

1. Health and healthcare

The health status of an individual is more determined by social, economic, environmental, behavioural and genetic factors than access to health care itself.

The World Health Organization (WHO) describes health as a state of complete physical, mental and social wellbeing and not merely the absence of disease or infirmity (WHO 1946)

In 2002-03 \$72 billion was spent on health care in Australia representing about 9.3 percent of Australia's Gross Domestic Product which compares with 14.3 percent in the United States and 7.7 percent in the United Kingdom¹. In contrast to the World Health Organization's broad definition of health, the ways in which health services have been planned, delivered and reported in Australia and the western world generally has been dominated by ill health and its treatment, frequently in acute hospitals or clinical settings.

One of the key achievements of the twentieth century has been the unprecedented improvement in health, with major improvements in life expectancy. Between 1901 and 2001, the average life expectancy of Australian males increased from 55 years to 77 years, and for Australian females from 58 years to 83 years. The major improvements to health and life expectancy in the early part of the century were due to improved sanitation and living conditions, a reduction of maternal and infant mortality and the discovery of antibiotics. General improvements in economic conditions, healthy lifestyles and continuous improvements in health care were responsible for health improvements in the later part of the century.

Today chronic disease is the greatest cause of ill health in Australia, this includes heart disease, stroke, diabetes, cancer, depression and injury. Much of this burden of disease is preventable through changes in individuals' diet, smoking cessation and increased physical activity.

Despite the significant improvements to health status generally, Indigenous Australians continue to have much lower life expectancy than other Australians with an average life expectancy twenty years less than non-Indigenous Australians. Australians from lower socioeconomic groups also have poorer health compared to the general population. A just public health system should pay particular attention to such imbalances.

Life expectancy has improved significantly over the past century for the majority of Queenslanders with the focus of prevalent disease moving from communicable disease to lifestyle or chronic disease.

1.1 The Health System

Australia's health system is a complex mixture of public and private sector health service providers and a range of funding and regulatory mechanisms. In comparison to health systems in other countries a unique characteristic of the Australian system is that both the public and private sectors are substantially funded/subsidised by government. In many respects, the high level of government involvement has led to care of patients being

¹ Health Expenditure Australia 2002-03 (2004)

organised around funding arrangements rather than the funding arrangements supporting a planned/consumer centred approach to health.

For the purpose of this chapter the health system includes the following categories of activities/services:

- health promotion/illness prevention activities
- primary and community health care including general practice
- secondary and tertiary care (public and private hospitals) and
- aged care.

Across and between these key areas of health activity there is a complex regulatory, funding and policy framework with involvement from various levels of government, non-government organisations, service providers and individuals. The roles and responsibilities of the key players in the health system are described below.

The Commonwealth Government is the primary funder of health services in Australia but has a limited role in directly providing health services. The Commonwealth funds health promotion, primary health care through Medicare rebates to general practice, around 50 percent of public hospital costs, rebates for specialist procedures performed in private hospitals, subsidises private health insurance, pharmaceuticals and aged care services through either capped grants or open ended fee for service arrangements.

In 2002-03 the Commonwealth allocated around \$33.3 billion to health which represents around 46 percent of all health expenditure in Australia.

From a medical workforce perspective the Commonwealth also plays a key role in funding university places for clinical positions and in particular medicine. It also administers the availability of medical provider numbers which determines whether a medical practitioner can access the Medical Benefits Schedule, a key source of income for Australian medical practitioners. The implication of these medical workforce supply controls will be discussed in a later part of this chapter.

State and Territory governments, through income raised by State taxes and from both general (GST revenue) and specific purpose grants received from the Commonwealth, contribute funding for, and deliver a range of health care services including public hospitals. Queensland, to a greater extent than other states, it has continued to support public specialist outpatient clinics. State and Territory governments also fund and provide other services such as public health programs (health promotion and disease prevention programs), community health services (including services specifically for Indigenous people), mental health programs, patient transport and public dental services to some degree in all states. States and territories are also responsible for the regulation, inspection, licensing and monitoring of premises, institutions and personnel, and health policy research and development.

State and territory governments are responsible for the legislation concerning the accreditation of the clinical workforce. However this function is carried out by independent statutory bodies for example the Queensland Medical Board and the Queensland Nursing Council. Another key role of state and territory governments is the provision of training and supervision for graduate doctors, nurses and other clinical staff in public hospitals.

Local governments across Queensland provide, to varying degrees, a range of public and environmental health services which may include immunisation clinics, health promotion, drug and alcohol response activities, food hygiene premises licensing, waste collection and disposal, licensing of environmentally relevant premises, mosquito and vermin control and public safety and noise control activities.

The non-government sector, which includes profit and not for profit organisations, play a significant role in the health system, delivering general practice and specialist medical and surgical services, dental services, a range of other allied health services (such as optometry and physiotherapy), private hospital and high level residential aged care services. Non-government organisations also provide, largely through funding from governments, a range of health promotion, education and support services, domiciliary nursing and other home-based care and support and palliative care services.

Universities and colleges play a crucial role in the provision of education for medicine, nursing and allied health professionals. Specialist medical colleges play a role in the training and development of specialist medical staff.

The Australian Council of Healthcare Standards is an example of a non-government organisation that provides a third party accreditation system for health care facilities including Queensland public hospitals.

The delineation of responsibilities across levels of government and the non-government sector has resulted in the development of separate systems (eg. funding and data collection systems) which have imposed artificial boundaries and impeded the delivery of best practice care. The system reflects varying degrees of introspection with each component of the system lacking any real incentive to work across other areas to best meet the overall needs of the health consumer.

These arrangements are further constrained by the current funding arrangements which have created conflicting priorities resulting in incentives to cost shift between different levels of government and the public and private sector. The most significant opportunity in the medium term for the health system would be to simplify and reorganise the health funding, policy and regulatory roles of the different levels of Government.

1.1.1 Health system fragmentation

A key criticism of the Australian health system is that each level of government has principal responsibility for different health services. Where access to general practitioner (GP) services is inadequate (a Commonwealth responsibility), there is arguably an impact on public hospital emergency departments (a state/territory responsibility). In addition, states and territories, providers of public hospital services are impacted from a lack of suitable aged care services (a Commonwealth responsibility) which leaves frail non-hospital type patients unable to leave costly acute care beds. By not having adequate pre-hospital and post-hospital accommodation options and incentives to investigate these options, the health system will continue to be characterised by fragmentation.

The following table illustrates the complexity of the health funding and service delivery environment in Australia by showing a range of primary, acute and sub acute services.

The table describes the roles and responsibilities of government and non-government organisations in the provision of key health services. The table is not intended to be exhaustive rather show the complexity of the system from the perspective of the consumer facing the many health service alternatives in addition to the public/private models and funding arrangements.

Service provision by public, private and non-government organisations

Service Type	Service Delivery	Comments
Birthing Services	Birthing care types include: <ul style="list-style-type: none"> • Private care (35.1%) • Public care shared with a GP (34.8%) • Public care in hospital (29.1%) Source: <i>Review of Maternity Services in Queensland (2005)</i>	<p>Private care – Hospital costs are met by the consumer and where applicable private health insurance. The doctor may charge a fee that exceeds the Medicare schedule fee which is met by the consumer. The Commonwealth government funds the schedule fee payment.</p> <p>Public care shared with a GP – Hospital costs are met through funding from the State and Commonwealth governments. The State government is responsible for public hospitals. Where the GP charges an amount above the scheduled fee (funded by the Commonwealth, the consumer pays the gap between the fee charged and the rebate.</p> <p>Public care in hospital - Costs are met through funding from the State and Commonwealth governments. State governments are responsible for public hospitals. There are no out of pocket costs for consumers.</p>
	Providers of child immunisation services are: <ul style="list-style-type: none"> • General practitioners (66%) • Local Government (15%) • Public Hospital (6%) • Community Health Centre (10%) • Other (3%) Source: <i>Productivity Commission (2004)</i>	Immunisations provided by GPs for children aged 7 years and under are funded by the Commonwealth Government through grants to State Governments and fee for service payments to GPs. State governments contribute funding for the management and distribution of vaccines and related information. Local governments receive Commonwealth funding to provide immunisation services but it is lower than GP's.
Primary Care Services	General practitioners	Around 70% of GP attendances in Queensland are bulk-billed. This means that 30% of GP attendances have an out of pocket cost for the consumer.
	Queensland Health plays a strong primary care role in communities that do not have access to private general practice clinics.	Queensland Health's expenditure on community health has grown by 42% (\$68 million) in the past four years. However, compared to the Australian average, Queensland spent \$85 less per capita on community health (Australian Institute of Health and Welfare 2004).

Service provision by public, private and non-government organisations

Emergency Department Services	Public Hospitals	Public hospitals are jointly funded though capped grants by the Commonwealth and State governments. Access is based on clinical need. The state government is responsible for public hospitals. There is no out of pocket cost for consumers. The cost of the service ranges between \$772 for critical cases to \$174 for non-urgent cases (based on NHDC round 7 data) on the basis of activity.
	Private Hospitals	Private hospitals source the majority of their revenue from individuals and where applicable private health insurers. Private hospital doctors charge patients a fee which is eligible for reimbursement from the Commonwealth government. There may be an out of pocket cost for the consumer.
Hospital Services	Public Hospitals	Public hospitals are jointly funded through capped grants by the Commonwealth and State governments. Services are prioritised based on clinical need. The State government is responsible for public hospitals. There is no out of pocket cost for consumers.
	Private Hospitals	Private hospitals source the majority of their revenue from private health insurers, individuals and the Commonwealth government. Private hospitals are funded on the basis of activity. There is likely to be an out of pocket cost for consumers.
Residential Aged Care	Services are mostly delivered by non-government organisations.	Two levels of residential care are provided across Australia. High care (previously known as nursing homes) and low care (previously known as hostels).
	Queensland Health owns and operates 22 facilities which provide high care services for approximately 1600 residents.	The Commonwealth Government manage and fund this program with a co-payment from individuals.

Conclusion

The complexity of health funding and service delivery arrangements causes consumer confusion and results in enormous anomalies in the payment of doctors in private practice compared with those employed in the public sector.

1.1.2 Public and private hospital funding

There are some major differences in the way public and private hospitals are funded. Most notably the difference is that public hospitals operate in a fixed budget environment while private hospitals receive revenue based on activity or throughput. The different funding arrangements between the public and private sector drives very different behaviour between the sectors.

The private sector is motivated to increase patient throughput because the revenue is attached to the number of patients seen and the type of care provided. Therefore private hospitals are motivated to attract additional doctors and patients. In contrast, the public sector receives a fixed grant to provide a range of medical and surgical services for the community. Because budgets are fixed year to year, if the level of activity increases beyond the level planned, the following options are available to manage this:

- Increase the efficiency of the cost per patient to increase throughput
 - pressure to reduce length of stay and bed numbers
 - cost focus which may lead to short staffing
- Prioritise access based on clinical need
 - limiting access to outpatient clinics based on the clinical urgency of the condition
 - access to elective surgery is managed via a waiting list with priority given to urgent cases.
 - emergency department attendances are prioritised based on clinical need which can lead to long waiting times for non urgent conditions.
- Diverting resources for other services to acute services.

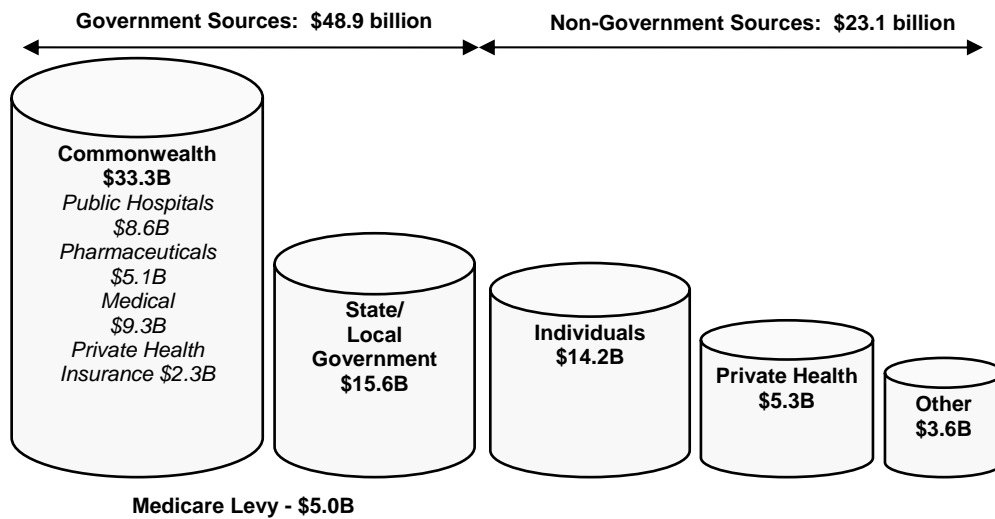
Another distinguishing feature of private hospitals is that medical staff charge patients on a fee for service basis which is eligible for reimbursement from the Commonwealth government up to 75 percent of the schedule fee.

1.1.3 Australian Health System – Sources of Funding 2002-03

The picture below shows the sources of funds for the \$72 billion Australian health sector in 2002-03.

It shows that around two thirds of the funding for the health system is sourced from all levels of Government. Of the \$48.9 billion sourced from Government the Medicare levy, which was introduced in 1984 to cover the cost of Medicare, represented only 10 percent of the Government contribution to health. Over time the Medicare levy has failed to keep pace with the growth in demand and cost of government funded health services.

Australian Health System – Sources of Funding 2002-03



Source: AIHW (2004) *Health Expenditure Australia 2002-03*

Conclusion

The average health consumer in Australia faces a complex health system that has been shaped by funding mechanisms which drive service delivery arrangements. These funding mechanisms have often created conflicting priorities.

Responsibility for health in Australia lies with three levels of government, the non-government sector and individuals which make the health task difficult to manage and understand.

1.1.4 The delivery of health services in Australia

The health care system in Australia today is one which has evolved over many years, with responsibilities for provision of health care services often reflective of the history of practice and funding arrangements rather than a clear policy direction.

The Australian and Queensland health systems are hospital focussed with around \$23.3 billion or one third of all health expenditure in 2002-03 (\$72 billion) related to public and private hospitals². A further \$26.9 billion is spent on medical services, high level residential aged care and pharmaceuticals, expenditure which is largely illness focussed. In comparison, just 2 percent of total health expenditure was allocated to public health activities. The tendency for the system to focus on treatment can be partly attributed to the longstanding structural and funding arrangements that lock systems into historical service models and allow limited flexibility.

Despite the significant investment over time in improving treatment options, research from the United States of America estimated that curative medicine accounted for 3 of the 7 years increase in life expectancy since 1950³. Another study in the United Kingdom

² AIHW HEA (2004) 2002-03.

³ McKeown, T., *The Modern Rise of Population*, Edward Arnold, London, 1976.

showed that the most significant increase in life expectancy has resulted from better nutrition, housing and hygiene rather than curative interventions⁴. It is argued that investment in public health, health promotion and disease prevention has a dual benefit. Not only does it promote health in the short term it reduces the need for hospital based services in the medium to long term.

There are however some very real barriers to increasing expenditure on public health including:

- needs of individuals being prioritised ahead of the health of populations
- community expectations that link health to the level of access to medical care
- current funding arrangements focussed on fee for service treatment services.

The hospital centric model is a consistent theme in health systems around the world. However, a number of factors have led to the demand for hospital services being increasingly unsustainable. These include the increasing demand for services arising from ageing populations, the changing burden of disease away from infectious diseases to chronic conditions, new technologies that make a broader range of enhancing surgery safer for more people and new pharmacology that manage risk factors for disease.

The Queensland Government's *Health 2020* document outlines a strategy to move away from the traditional model of health care over time to protect the sustainability of the health system in Queensland.

1.2 Queensland Health

Queensland Health's role in the Queensland health system is complex and varied. It is the principal provider of health services in Queensland and in some rural and remote areas the only health service provider. Its network of 178 public hospitals and 277 primary and community health centres extends north to the Torres Strait, west to Mt Isa and south to the Gold Coast.

The Queensland Health workforce of around 53,000 individual staff equating to 43,784 full time equivalents (FTEs) provides and supports the delivery of health and health related services which are made up of doctors, nurses and allied health staff as well as administrative, operational and technical staff. As Queensland's largest employer and one of Australia's largest corporations, the complexity of managing and organising Queensland Health is significant.

⁴ Bunker, J., Frazier, H. and Mosteller, F., "The role of Medical Care in Determining Health: Creating an inventory of benefits", Society and Health, Oxford university Press, New York, 1995.

Queensland Health Facts 2003-04

According to the Queensland Health 2003-04 Annual Report, everyday in Queensland Health:

- 506 women are screened for breast cancer
- 1,502 older people receive residential care
- 93 babies are born
- 3,375 are treated in accident and emergency departments
- 7,053 patients are cared for in public hospitals
- 24,082 outpatients receive services
- 963 people receive day-only procedures in a hospital
- 1,450 adult dental appointments
- 1,730 child dental appointments
- 836 school aged children completed dental treatment
- 7,145 meals are delivered to people at home
- 11,263 hours of respite care are provided through respite centres or in people's homes

FacilitiesHospitals⁵

Major cities	19
Regional	81
Remote	34
Very remote	44
Total	178
Aged Care Facilities	22
Primary and Community Health Care Centres	277

Activity⁶

Inpatient separations	721,013
Non-admitted occasions of service	8,741,513
Patient Days	2,617,753

Staff⁷ –FTEs

Clinical

Visiting Medical Officers	240
Medical	3,434
Nursing	16,943
Professional	4,961
<i>Sub total</i>	<i>25,578</i>
Non-clinical	
Operational	8,414
Managerial & Clerical	8,433
Technical	992
Trade & Artisans	365
<i>Sub total</i>	<i>18,204</i>
Total	43,782

Budget 2005-06

Operational Budget	\$5,354 million
Asset Budget	\$549 million
Net Assets	\$3,590 million

⁵ Australian Hospital Statistics 2003-04 (2004)

⁶ Australian Hospital Statistics 2003-04 (2004)

⁷ HRMIS - MOHRI snap shot (fortnight ending 27/03/2005)

The regulatory and governance framework that Queensland Health operates within sets the context for describing Queensland Health's function. According to the *Administrative Arrangements Order 2005*, the Minister for Health is delegated responsibility for 33 Acts as shown at Appendix 4.

In line with other jurisdictions, Queensland Health is responsible for licensing private hospitals (including free-standing day hospital facilities), the legislation governing the registration of medical practitioners and other health professionals and administering legislation governing the operation of public sector health services primarily through the *Health Services Act 1991*.

Queensland Health is also responsible for a range of industry regulations which relate to the health of the general population. There has been significant regulatory reform in recent times including:

- strengthened laws to reduce people's exposure to environmental tobacco smoke and limiting the sale, advertising and supply of tobacco products
- a bill currently before Parliament proposing a more contemporary approach to regulating public health matters which clarifies the respective roles of State and local governments
- current work to reform and simplify regulation of the food industry to reduce the incidence of food borne diseases
- modernised mental health legislation

In Queensland, enforcement of public health legislation is carried out by both the State and local governments and includes such things as animal management programs, waste removal, handling of hazardous materials, food safety and control of infectious diseases.

As noted above, Queensland Health is not the sole provider of health services in Queensland. Queensland Health has a very broad role in improving the health outcomes of Queenslanders which extends from its public health, health promotion and illness prevention activities, primary health care through its network of community health centres, to public hospital, aged and palliative care services. At each stage in the service continuum there is interaction and overlap with the Commonwealth and local governments, other state government departments, and the non-government sector including the private sector. While Queensland Health's focus is broad and far reaching, its 178 public hospitals consume around 64 percent of Queensland Health's \$5.4 billion budget.

1.2.1 History of Health Services in Queensland

Queensland's health system has experienced a unique history with a number of key events defining the way hospital and health services are managed and provided today.

In the early 1900's hospital services in Queensland were organised around community led voluntary schemes. The first steps toward Queensland's free public hospital system were the passing of legislation relating to hospitals in 1923, 1936 and 1944. During this period, public hospitals were transitioned from voluntary schemes to district schemes where funding was sourced from individuals and local and state governments. It was not

until 1946 following the Commonwealth agreeing to fund a portion of the inpatient hospital cost that the Queensland State government's goal of providing free public hospital treatment to residents of Queensland became a reality. The 1944 legislation abolished the voluntary scheme and established hospital boards.

Despite rising costs of public hospitals and political changes over time, successive Queensland governments remained committed to the principle of free universal access to public hospitals. During the 1950's the Commonwealth coalition government introduced a voluntary private health insurance scheme that was heavily subsidised and involved a co-payment for public and private hospital care. The Queensland government rejected this arrangement and maintained free access to public hospitals despite the Commonwealth not funding Queensland for a number of months. The Commonwealth finally agreed that Queensland would be eligible for the subsidy on the understanding that it provided additional services.

In 1975 Medibank was introduced by the federal Labor government, a universal publicly funded health insurance scheme, which among other health policy measures included significant additional resources for state run public hospitals. It was short lived and was slowly dismantled by the incoming federal coalition government with a move progressively back towards a voluntary health insurance scheme. Queensland again maintained free public hospital services. In 1984 the Labor government was elected on the back of an election promise to reinstate Medibank under the new name Medicare.

During the late 1980s and early to mid 1990s, in an attempt to control spiralling health costs, the federal government introduced a number of measures to reduce the supply of doctors. The measures included capping medical school places, cutting the number of GP training places and restricting overseas trained doctors' access to the Medical Benefits Schedule. The full effect of these measures would not be felt for another ten to fifteen years due to the time it takes to train a fully qualified doctor or specialist. This is one of the key reasons for the current doctor supply shortages.

Following the election of a federal coalition government in 1996, Medicare remained relatively unchanged. However, in 1999 the government introduced private health insurance reforms. Incentives were offered in the form of a 30 percent rebate and a 1 percent income tax penalty for those people earning over \$50,000 not taking out private health insurance. An objective of the reforms was to reduce the demand on public hospital services. The impact of these reforms on the public hospital sector is discussed later in the chapter.

Following a steady reduction in the percentage of medical services bulk-billed, the coalition government introduced A Fairer Medicare package in April 2003, estimated to cost \$917 million, which among other measures provided incentives for GPs to bulk-bill health care card holders and provide a safety net for out-of-hospital medical costs above \$1,000. Under much public and political pressure A Fairer Medicare was replaced with MedicarePlus in November 2003.

MedicarePlus, costing an extra \$1.5 billion, extended the A Fairer Medicare Package with more incentives for GPs to bulk-bill and a safety net with lower limits for health care card holders and the general community. Under the Medicare Safety Net, consumers pay only 20 cents in the dollar towards the gap between doctors' fees and the schedule fee above the safety net limit with no cap on the level. Based on the 2005-06 budget, estimates of the cost of the safety net has increased from \$440 million to more than \$1 billion over four years resulting in the Commonwealth Government deciding to reset safety nets to

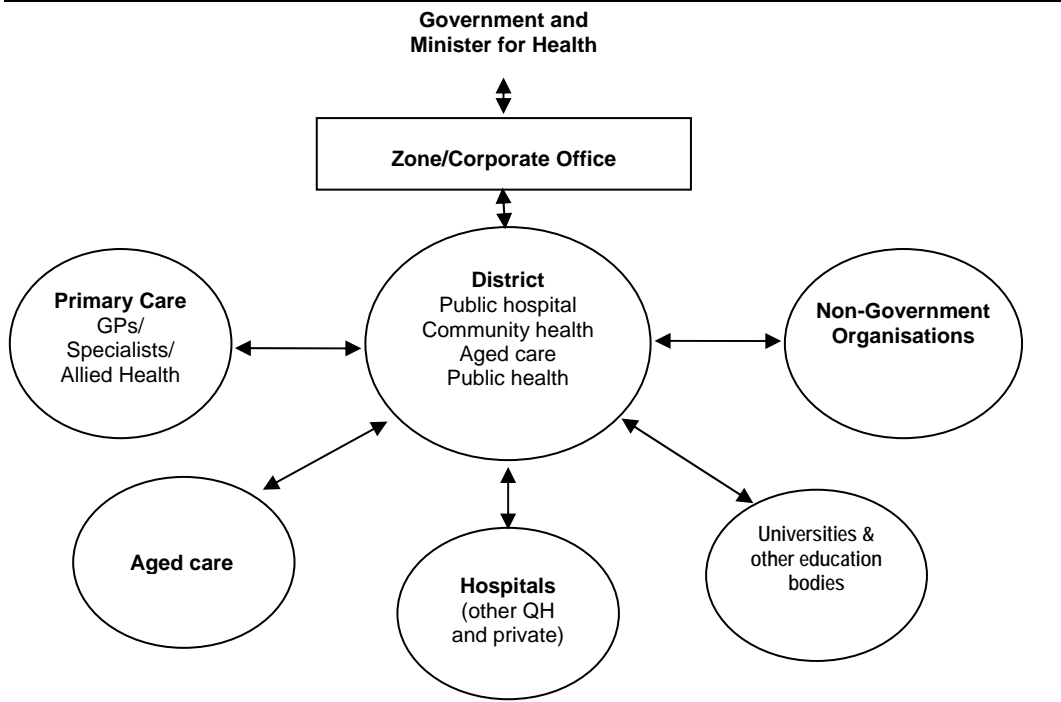
higher levels. Safety nets increased from \$300 to \$500 for concession card holders and \$700 to \$1,000 for non-concession card holders. While MedicarePlus has increased the affordability of out of hospital health care (private specialist care especially), it has widened the gap between public and private sector incomes for doctors.

A diagram showing a summary of these events among others is presented at Appendix 5.

1.2.2 Queensland Health’s Organisational Structure

Queensland Health delivers health services through 37 health service districts, the Mater Public Hospitals and around 1,100 non-government health care providers. The health service district linkages diagram illustrates the many links between key elements of an average district with the zones, Corporate Office and non-government sector. The reality is that the relationships are much more complex and difficult to manage than the diagram would suggest. The formal structure of an average district can be found at Appendix 6.

Health Service District Linkages



The health service districts are split between the Southern, Central and Northern Zones. The Southern Zone extends from the southern banks of the Brisbane River down the east coast to the southern border of Queensland and out to the western border of the state. The Central Zone extends from south of Mackay down the east coast to the Northern banks of the Brisbane River and West to the Queensland border. The Northern Zone covers an area from Sarina North to the Torres Strait and west to the Northern Territory border and is home to almost 600,000 people. A map showing the zonal and district borders is provided at Appendix 7.

Health Service Districts and the Mater Hospitals by Zone

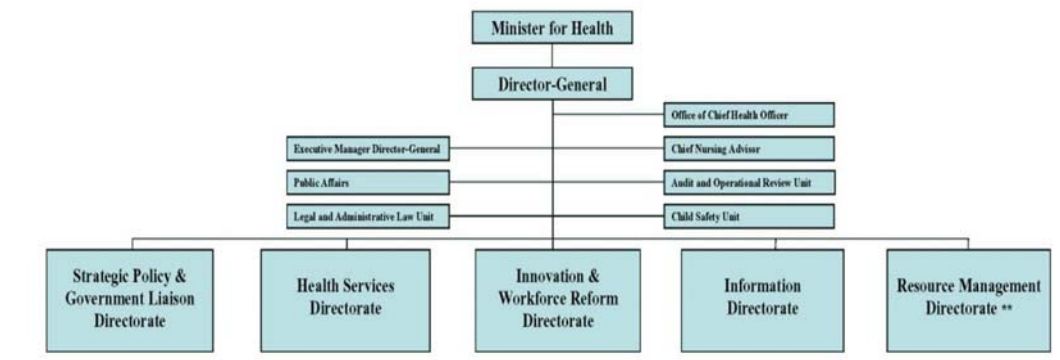
Northern Zone	Central Zone	Southern Zone
Bowen	Banana	Bayside
Cairns	Bundaberg	Charleville
Cape York	Central Highlands	Toowoomba
Charters Towers	Central West	Gold Coast
Innisfail	Fraser Coast	Logan-Beaudesert
Mackay	Gladstone	Mater Hospital
Moranbah	Gympie	Northern Downs
Mt Isa	North Burnett	Princess Alexandra Hospital
Tablelands	Redcliffe-Caboolture	QEI Hospital
Torres Strait and Northern Peninsula Area	Rockhampton	Roma
Townsville	Royal Brisbane and Women's Hospital Health Service District	Southern Downs
	Royal Children's Hospital	West Moreton
	South Burnett	
	Sunshine Coast	
	The Prince Charles Hospital	

The following does not fully take into account the organisational implications of the new Implementation Team for Queensland Health that was announced by the Premier on 26 July 2005. This has resulted in the creation of two Deputy Director-General positions reporting to the new Director General of Queensland Health. At the time of this interim report, it has not been fully determined as to the implications in the short term for reporting arrangements for the five Directorates.

The three zones report through the Health Services Directorate which is one of five Directorates within Queensland Health that report directly to the Director-General. The Queensland Health organisational structure is shown at Appendix 8 with an abridged version shown below. The five Directorates are:

- Strategic Policy and Government Liaison
- Health Services
- Innovation and Workforce Reform
- Information
- Resource Management

Queensland Health Corporate Office Structure



Queensland Health is governed by a Board of Management which comprises the Senior Executive Director from each Directorate. The Board of Management was established to focus on service delivery and lead Queensland Health's strategic intention⁸ to promote a healthier Queensland. Queensland Health has stated that challenges to promoting a healthier Queensland requires fundamental and substantial changes to the current system of health service delivery with a greater emphasis on:

- health promotion, primary prevention and early intervention
- a stronger whole-of-Government approach to the social, economic and environmental determinants of health
- development of community and sub-acute (e.g. rehabilitation) services
- a focus on broadly based health care centres and community hospitals with increasingly specialised teaching hospitals.

The diagram at Appendix 9 shows the link between the implementation of strategy with the roles of each directorate, and work units that report directly to the Director-General.

1.3 Public Hospitals

Queensland's 178 public hospitals provide a wide range of services including emergency, medical, surgical, obstetric and gynaecological, palliative care, paediatrics, psychiatry, rehabilitation, dental, trauma and oncology services. Hospital services are provided on an inpatient basis, increasingly as day-only services, and on an outpatient basis.

Not all hospitals provide the same range of services. The type and level of services that a particular hospital may provide to the public is guided by the *Clinical Services Capability Framework for Public and Licensed Private Health Facilities* (the Framework). The purpose of this framework is to ensure that people receive the right care at the right time and in the right place.

Hospitals which are classified under the Framework as being able to provide less complex services, usually smaller rural hospitals, are linked to hospitals that are able to provide more complex services, usually larger regional and metropolitan hospitals. This relationship is more clearly defined for some specialist services and less defined for others. This model of health service delivery is called a "hub and spoke" model and is only partially rolled out in Queensland. Guidelines for patient retrieval and transfer support the operation of this model.

To a greater extent than other states and territories, Queensland Health provides specialist outpatient clinics services to the public free of charge through the public hospital system. General practitioners refer people requiring hospital services to these outpatient clinics that are staffed by specialists working for, or in, the hospital. These patients have traditionally been seen as public patients, funded by Queensland Health. However, there is a mechanism for specialists who work in the public system and who have the right to private practice, to see patients in outpatient clinics as private patients. This means that in this instance the Commonwealth government funds the service rather than Queensland Health. Each state and territory has different arrangements in place for accessing

⁸ *Queensland Health Ministerial Portfolio Statement 2004-5*

outpatient clinics. In Queensland these services are predominantly provided as public patients. However in recognition of the proportionately high level of public outpatient activity in Queensland, the Commonwealth government has allowed Queensland specialists working in public hospitals to bill Medicare as long as the level and type of publicly provided services do not fall below those provided in 1998.

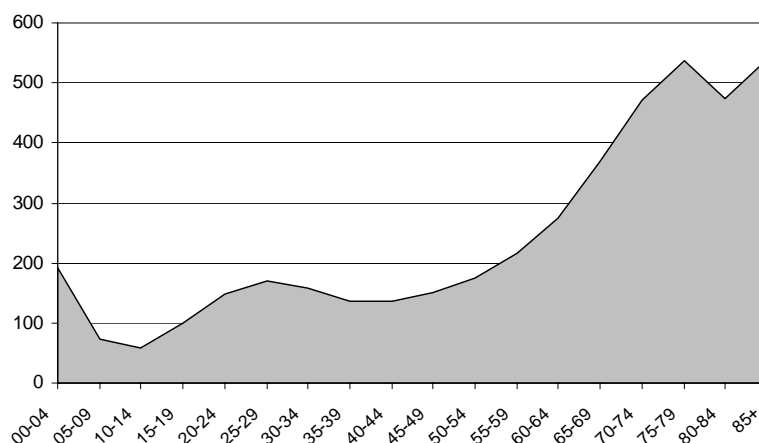
Queensland Health also provides a statewide pathology service that supports clinical care in its hospitals. Unlike other states and territories which have private laboratories, pathology services in Queensland are provided by a network of 33 laboratories across the state. This means that pathology tests taken in one hospital are accessible by other hospitals, reducing duplication of testing and enhancing clinical decision making.

1.3.1 Admitted Public Hospital Services

Public hospital admissions in Queensland have grown by 4.7 percent over the period 2000-01 and 2003-04. In 2003-04 there were 721,013 admissions providing around 2.5 million patient days.

The following graph shows that public hospital admissions presented as a rate per 1,000 of the population for people aged over 50 increases rapidly. While people aged 65 years and over represent 12 percent of the population, they account for 29 percent of total public hospital admissions. Furthermore, this group consumes 43 percent of total public hospital patient days which reflects the higher length of stay for this age group. Like the Australian population, Queensland’s population is projected to age at a rapid rate which will have implications for health service provision and planning in the short, medium and long term. It is unlikely that the current model of care would be sustainable to meet the needs of this growing population group.

Queensland Public Hospital Admissions per 1,000 by age



Source: Queensland Health Information Centre

It is for this reason that greater preventative and community based services must be devoted to preventing people requiring acute services as well as increasing the performance of acute services. As an example in point, take renal dialysis.

Increasing Pressure Point – Renal Dialysis

Renal dialysis is one area of growth which has been identified as being a particular issue for Queensland. According to the Clinical Practice Improvement Centre, Renal Collaborative the net rate of growth of renal dialysis patients (in both the public and private sector) in Queensland is 7.6 percent per annum. This demand continues to place a significant burden on the resources of Queensland Health who provide over 83 percent of dialysis care capacity.

A large proportion of renal dialysis services are provided to Aboriginal and Torres Strait Islander peoples. With demand for these services growing and the health outcomes for Aboriginal and Torres Strait Islanders significantly worse than non-indigenous Queenslanders, further focus will be required on prevention and treatment of renal disease. An increase focus on healthier lifestyle, as described in chapter 2, could reduce the demand for renal dialysis in the long term.

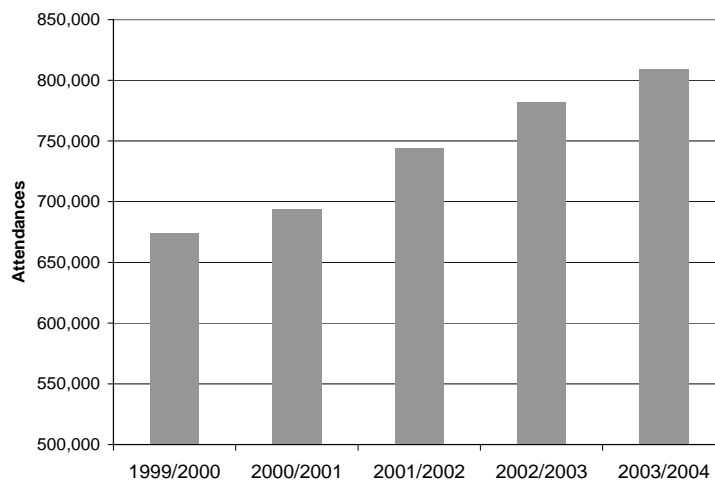
1.3.2 Non-admitted hospital services

Queensland Health provides a range of hospital-based emergency medical and surgical treatments on an outpatient basis. The types of non-admitted services provided by Queensland public hospitals include:

- specialist outpatient services
- emergency department activity
- radiology/imaging services
- pathology services
- pharmacy services
- drug and alcohol services
- allied health services

Over the past four years, Queensland non-admitted patient occasions of service have remained relatively stable growing by only 2.3 percent over this period. In 2003-04, 8.7 million non-admitted patient occasions of services were provided by Queensland public hospitals.

A very visual element of Queensland Health's health service is public hospital emergency departments. Over the period 1999 to 2005 activity in public hospital emergency departments has increased by 23.5 percent compared to 12.9 percent population growth. The graph below shows the increasing trend in emergency department activity over this period.

Emergency Department Attendances (all categories) - Queensland Hospital

Source: Queensland Health Information Centre

1.4 Community Health Services

Historically Queensland has had a smaller, less developed community health sector than in other states, creating a high reliance on privately provided primary health care. This is reflected in the nationally reported expenditure data which indicates that Queensland's community health expenditure per person is less than half the Australian average.

Queensland Health operates 277 community and primary health centres that provide non-acute primary health care services. The services provided by these community services vary according to local needs and include:

- allied and multidisciplinary health services
- health promotion
- counselling
- disease management and prevention
- child and youth including parenting programs such as the Triple P Program and the Youth Suicide and Prevention Program
- oral health services for adults who are holders of health care or disability cards and school dental services
- mental health services
- alcohol and drug services
- sexual health services
- Home and Community Care services
- medical aids
- ethnic and Indigenous health services
- specific population based services (eg Violence Against Women, Mobile Women's Health Team)

It should be noted that these are typical of the sorts of services that are provided in the community health setting however are not comprehensively implemented in all community health facilities. The provision of community health services is characterised by fragmentation between districts and a lack of integration with acute care services.

Community services are guided by the *Queensland Health Position Statement on Primary Health and Community Care Services 2002-7*. This statement lists priority areas for service provision. At this point in time, there is no data as to whether or not community health services reflect these priority areas. This is due to a paucity of planning and performance information at the local and aggregate level.

People can access community health services through a variety of means. They can be referred by health professionals, including staff working within hospitals and general practitioners. People can also attend a community health service without referral.

Queensland Health, through the Statewide Health and Community Services Branch, coordinates the acquisition, development and delivery of health related services from 1,183 government, non-government (community), tertiary and private sector providers. In addition this Branch develops and implements policy and service directions for the priority statewide health services for aged care, palliative care, primary health care, mental health, newborn hearing screening and diagnostic, treatment and early intervention services for hearing impaired newborns, oral health, and a statewide health advice, information, referral and triage service.

1.5 Aged care

Queensland Health provides aged care services through community health services, as detailed above, and through 22 Residential Aged Care Facilities (nursing homes). The Commonwealth Government manage and fund this program. To a greater extent than other states and territories, the Queensland government operate a considerable number of aged care facilities.

Jointly with the Commonwealth government, Queensland Health also provides 13 Multi Purpose Health Services in small rural communities. These services amalgamate acute hospital services, residential aged care services, and community health services including home and community care services. Multi purpose health services are currently located at: Barcaldine; Bauhinia Shire; Clermont; Cooktown; Dirranbandi; Douglas Shire; Inglewood; Jericho Shire; Mundubbera; Quilpie; Texas; Theodore and Woorabinda.

Home and Community Care (HACC) services represent a significant component of aged care services, the funding for which is provided through matching arrangements between the Commonwealth and State government. Services provided under the program include domestic assistance, social support, personal care, home maintenance and modification, meal services, respite care, transport services, allied health services and community-based nursing for frail older people and younger people with moderate to severe disabilities.

Specialist medical, nursing, allied health and other staff provide services in residential facilities and community settings depending on the needs and preferences of clients and carers. Care is delivered in conjunction with general practitioners, non-government service providers and volunteers.

1.6 Public health services

Public health is distinguished from other roles of the health system by its focus on the health and wellbeing of populations, rather than individuals, that is, it is differentiated from other roles of the health system which are primarily responsible for treating illness or providing support to people whose health is compromised. The key objectives of public health are:

- protecting health
- preventing disease illness and injury
- promoting health and wellbeing.

Public health does not reside solely in the province of the public sector, nor is it exclusive to the health sector (public, private or non-government). A broad range of stakeholders has an interest in and contribute directly or indirectly to the field of public health and the attainment of public health outcomes. This includes local government, tertiary education institutions, a range of state and Commonwealth government departments (including education, transport, environment, police, families, primary industries and welfare), non-government and consumer organisations and the private sector. Therefore, a partnership approach is essential to achieving public health outcomes.

Queensland Health has a key role in the provision of the following public health services:

- Development and provision of integrated statewide responses to the prevention of chronic disease, such as addressing overweight and obesity. This includes working with other sectors including education, food industry, local government and transport to develop an environment conducive to physical activity and good nutrition and adequate food supply
- Consistent development, implementation, monitoring, enforcement and evaluation of public health legislation, including food safety and standards, *Health (Drugs and Poisons) Regulation 1996*, *Radiation Safety Act 1999*, *Tobacco and Other Smoking Products Act*
- Coordinated statewide responses to the prevention of communicable disease and management of disease outbreaks, such as dengue fever and meningococcal disease
- Vaccine distribution and monitoring of cold chain maintenance to ensure effectiveness of immunisation programs
- Collaboration with and provision of advice to agencies such as Environmental Protection Agency and Department of State Development on the health implications of proposed industrial, regional and local development, planning and policy initiatives
- Coordination and delivery of statewide population-based cancer screening programs, such as BreastScreen Queensland, Cervical Cancer Screening Program and the recently announced National Bowel Cancer Screening Program. This includes the BreastScreen Queensland and Pap Smear Registries and communication strategies to increase participation
- Provision of advice and support for the development of healthy built environments and other environmental health issues, such as animal management for Indigenous communities

- Development of statewide policy for and planning, implementation and evaluation of prevention programs for priority areas such as injury; skin cancer; mental health promotion; HIV/AIDS; Hepatitis C; sexual health; alcohol, tobacco and other drugs including the coordination and management of the Queensland Needle and Syringe and Drug Diversion programs
- Preparedness planning for disasters, bioterrorism threats and communicable disease pandemics to ensure an effective public health response
- Provision of well baby clinics, positive parenting programs and early intervention programs for children

As the population's burden of disease places greater pressure on acute hospital services, and the impact of inequities in health status related to socioeconomic and Indigenous status, the importance of prevention and a positive view of health is critical in determining the future of health service orientation.

1.7 Resourcing Queensland Health

In 2004-05, the Queensland Health budget was \$5.1 billion, with \$5.4 billion budgeted in 2005-06. The Queensland Health budget has grown by approximately \$2.2 billion since 1997-98, an average annual growth rate of 7 percent per annum. Over the same period Queensland's population has grown by an average of 1.9 percent per year⁹. In addition, health costs are estimated to have grown by an average of 3.5 percent¹⁰ and 5.3 percent¹¹ per year. This suggests that the average annual budget increase for health of 7 percent has kept pace with growth in costs and population.

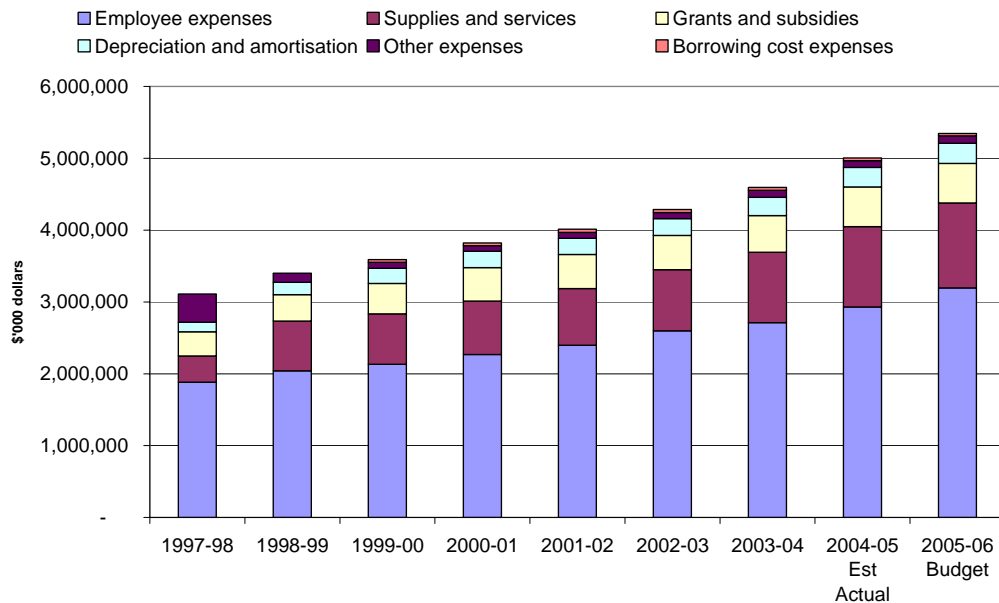
Employee expenses account for approximately 60 percent of Queensland Health's total expenditure with supplies and services representing 22 percent.

⁹ Population by Age and Sex, Australian States & Territories (time series spreadsheets), Australian Bureau of Statistics catalogue no. 3201.0 (released Dec 2004)

¹⁰ 6401.0 Consumer Price Index, Australia TABLE 7F. CPI: Health, Weighted Average of Eight Capital Cities.

¹¹ Average Private Health Insurance Premium increase (1990-00 to 2004-05)

Queensland Health Expenditure 1997-98 to 2005-06

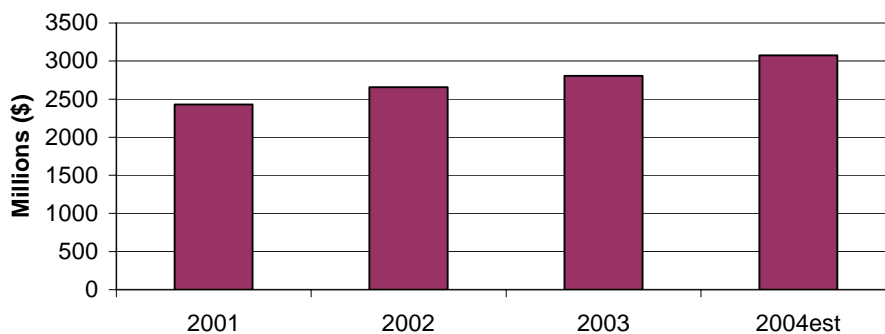


Source: Queensland Health, various Annual Reports and the 2005-06 Ministerial Portfolio Statements

1.7.1 Where does the funding go?

While expenditure is not formally reported by service type, Queensland Health has supplied expenditure estimates for hospital, community, mental health, public health and residential aged care. As noted above the hospital expenditure is the largest expenditure component and based on this information accounts for around 64 percent of the total Queensland Health budget. The graph below shows public hospital expenditure growth over the period 2001-2004 was 29 percent (averaging 10 percent per year) with around \$645 million additional funding provided for public hospitals over the four year period.

Growth in Queensland Public Hospital Expenditure 2000-01 to 2003-04

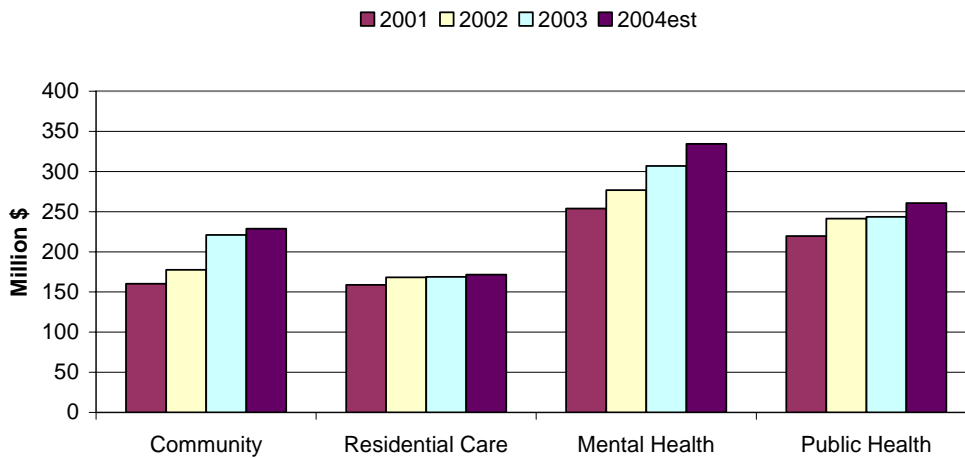


Source: Queensland Health, unpublished data (2005)

Expenditure on non hospital health services represents a much lower proportion of Queensland Health’s total expenditure. The following graph shows that over the period 2001-2004 there has been considerable expenditure growth in Queensland Health’s non-hospital health services including:

- \$228 million (estimate) allocated to community health in 2004 which has grown by an average of 12.9 percent per year since 2001
- \$334 million (estimate) allocated to mental health in 2004 which has grown by around 9.6 percent per year since 2001
- \$260 million (estimate) allocated to public health in 2004 which has grown by an average of 6 percent per year
- residential care has grown at a slower rate of 2.6 percent per year over the period 2001 to 2004.

Queensland Health Growth in Non-Hospital Expenditure



Source: Queensland Health, unpublished data (2005)

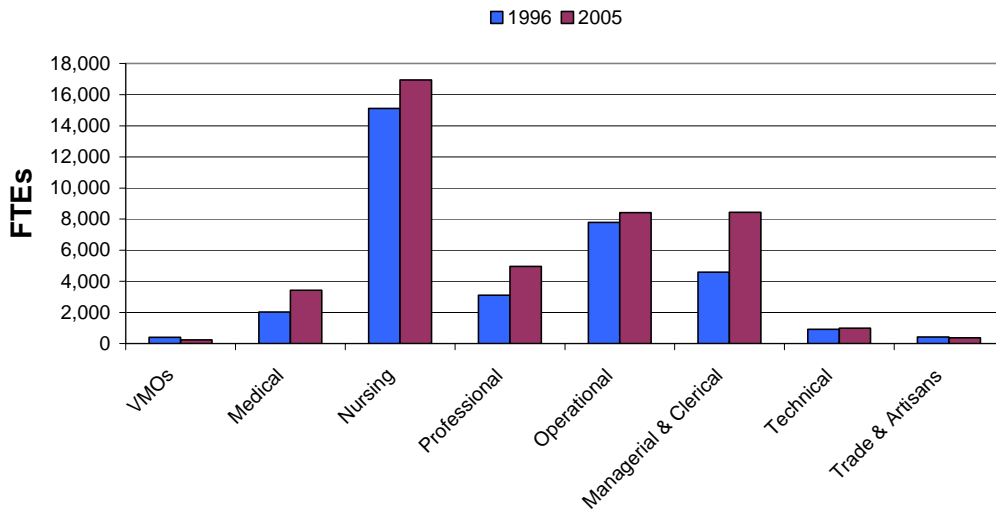
As at April 2005, Queensland Health’s asset base was worth \$5.8 billion (gross) and \$3.5 billion (net). Queensland’s capital investment in health facilities per person has been higher than the national average, with Queensland Health having undertaken a significant upgrade of its infrastructure over the last ten years. Increasing population growth in the South East Queensland corner will require continued investment in health infrastructure into the future.

1.8 Queensland Health Staffing Profile

In March 2005, Queensland Health employed 53,307 personnel equating to 43,782 full time equivalents (FTEs). Clinical staff comprising nurses, medical staff, professional staff and visiting medical officers represent 60 percent of Queensland Health’s full time equivalent employees, while managerial staff and administrators account for a further 19 percent of positions.

The number of Queensland Health FTEs has grown by 27 percent since 1996-97. The key areas of growth have been managerial and clerical staff of 84 percent, medical staff 69 percent and professional staff 59 percent. Growth in nursing staff was 12 percent, while the numbers of operational and technical staff both grew by 8 percent.

Change in the number of full time equivalents by stream 1996 to 2005



Source: Queensland Health Human Resource Information System 2005 Extract

Managerial and clerical staff numbers include all categories of district and corporate office administrative and managerial staff. The Review Team is still assessing the number of issues relating to the growth in Queensland Health managerial and administrative staff including:

- Over the last ten years, the proportion of clinical and non-clinical staff in Queensland Health has remained relatively stable at 60 percent clinical and 40 percent non-clinical.
- Managerial and clerical staff (FTEs) increased from 13 percent of the total Queensland Health workforce in 1996 to 19 percent in 2005. In comparison, medical staff increased from 6 percent of all staff to 8 percent whereas nurses fell from 43 percent to 38 percent over the same period.

Visiting medical officers are employed by Queensland Health on a contract basis to provide specialist services and in some cases support the training of specialist trainees. Over the period 1996 to 2005, the number of visiting medical officers (headcount) employed by Queensland Health has declined from 883 to 851. However the number of VMO hours has declined significantly, with a resultant reduction in the number of visiting medical officer FTEs of 41 percent over the same period. The reduction in VMO hours has been offset by a general increase in salaried medical officers including doctors employed from other countries.

1.8.1 Provisionally registered doctors

Queensland Health is heavily reliant on the recruitment of provisionally registered doctors who are generally overseas trained recruited under the area of need provisions in the *Medical Practitioners Registration Act 2001*.

Based on data supplied by Queensland Health, of the 3,433 full time equivalent doctors employed by Queensland Health in 2004-05, 737 or one in five had provisional registration. Furthermore, if Royal Brisbane and Women’s Hospital (RBWH) and Princess Alexandra Hospital (PAH) are excluded, 27 percent of all doctors in the rest of

Queensland are provisionally registered. Therefore any changes to the arrangements around provisional registration would have a significant impact on Queensland Health and there would be a greater effect on non-metropolitan hospitals.

Provisionally Registered Doctors	2005
Total number of doctors (FTEs)	3,433
Total number of provisionally registered doctors	737
Percent of total doctors provisionally registered	21.4%
Total number of doctors outside RBWH and PAH	2,307
Total number of provisionally registered doctors outside RBH and PAH	639
Percent of non-metro doctors provisionally registered	27.7%

Source: Queensland Health unpublished data (2005)

1.9 Health System Issues

This section highlights some of the key environmental, policy and demographic issues that effect the management and organisation of health services in Queensland. Specific discussion is provided in relation to the effect of Commonwealth health policy on the supply of doctors in particular, the role of the private sector and how Queensland Health has responded to systems issues.

1.9.1 Private Health Insurance

The Commonwealth government introduced key policies for private health insurance in 1997 and 1999. A key objective of the Commonwealth Government's policy was to reduce the burden on the public hospital system¹². Despite more than \$2.6 billion in government subsidies directed to the private health insurance industry in 2004-05, there is little evidence that the demand for public hospital services has declined. However, the reforms did increase private health insurance coverage from 30 percent of the population in 1998-99 to its highest level of 46 percent in the September quarter 2000. Since then private health insurance coverage has slowly declined to the current rate of 43 percent.

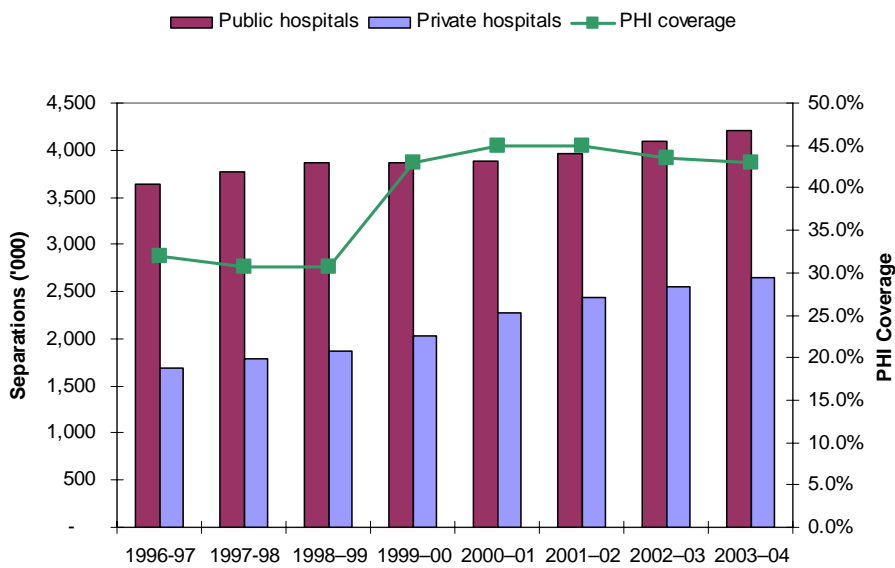
Reasons why the private health insurance reforms have not succeeded in reducing demand for public hospitals services could include:

- There is no financial incentive to use private health insurance due to the high proportion (60 percent) of private health insurance policies that have a co-payment. The public hospital system remains free to all Australians regardless of private health insurance status.
- The capacity of the health system is relatively fixed, therefore the avoidance of queues by one person imposes a longer queue on another person.
- It is cheaper for individuals earning over \$50,000 (couples over \$100,000) to take out private health insurance and benefit from a government subsidy (30 percent rebate) than it is to incur the Medicare surcharge penalty of 1 percent.

¹² Department of Health and Ageing Occasional Paper

The impact of the private health insurance reforms on public hospital activity is illustrated in the following graph¹³. It shows that public hospital activity has remained relatively stable, growing by an average rate of 2.2 percent each year since 1996-97 despite private health insurance coverage increasing from 30 percent to 46 percent during that period. Private hospital activity did increase noticeably in 2000-01 (12 percent) and 2001-02 (8 percent) and at the same time public hospital activity did not grow much. Since then however, growth has slowed to an average rate of 5.5 percent, the average rate of growth prior to the jump in coverage.

Public and private hospital separations and private health insurance coverage - Australia

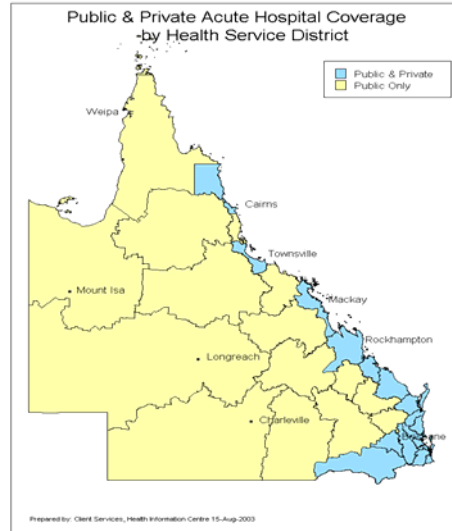


Source: Private Health Insurance Administration Council (2005) and Australian Institute of Health and Welfare, Australian Hospital Statistics 2003-04 (2005)

¹³ Private Health Insurance Administration Council (2005) and Australian Institute of Health and Welfare, Australian Hospital Statistics 2003-04 (2005)

Private Health Insurance in Queensland

There are some unique aspects of the use, profile and uptake of private health insurance in Queensland compared to the Australian average. The facts on private health insurance in Queensland are presented below.



In Queensland:

less people per capita hold private health insurance

- Private health insurance coverage in Queensland has been on average 2.5 percent lower than the national rate since 1996¹⁴.

less people per capita have financial incentive to use their policies

- 62.1 percent of policies in Queensland have front end deductibles (excesses) compared with 59.4 percent nationally.¹⁵

less people per capita have ancillary cover

- 37.8 percent of Queenslanders have ancillary cover (dentist, physiotherapy etc) compared to 41.6 percent nationally.¹⁶

some individuals holding private health insurance choose not use it in public hospitals

- 1 in 10 people who access public hospitals have private health insurance¹⁷
- 53 percent of public patients that hold private health insurance elect not to use it¹⁸
- This represents around 6.3 percent of total public activity in Queensland and demonstrates the overlap in public / private health insurance arrangements.

Private hospitals are limited to South East Queensland and coastal areas

- The map above shows that private hospitals are limited to coastal and the south east corner areas of Queensland.

¹⁴ Source: Private Health Insurance Administration Council (2005)

¹⁵ Source: Private Health Insurance Administration Council (2005)

¹⁶ Source: Private Health Insurance Administration Council (2005)

¹⁷ Client Services, Health Information Branch, Queensland Health (May 23, 2005)

¹⁸ Client Services, Health Information Branch, Queensland Health (May 23, 2005)

1.9.2 Medical Workforce Shortage

The Australian Health Ministers' Advisory Council submission to the Productivity Commission Health Workforce Study notes that "worsening shortages of key components of the health workforce stands out as the most serious challenge to Australia's capacity to deliver high quality health care across the nation" and that future health service delivery will be placed at risk in terms of access, quality and safety if the structural, regulatory and funding issues are not effectively addressed¹⁹.

Declining workforce growth is a function of the growing and ageing population. Over the next twenty five years, growth in Australia's working age population is projected to slow significantly from an average net growth of around 170,000 per annum to an annual net growth of around 12,000 per annum or approximately 125,000 in total for the entire decade between 2020 and 2030²⁰. The impact for the health workforce means that there will effectively be fewer workers to care for more people. This is further exacerbated by existing workforce shortages.

The Commonwealth Government controls the number of university places for medical degrees and the number of Medicare provider numbers. A report by the Australian Medical Workforce Advisory Committee (1998) considers that in the mid to late 1990's, a number of decisions were made by the Commonwealth Government aimed at constraining the growth in medical and health expenditure. These decisions included:

- reductions in medical school intakes
- reductions in net additions to the workforce from immigration
- reductions in annual intakes for general practice training programs
- access to Medicare provider numbers for new graduates denied until they enter a recognised general or specialist training program.²¹

Until recently there have been no increases in medical school intakes, despite increases in both population and demand for medical services.

In response to the recognised national medical workforce shortage, the Commonwealth Government has funded the creation of two additional medical schools in Queensland – at the James Cook University in Townsville and at the Griffith University at the Gold Coast. The Bond University has also established a private medical school. The first graduates from James Cook will enter the workforce as interns in 2006, and the first graduates from the other new schools will enter the workforce in 2009. Over the next five years, the numbers of new graduates from medical schools in Queensland entering the workforce will increase from 232 in 2004 to 540 per year in 2010. However, additional graduates also place pressure on the existing workforce to support clinical placements and training.

Based on Queensland's medical workforce profile and hospital based training model, it is unlikely based on the current model that Queensland will be in a position to support the training needs of almost twice the number of medical graduates in 2010 compared to the current number. That is unless special initiatives are taken including a combination of

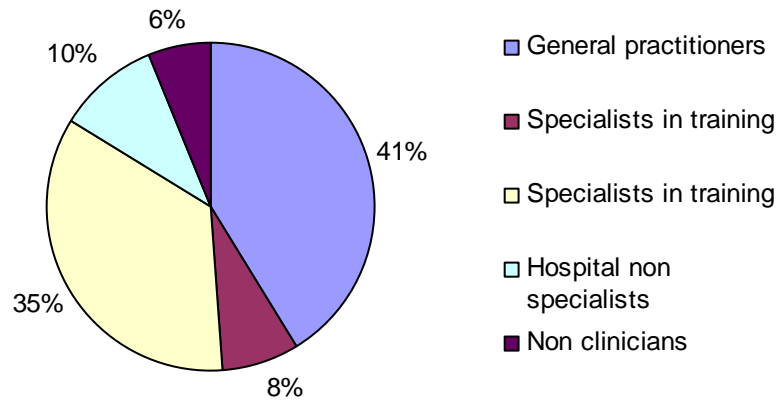
¹⁹ Australian Health Ministers' Advisory Council (AHMAC)(2005), Submission to the Productivity Commission Health Workforce Study

²⁰ Australian Health Ministers' Advisory Council (AHMAC)(2005), Submission to the Productivity Commission Health Workforce Study

²¹ Australian Medical Workforce Advisory Council (AMWAC) (1998), *Medical Workforce Supply and Demand in Australia, A Discussion Paper*, AMWAC Report 1998.8

additional training resources, additional teaching specialists, enhanced supervision, and training strategies and practices.

Composition of Queensland's Medical Workforce 2002



Source: Australian Institute of Health and Welfare 2002

Based on a medical labour force survey conducted by the AIHW, in 2002, 41 percent of doctors in Queensland were primary care practitioners (mainly general practitioners), 35 percent were specialists, 8 percent were specialists-in-training, 10 percent were hospital non-specialists and the remaining 6 percent are in non-clinical roles. This broadly reflects the composition of the Australian Medical Workforce.

These statistics are illustrative of a number of factors about the Australian medical workforce, including the ageing of the medical workforce, increasing participation rates of women and the generational trend away from historical patterns of work in favour of a work-life balance. When coupled with other factors currently influencing workforce supply in Australia, the impacts are significant:

- Globalisation of the workforce means the well-trained Australian workforce is highly sought after in global markets. The United Kingdom, Canada and the United States all actively recruit international medical graduates
- Length of time from entry to medical school to participation in the workforce as an independent practitioner
- The impact of rising professional indemnity insurance costs on particular specialities including obstetrics, anaesthesia, some surgery and general proceduralists
- The impact of new technologies on specialisation and sub-specialisation
- The majority of practitioners preferring to work in larger metropolitan centres.

1.9.3 Queensland Health's response to system challenges

All health systems in Australia and in most developed nations face a number of common systemic challenges. These challenges include:

- reducing workforce numbers
- quality and safety of health services
- increasing health care options, including new technologies, treatments and drugs
- increasing consumer expectations about access and quality of services
- increasing prevalence of chronic disease,
- historic models of care
- an ageing and growing population
- finite resources.

Queensland Health's systemic arrangements for addressing these issues are outlined in more detail in latter sections of this report.