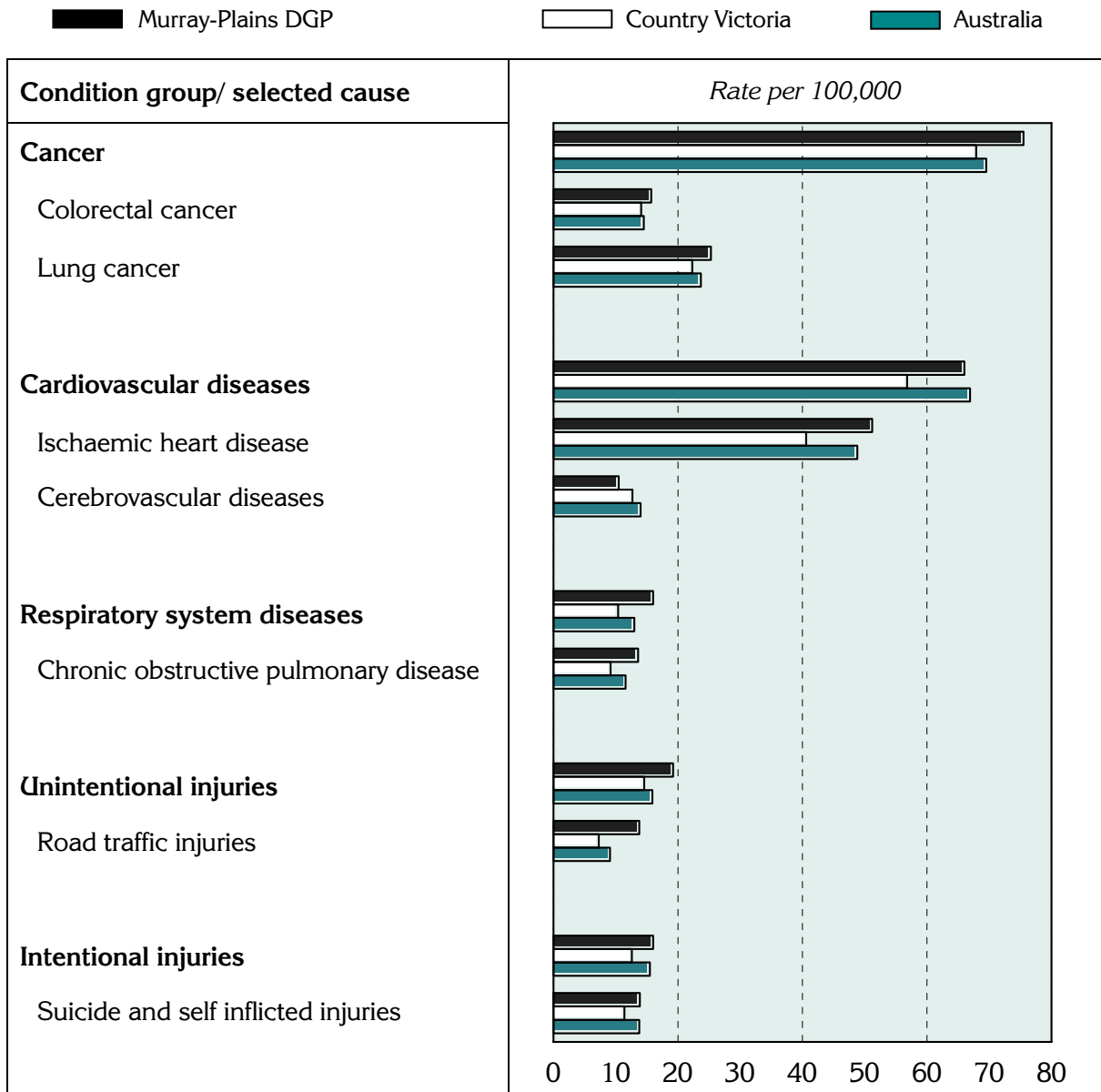
Table 12: Avoidable mortality (0 to 74 years) by major condition group and selected cause, Murray-Plains DGP, country Victoria, Victoria and Australia, 1997 to 2001

Condition group/ selected cause	Murray-Plains DGP		Country Victoria		Victoria		Australia	
	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹	No.	Rate ¹
Cancer	281	75.5	5,074	74.2	15,813	69.8	62,338	69.5
Colorectal cancer	59	15.7	1,133	16.5	3,351	14.8	13,008	14.5
Lung cancer	97	25.3	1,739	25.0	5,244	23.1	21,208	23.7
Cardiovascular diseases	253	66.0	4,666	67.0	13,612	60.0	59,945	66.9
Ischaemic heart disease	197	51.2	3,432	49.3	9,809	43.3	43,712	48.8
Cerebrovascular diseases	40	10.5	934	13.4	2,947	12.9	12,558	14.0
Respiratory system diseases	62	16.0	977	13.9	2,621	11.5	11,612	13.0
Chronic obstructive pulmonary disease	54	13.6	888	12.5	2,339	10.2	10,395	11.6
Unintentional injuries	55	19.2	1,142	19.3	3,536	15.9	14,224	15.9
Road traffic injuries	39	13.8	739	12.5	1,931	8.7	8,138	9.1
Intentional injuries	45	16.0	946	16.2	3,020	13.6	13,891	15.5
Suicide and self inflicted injuries	39	13.9	875	15.0	2,752	12.3	12,393	13.8

¹ Rate is the indirectly age-standardised rate per 100,000 population

Rates in the Division were above or consistent with those in country Victoria and Australia for the condition groups and selected causes shown, other than for cerebrovascular diseases (Figure 10).

Figure 10: Avoidable mortality (0 to 74 years) by major condition group and selected cause, Murray-Plains DGP, country Victoria and Australia, 1997 to 2001



Notes on the data

Data sources and limitations

General

References to 'country Victoria' relate to Victoria excluding the Melbourne Statistical Division.

Data sources

Table 13 details the data sources for the material presented in this profile.

Table 13: Data sources

Section	Source
Population	
Figures 1 and 2; Table 1	Estimated Resident Population, ABS, 30 June for the periods shown
Figure 3	Estimated Resident Population, ABS, 30 June 2005; Population Projections, ABS, 30 June 2020 (unpublished) ¹
Additional socio-demographic indicators	
Figure 4	ABS SEIFA package, Census 2001
Table 2; Figure 5; Map 1	Jobless families, ABS, 2001 (unpublished)
Table 2; Figure 5; Map 2	Private health insurance, from Hansard
GP services – patient flow/ GP catchment	
Tables 3 and 4	Medicare Australia, 2003/04
Additional prevalence estimates: chronic diseases and risk factors combined	
Figure 6; Table 5	Estimated from 2001 National Health Survey (NHS), ABS (unpublished)
Avoidable hospitalisations: hospital admissions resulting from ambulatory care sensitive conditions	
Tables 6 and 7; Figures 7 and 8	National Hospital Morbidity Database at Australian Institute of Health & Welfare, 2001/02; data produced in HealthWIZ by Prometheus Information (not available in public release dataset)
Avoidable mortality	
Tables 8, 9, 10, 11 and 12; Figures 9 and 10	ABS Deaths 1997-2001; data produced in HealthWIZ by Prometheus Information (not available in public release dataset)

¹ The projected population at June 2020 is based on the 2002 ERP. As such, it is somewhat dated, and does not take into account more recent demographic trends: it is however the only projection series available at the SLA level for the whole of Australia.

Methods

For background information on the additional prevalence estimates presented in this profile, please refer to the 'Notes on the data' section of the *Population health profile*, November 2005 (www.publichealth.gov.au).

Please also refer to the November 2005 profile for information on the data converters.

Mapping

In some Divisions the maps may include a very small part of an SLA which has not been allocated any population; or has a population of less than 100 or has less than 1% of the SLAs total population; or there were less than five cases (i.e. jobless families, people with health insurance): these areas are mapped with a pattern.

Statistical geography of the Murray-Plains DGP

For information on the postcodes in the Division, please refer the Department of Health and Ageing website <http://www.health.gov.au/internet/wcms/publishing.nsf/Content/health-pcd-programs-divisions-divspc.htm>; also included in table format in the 'Notes on the data' section of the *Population health profile*, November 2005 (www.publichealth.gov.au).

Statistical Local Areas (SLAs) are defined by the Australian Bureau of Statistics to produce areas for the presentation and analysis of data. In this Division, some Local Government Areas (LGAs) have been split into SLAs. For example, Campaspe has four SLAs, Echuca, Kyabram, Rochester and South, all or parts of which are in this Division. These SLAs, and all or parts of other SLAs, comprise the Division (Table 14).

Table 14: SLAs and population in Murray-Plains DGP, 2005 on 2001 boundaries

SLA code	SLA name	Per cent of the SLA's population in the Division*	Estimate of the SLA's 2005 population in the Division
11850	Conargo	100.0	1,375
12500	Deniliquin	100.0	8,169
15500	Murray	100.0	6,729
17800	Wakool	48.7	2,357
18300	Windouran	100.0	407
21271	Buloke - North	31.2	1,081
21272	Buloke - South	42.1	1,495
21371	Campaspe - Echuca	100.0	12,426
21374	Campaspe - Kyabram	16.4	2,094
21375	Campaspe - Rochester	100.0	8,801
21376	Campaspe - South	3.5	132
22250	Gannawarra	100.0	11,809
22628	Greater Bendigo - Part B	13.5	1,563
23943	Loddon - North	100.0	3,431
23945	Loddon - South	74.8	3,689

* Proportions are approximate and are known to be incorrect in some cases, due to errors in the concordance used to allocate CDs to form postal areas

Acknowledgements

Funding for these profiles was provided by the Population Health Division of the Department of Health and Ageing (DoHA).

Further developments and updates

When the re-aligned boundaries are released and DoHA have made known their geographic composition, PHIDU will examine the need to revise and re-publish these profiles (*Population health profile*, dated November 2005, and the *Population health profile: supplement*, dated March 2007).

PHIDU contact details

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