3 POPULATION-LEVEL PREVENTION INITIATIVES AND INTERVENTIONS

Background

Interventions to prevent risk factors for chronic disease, aimed at a population, are essential to prevent future disease and potential epidemics. Reduction in risk factors can lead to large health gains in the population and reduced mortality (WHO 2005).

The risk factors for CVD, diabetes and CKD described so far are part of a wider conceptual framework of determinants of health (Figure 3.1). They generally fit into two categories in the framework: health behaviours and biomedical factors.

Most population-level initiatives are aimed at health behaviours such as smoking, alcohol overuse, poor diet and physical inactivity. By reducing these risk factors, improvements can in turn be seen in biomedical risk factors such as high blood pressure, obesity, impaired glucose tolerance, abnormal blood lipids, low birthweight and depression. Although an initiative may initially target a health behaviour, modification of this behaviour will most likely lead to favourable results for the biomedical risk factors. Targeting health behaviours at a population level usually relies on changing the background determinants of health such as knowledge, attitudes and beliefs, and environmental factors.

Interventions at a population level in Australia can be initiated at all levels of government (Australian, state and territory, and local) and by non-government organisations. Hence the scope of interventions is wide. They are often guided by overarching strategies or policies. Although these strategies may come from all levels of government and non-government organisations, they are often established at a national level, with input from other government and non-government organisations. For example, the National Alcohol Strategy 2006–2009 was developed through collaboration between Australian governments, non-government and industry partners, and the broader community (DoHA 2009l; MCDS 2006).

Monitoring population-level initiatives

Population-level initiatives are very relevant for risk factor prevention. Population-level services have not been the focus of health service monitoring in the past, as this monitoring has usually been focused on individual-level services. In many cases it is difficult to systematically measure the number of individuals receiving a particular population program. However, it is possible to monitor the presence and focus of these initiatives, although ideally this would be based on a standard data collection that currently does not exist.

Institutions such as the NHMRC produce guidelines on clinical management or prevention of risk factors at an individual level, but there is a lack of direct guidance on best practice for population-level initiatives in Australia. In the United Kingdom, the National Institute for Health and Clinical Excellence produces guidelines for public health initiatives at a population level. These guidelines and materials can help define the scope of population-level initiatives that should be monitored.

Scope and purpose of this chapter

This report focuses on information on interventions by the Australian government, state and territory governments, and peak non-government organisations. Even within this scope, it is not possible in a report such as this to comprehensively describe all initiatives that are in place, largely due to the lack of a standardised data collection. This chapter therefore aims to paint a picture of the population-level initiatives set up to prevent risk factors in people who do not have them, and/or improve or remove the risk factors in people who already have them. This is done through the use of examples from Australian governments and peak non-government organisations.

Types of population-level initiatives

Population-level initiatives aimed at preventing risk factors can use a variety of methods. For this report, initiatives have been grouped into five categories, based on the approach used by the World Health Organization (WHO 2005), which include:

- laws and regulations
- tax and price interventions
- improving the built environment
- public awareness campaigns
- community-based interventions.

These categories can overlap, for example laws can be introduced to mandate taxation on a product, or a community-based program may improve the built environment.

Laws and regulations

Laws and regulations are a broad feature of society and have historically been used worldwide to great advantage in health promotion activities. Perhaps the best known of these in Australia are tobacco control laws that have regulated businesses to provide smoke-free environments as well as enforced advertising restrictions, warning labels and point-of-sale controls (Magnusson & Colagiuri 2008).

There are several ways in which laws and regulations may help prevent or improve risk factors. The law can be used to mandate informing or disclosing information to the public, for example through food labelling laws (Gostin 2007). Laws can be used to help improve the built environment and provide taxation and price incentives, and can also be used to regulate the marketing of products, as with tobacco, that may affect risk factors (Gostin 2007).

Tax and price interventions

Taxation and price policies can provide disincentives for people to start or continue unhealthy habits that affect risk factors, as well as provide incentives for the uptake of healthy habits. Taxation and price policies, like laws, can be classed as a broad feature of society. Tax increases as part of the wider tobacco control laws have been shown to contribute to the reduction of tobacco use while subsidies on fruit and vegetables in schools and workplaces have been shown to increase consumption (WHO 2005).
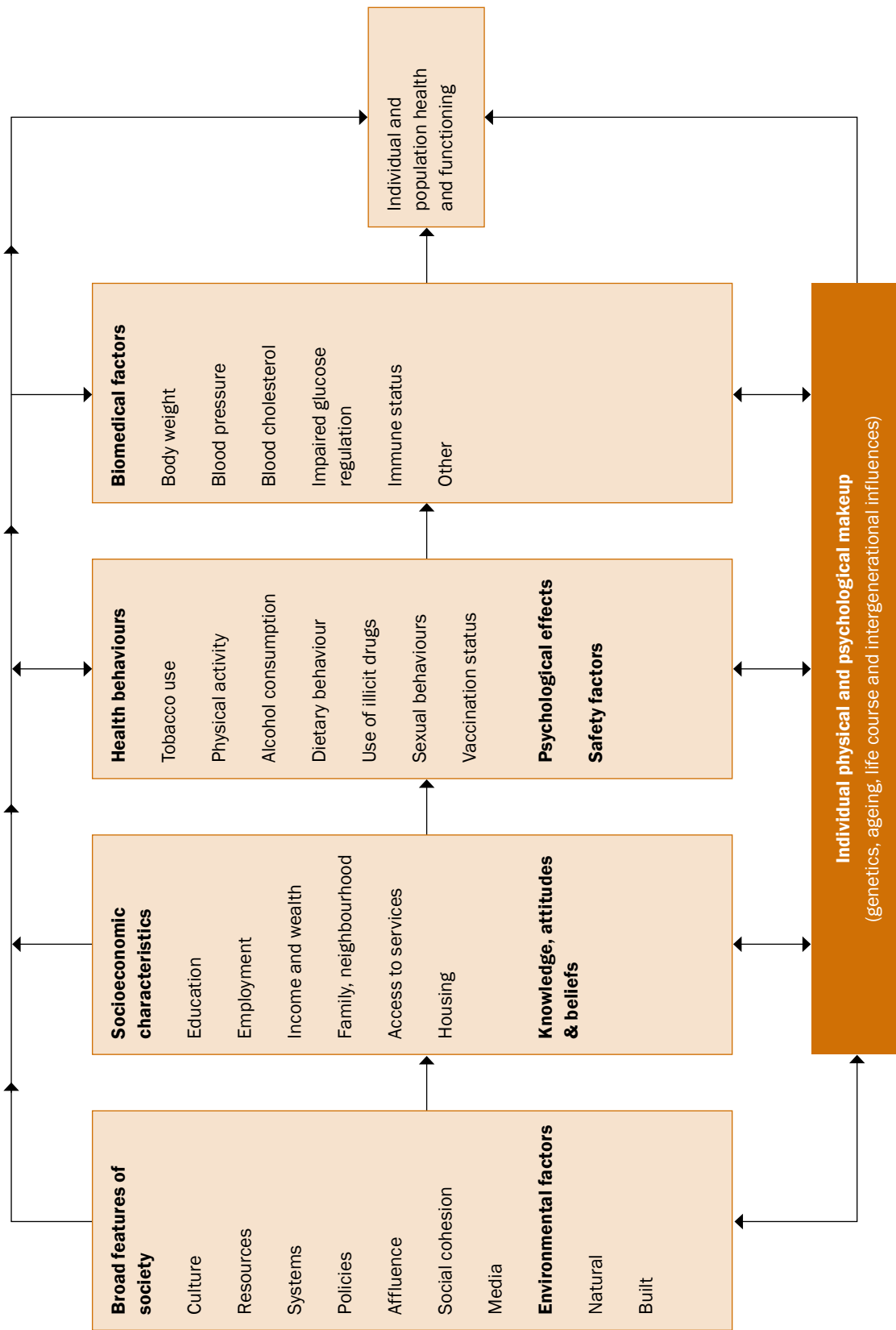
Individual and population health and functioning

Biomedical factors
- Body weight
- Blood pressure
- Blood cholesterol
- Impaired glucose regulation
- Immune status
- Other

Health behaviours
- Tobacco use
- Physical activity
- Alcohol consumption
- Dietary behaviour
- Use of illicit drugs
- Sexual behaviours
- Vaccination status

Psychological effects

Safety factors

Socioeconomic characteristics
- Education
- Employment
- Income and wealth
- Family, neighbourhood
- Access to services
- Housing

Knowledge, attitudes & beliefs

Broad features of society
- Culture
- Resources
- Systems
- Policies
- Affluence
- Social cohesion
- Media

Environmental factors
- Natural
- Built

Individual physical and psychological makeup
(genetics, ageing, life course and intergenerational influences)

Figure 3.1: A conceptual framework for determinants of health

Tax and price interventions are useful tools that can reach an entire community in several different ways. The revenue raised can also be used to fund disease prevention programs. Taxation or price incentives can be targeted at individuals, as in the cost of tobacco and the cost of fruit and vegetables, or at businesses and workplaces, as in tax relief for employers who invest in disease prevention programs (Magnusson & Colagiuri 2008).

Improving the built environment

The environment that people live in can affect their health and influence the uptake of behaviours that could be of health benefit. The effect of the built environment (areas made for human use and recreation) on health, and intervention to ensure acceptable conditions, has been a part of public health policy since the mid-1800s, when the *Public Health Act 1848* was passed in the United Kingdom. Subsequent Australian legislation based on this Act focused on the prevention of communicable diseases and diseases caused by hazardous substances through better sanitation, tenancy and zoning laws (Corbett 2008).

The built environment can affect the nutritional and physical activity habits of the population. For example, it has been shown that walking and cycling rates are higher in some neighbourhoods in the United States where there is higher population density, mixed land use and interconnected footpaths (WHO 2005).

It has also been hypothesised and shown that a high density of fast-food outlets in an area increases the risk of obesity (Li et al. 2009). The increasing availability and convenience of fast foods, lack of access to fresh fruits and vegetables, and larger portion sizes, also contribute to the obesity problem. People living in neighbourhoods with access to both safe places that facilitate physical activity and walking tracks, and have fresh food markets are likely to eat healthy food, be physically active and avoid obesity (Sallis & Glanz 2006).

Public awareness campaigns

Public awareness campaigns to prevent or reduce risk factors provide a target audience with information that can influence their behaviour. Such campaigns are often defined as 'health education' or 'social marketing', and can add to or change knowledge, attitudes and beliefs (Andreasen 1995; Glanz et al. 2008; Gordon et al. 2006).

Campaigns may be aimed at individuals, but also at professionals, organisations and policy makers (Gordon et al. 2006). Campaigns have been extensively used in many areas of health promotion, particularly for risk factors for chronic disease. Public awareness campaigns have the potential to inform, encourage and motivate to enhance health (NPHT 2008) through media such as television, radio and print. As media campaigns may not be effective in isolation, they are often complemented by support services, education resources, smaller community-run programs and government support.

In the case of risk factors for CVD, diabetes and CKD, campaigns usually target behavioural risk factors such as alcohol, smoking and nutrition. For example, the current Measure Up social marketing campaign is a national campaign that promotes healthy eating and physical activity, and primarily targets 25–50 year olds with children (ABHI 2007).

The aim of Western Australia's Go for 2&5 multi-strategy marketing campaign (2002–2005) was to increase adults' awareness of the benefits of eating more fruit and vegetables. By improving nutrition knowledge, attitudes and consumption behaviour, the campaign resulted in an observed increase of one serving of fruit and vegetables over 3 years (Pollard et al. 2007).

In 2006, graphic warnings and the Quitline telephone number were printed on cigarette packets in Australia. As well, the media warned Australians about the effects of smoking. To evaluate the campaign, the number of calls to the Quitline was monitored. There was a sharp increase in the number of calls shortly after the campaign began, indicating that Australians were seeking support to quit (Miller et al. 2009).

Public awareness campaigns that target a wide population often have a greater effect on some population groups than others, and some groups may have different levels of uptake of campaign messages. This means that campaigns should be culturally sensitive and appropriate (O'Donoghue 1999), to ensure that the message reaches the most at-risk populations.

Community-based interventions

Community-based interventions can be used to encourage and support healthy lifestyle choices. They are usually aimed at changing the knowledge, attitudes or beliefs of specific population groups and focus on preventing or reducing risk factors while working to help local communities to support the desired behaviour change (Altman 1995; Brenner 2002). These interventions can occur in a number of settings, including schools and workplaces, where the existing infrastructure and management support may also be key elements in enabling behaviour change.

Behaviours such as physical activity, diet and alcohol misuse are commonly targeted. For example, school-based programs in the United States focusing on physical activity and diet (among other things) have led to a decrease in total fat consumption and an increase in physical activity in children in the intervention schools (WHO 2005). Integrated community approaches have been implemented in France, Spain and Belgium through the EPODE program (Together Let's Prevent Childhood Obesity), which involves entire communities (EPHA 2008). The Australian Heart Foundation Walking Group is a free community-run network, where anyone can participate. The program relies on local government, leisure services and workplaces to run walking groups. The aim is to increase participation and enjoy physical activity, and create social connections (NHFA 2009).

Population-level interventions currently in place

For this section of the report, the AIHW collected information from states and territories, the Australian Government Department of Health and Ageing, and peak non-government organisations on population-level interventions currently in place. This resulted in the collection of a large amount of information that showed a great deal of activity across Australia.

Through this collection, two things that affect the monitoring of risk factors have become clear.

First, most population-level initiatives are aimed at preventing behavioural risk factors (such as increasing people's fruit and vegetable intake, or physical activity levels). Dealing with behavioural risk factors can help prevent the biomedical risk factors (such as high blood pressure, high blood lipids or impaired glucose regulation). Biomedical risk factors are not normally specifically targeted though population-level initiatives in Australia. Therefore the picture presented here focuses on the behavioural risk factors currently tackled by specific programs.

Second, a systematic data collection is needed in order to effectively monitor these initiatives. Although AIHW staff attempted to collect information in a systematic fashion by approaching population health experts in different states and territories, many of the initiatives in this area are across sectors and levels of government, or occur outside government. The information collected was to some extent opportunistic and providers varied in the amount of detail they could readily provide. Therefore the list of interventions is not comprehensive—for this reason only examples are presented. It is clear, however, that the prevention of risk factors is being recognised and supported by all stakeholders as pivotal to improving and maintaining the health of Australians.

Overweight and obesity, physical inactivity and poor nutrition

Overweight and obesity, physical inactivity and poor nutrition are three risk factors that are commonly targeted together at the population level. The National Obesity Taskforce, a group established by Australian Health Ministers in 2003, reviewed the evidence for interventions to deal with overweight and obesity in adults and older Australians. They found convincing evidence that weight gain occurs from continued periods of energy imbalance, during which energy intake exceeds energy expenditure (NSW Centre for Overweight and Obesity 2005). In other words, people gain weight if they eat more food, particularly energy-dense foods, than they need according to their activity levels. Therefore it makes sense to focus on these two health behaviours (diet and physical activity) together when aiming to influence overweight and obesity levels.

Participation in physical activity reduces cardiovascular risk in its own right, and helps prevent Type 2 diabetes. It improves other risk factors such as high blood pressure and levels of HDL ('good') cholesterol, and improves mental wellbeing, including depression (AIHW 2008c).

A healthy diet is closely related to good health. It has been argued that poor nutrition during fetal development affects the growth and development of the child, and also increases the risk of abdominal obesity, Type 2 diabetes, CVD and CKD as an adult (SIGNAL 2001). Therefore, current priorities include the promotion of fruit and vegetable consumption, healthy weight and good nutrition to mothers, babies, school-aged children and Indigenous Australians (AIHW 2008c). As Indigenous Australians have poorer nutrition-related health, the priorities apply especially to them (AIHW 2008a).

Strategies and guidelines

National efforts to improve physical activity and nutrition, and combat overweight and obesity are based on a number of strategies and evidence-based guidelines (Box 3.1).

One of these strategies, Healthy Weight for Adults and Older Australians: the National Action Agenda to Address Overweight and Obesity in Adults and Older Australians 2006–2010, has three main goals: to prevent weight gain at the population level, to achieve better management of early risk and to improve

weight management. The strategy identifies prevention as the most important goal, and complements strategies that are already in place at other levels of government.

The strategy recognises that a multi-layered, intensive, widespread and sustained approach is required across the community and health sectors to deal with overweight and obesity in Australian adults over the years 2006–2010. It identifies actions at a population level, such as social marketing campaigns, collaborations on environmental change to promote physical activity, education, changes in primary health care, monitoring and surveillance, and a collaborative approach across sectors to support healthy food choices. It also identifies specific actions for different population groups such as Aboriginal and Torres Strait Islander peoples. Similarly, Healthy Weight 2008: the National Action Agenda for Children and Young People and their Families identifies actions for combating childhood overweight and obesity. Both these strategies identify population-level actions that can be grouped into the five categories used in this chapter.

Box 3.1: Strategies and guidelines for the prevention of overweight and obesity, physical inactivity and poor nutrition

- *Healthy Weight for Adults and Older Australians: the National Action Agenda to Address Overweight and Obesity in Adults and Older Australians 2006–2010 (DoHA 2008f)*

- *Healthy Weight 2008, Australia's Future: the National Action Agenda for Children and Young People and their Families (DoHA 2003)*

- *Be Active Australia: a Framework for Health Sector Action for Physical Activity 2005–2010 (NPHP 2005)*

- *National physical activity guidelines for adults 2005 (DoHA 2005)*

- *Australian physical activity recommendations for 5–12 year olds 2009 (DoHA 2004a)*

- *Australian physical activity recommendations for 12–18 year olds 2009 (DoHA 2004b)*

- *Recommendations on physical activity for health for older Australians 2009 (DoHA 2009k)*

- *Eat Well Australia: an Agenda for Action for Public Health Nutrition 2000–2010 (SIGNAL 2001)*

- *The Australian guide to healthy eating 1998 (DoHA 1998)*

- *Food for health: dietary guidelines for Australians 2003 (NHMRC 2003b)*

- *National Aboriginal and Torres Strait Islander Nutrition Strategy and Action Plan 2000–2010 (NATSINWP 2001b)*

- *Healthy Eating Healthy Weight 2008 (DAA 2008)*

- *National Heart Foundation of Australia physical activity recommendations for people with cardiovascular disease (Briffa et al. 2006).*

Laws and regulations

Food labelling

The development of standards to regulate food is done at a national level in Australia, with state and territory health departments being responsible for enforcing the standards. Labelling ingredients in food can help consumers make better choices if they are aware of what these ingredients mean for their health. In Australia, most packaged foods for retail sale must have a nutrition information panel (FSANZ 2002). The information is presented in a standard format that shows the amount per serve and per 100 g (or 100 ml if liquid) of the food. Panels contain average amounts per serve of energy in kilojoules; average protein, fat (total and saturated) and carbohydrate (total and sugars) in grams; average sodium in milligrams and any other nutrients when a nutritional claim is made in an appropriate unit. This regulation does not occur for food bought in restaurants and takeaways. The revised *Food Standards Code 1.2.8 Nutrition Information Requirements* was introduced in 2000, making it compulsory to declare the amount of saturated fat content as well as the total fat content (FSANZ 2002). Saturated fat is regarded as the most harmful type of fat, and can contribute to CVD by increasing blood cholesterol. Consumers can make an informed choice about foods containing saturated fat, and can in theory purchase a product with low saturated fat content (FSANZ 2009). The National Preventative Health Taskforce has recommended a new national labelling system to apply for all foods, not just packaged foods (NPHT 2008). The taskforce has also recommended regulation of the amount of trans fats, saturated fat, salt and sugar content in foods.

Urban planning

Laws and regulation for urban planning that can influence physical activity and healthy eating are made by state and territory governments, and local governments. Laws and recommendations such as those established for transport can affect physical activity levels. For example, the fourth objective of the Transport Coordination Plan for Queensland 2008–2018 is to encourage the use of public transport, walking and cycling, and reduce reliance on private vehicle use. In regards to urban planning and nutrition, the use of agricultural land for urban development, or inclusion of spaces for community gardens, has the potential to influence the availability of local food resources (Dixon et al. 2009).

Tax and price incentives

Potential tax and price incentives to facilitate good nutrition and physical activity include subsidising healthy foods, taxing unhealthy foods and providing tax incentives for active living. In Australia, most fresh foods for retail are exempt from the goods and services tax (GST). Foods that are taxed include prepared food, confectionery, savoury snacks, bakery products, ice cream and similar food, and biscuit goods. The National Preventative Health Taskforce has suggested that a review of the tax system may be needed to facilitate access to healthier foods and active recreation (NPHT 2008). Besides the exemption of fresh food from the GST, there are relatively few tax or price incentives at a population level to improve poor nutrition, physical inactivity or obesity. There are some interventions in small communities, such as subsidised gym memberships for employees in workplaces.

Improving the built environment

Urban planning occurs at the state and territory and local government levels in Australia, with some exceptions such as Commonwealth land. In recent years, it has become increasingly recognised that urban environments can affect physical activity levels and nutritional behaviours. The built environment can promote or inhibit energy consumption and expenditure (Hill et al. 2003).

Efforts to improve the built environment to help foster increased physical activity levels and better nutrition usually require the involvement of non-health sectors. Most of the focus in this area has been on influencing the people who affect policy or plan environments. For example, in 2004 the National Heart Foundation of Australia released the publication *Healthy by design: a planner's guide to environments for active living (*NHFA (Victorian Division) 2004). The report helps planners to incorporate designs that positively affect health into daily planning decisions. The report has specific advice on planning walking and cycling routes; streets; local destinations; open space; public transport; seating, signage, lighting, fencing and walls; and fostering community spirit. See also 'Urban planning' in the 'Laws and regulations' section above. Other examples are shown in Box 3.2.

Box 3.2: Examples of initiatives to improve the built environment

Specific programs in Victoria under the Go for Your Life initiative include improving access to public land to be underpinned by a uniform walking trail classification standard for Victoria; facilitating locally relevant public land projects; building on existing programs such as Conservation Volunteers Australia to focus on projects with a physical activity component; and recruitment strategies to engage those not currently involved in regular physical activity.

South Australia Health and the Department of Planning and Local Government are working together to improve the health and wellbeing of South Australians. The purpose of this collaboration is to increase knowledge of planning to incorporate health principles, concepts and strategies. There is a strong focus on healthy eating and physical activity, and assistance is given for planning and health matters within local government.

At a national level, the Healthy Spaces and Places project has developed an Internet-based national planning guide with practical tools, case studies and guidelines to help planning and design practitioners to incorporate active living into the built environment. The project also aims to raise awareness of this cross-disciplinary area and to contribute to national policy setting. The project is a collaboration by the Australian Local Government Association, the Heart Foundation of Australia and the Planning Institute of Australia.

In the Australian Capital Territory (ACT), the Active Living Project is a collaboration of the Heart Foundation and ACT Health, which aims to improve the health and wellbeing of people living in the ACT through a cross-sectoral approach to active living. An Active Living coordinator works with stakeholders from the health, transport, sport, recreation and planning sectors, and community representatives, to create support environments for active living in the ACT.

Public awareness campaigns

Public awareness campaigns are perhaps one of the most commonly used tools to target prevention of these risk factors. In Australia, public awareness campaigns are run at all levels of government and by non-government organisations. In the case of obesity, physical inactivity and poor nutrition, most campaigns are part of a wider strategy. See Box 3.3 for examples of current campaigns.

Box 3.3: Examples of public awareness campaigns

The national Australian Better Health Initiative social marketing campaign, Measure Up, was implemented in 2008. The campaign links waist circumference to risks of chronic disease and lower quality of life to raise awareness and motivation to change behaviours. The campaign's components include television, radio, print, outdoor, website and community education resources. The primary target group is 25–50 year old adults who have children, with a secondary target group of 45–60 year olds.

In Victoria the Go for Your Life campaign aims to promote healthy eating and increase physical activity in the general population and population subgroups. This occurs through whole-of-community and targeted settings, including sports and music events, and using a range of approaches including sponsorships, TV programs and commercials, ambassadors and program-specific marketing.

Kidney Health Australia's Make a Noise about the Silent Killer campaign is designed to create awareness about the risk of CKD. The campaign's television commercial shows animated jelly beans changing their lifestyles by taking up healthy activities.

Diabetes Australia's National Diabetes Action Program aims to raise awareness and promote prevention initiatives. A specific focus is to promote awareness that people are at increased risk of Type 2 diabetes if they have a family history and large waist circumference. It is a national campaign linked with programs run by the state and territory member organisations of Diabetes Australia.

The Australian Government's Get Set 4 Life—Habits for Healthy Kids program is a resource for parents, carers and teachers to help in developing healthy habits in young children (targeted at 4 year olds), such as healthy eating and physical activity.

The Healthy Weight website is an Australian Government resource. It provides information on maintaining a healthy weight, being active and healthy eating at different life stages.

In South Australia, the Obesity Prevention and Lifestyle Project aims to increase the proportion of 0–18 year olds in the healthy weight range by increasing healthy eating and physical activity through families and communities. The project tackles the problems of chronic disease in the community by starting with children and young people. The project is community-based, and involves social marketing and the wider community for support, especially families.

Community interventions

Community interventions are also regularly used to target the prevention of risk factors. Interventions set in schools are common. Corcoran and Bone (2007) list some of the advantages of using settings such as schools and workplaces for health promotion as providing a framework to use in practice, allowing ownership of health, enabling relationship exploration, recognising existing initiatives, encouraging an awareness of health at all levels and 'normalising' aspects of health.

State and territory governments fund or contribute to many community interventions through a range of schemes. See Box 3.4 for examples of current community interventions. Numerous similar interventions are in place across the country.

Box 3.4: Examples of community interventions

The Family Food PATCH program in Tasmania provides training to parents of children aged 0–12 years in practical food, nutrition and physical activity skills in different communities throughout the state. Volunteers (Family Food Educators) are then supported and encouraged to promote healthy lifestyles to other families in their local community through a range of activities, both formal and informal. Volunteers have access to a range of resources and professional support. The Family Food PATCH project is a joint initiative between the Child Health Association, Playgroup Tasmania, the Community Nutrition Unit of the Tasmanian Department of Health and Human Services and Eat Well Tasmania, and began in 2000.

Munch and Move, a joint initiative between the NSW Department of Health and the NSW Department of Community Services, is a program that supports the healthy development of young children by promoting physical activity, healthy eating and reduced small-screen time (TV, DVD and computers). The program focuses on the early childhood sector and includes face-to-face training and practical resources, information and ideas, as well as contact with local health professionals.

The South Australian Breastfeeding Program Strategic and Action Plan 2007–2012 has as one of its objectives to increase community acceptance of breastfeeding as the cultural norm. The Australian Better Health Initiative's Healthy Weight Coordinators have been implementing the action plan in the health regions. This includes working with the Australian Breastfeeding Association to enable health services to become 'Breastfeeding welcome' sites and support breastfeeding in community settings. The Baby Friendly Health Services program for community settings will commence at the first pilot site in 2009. This will inform the national accreditation process.

Smart Choices—Healthy Food and Drink Supply for Queensland schools is a strategy that helps determine which food and drinks can be supplied to schools, based on healthy eating principles as determined by the Australian Guide to Healthy Eating.

(continued)

Western Australia's Healthy Schools Project aims to promote and facilitate the implementation of best practice nutrition and physical activity initiatives in schools. Healthy School Coordinators are employed to facilitate physical activity and nutrition initiatives in schools with disadvantaged populations. They work with targeted schools to incorporate healthy eating and physical activity into school policies, facilitate community- and school-based activities, establish and strengthen existing partnerships and support the development of healthy school environments that contribute to the prevention of obesity and chronic disease.

The Tasmanian Government provides the Get Moving at Work, a resource kit for workplace health and wellbeing programs. The resource is designed to help organisations and employers to implement health and wellbeing programs in the workplace. It outlines the effects of the programs on employee health and wellbeing, workplace productivity levels and the economy as a whole.

The Go for Your Life campaign is a Victorian Government initiative to improve Victorians' health and wellbeing by developing healthy and active communities. The campaign encourages and raises awareness about healthy eating, physical activity and maintaining a healthy weight. Some of the Go for Your Life programs include A physical activity guide for senior Victorians, Active Families, Fad Diets Won't Work, and the Get Active Challenge.

The Australian Capital Territory's Kids at Play—Active Play and Eating Well project is an ACT Government initiative delivered in partnership by ACT Health, the Department of Territory and Municipal Services (Sport and Recreation) and the Heart Foundation ACT. The project responds to the rising levels of childhood obesity by promoting healthy eating and encouraging physical activity. The project targets children aged 0–5 years, their families and carers, early childhood sector staff and teachers.

The Heart Foundation's Jump Rope for Heart is one of the longest running physical activity programs run in schools. The aim is to teach Australian school children about the importance of physical activity, by jumping rope. This program is also a fundraiser for the Heart Foundation, giving the children more incentive to participate.

National Walk to Work Day, organised by the Pedestrian Council of Australia, is an annual event to promote regular walking and physical activity. The focus is on increasing physical activity and promotes the use of public transport, by reducing private vehicle use. The campaign also highlights the health and environmental benefits of walking to work.

The New South Wales Department of Health provides a free telephone coaching service called Get Healthy Information and Coaching Service. This initiative aims to help adults to eat healthy food, become physically active and maintain a healthy weight.

Tobacco

Tobacco smoking has moved from being a part of everyday Australian life to becoming increasingly socially frowned upon. Since the late 1980s, prevention and awareness campaigns have helped in the reduction of smoking (Keleher & Murphy 2004). As outlined in Chapter 2, tobacco smoking remains an area where significant gains in population health can be achieved with further reductions in smoking rates. Reducing smoking prevalence requires effecting positive change in the social, economic and cultural determinants of health (Queensland Health 2008). Tobacco control is a focus of the National Preventative Health Taskforce.

Tobacco smoking is the single most preventable cause of ill health and death in Australia, and therefore offers the greatest scope for prevention (AIHW 2008c). Population-level prevention efforts aim to stop the uptake of smoking and help smokers quit. The reduction in tobacco use in Australia is most likely due to comprehensive tobacco control strategies, including the increased price of tobacco products and the restriction of sales to people under 18 years of age, and changes to social attitudes towards smoking through legislation and hard-hitting public awareness campaigns (Queensland Health 2008; Sargent & DiFranza 2003).

Strategies and guidelines

National efforts to control tobacco smoking are outlined in the National Tobacco Strategy 2004–2009 (MCDS 2004). The four objectives of the strategy are to prevent the uptake of smoking, encourage smokers to quit, eliminate the harmful exposure of tobacco smoke to non-smokers ('passive smoking') and reduce the harm associated with continued smoking.

Australia has also ratified and works within the World Health Organization's Framework Convention on Tobacco Control (WHO 2009). In particular, this includes guidelines in four key areas: protecting public health policies from the commercial interests of the tobacco industry; protection from exposure to tobacco smoke; packaging and labelling of tobacco products; and tobacco advertising, promotion and sponsorship. The main types of initiatives under each of the relevant population-level categories are outlined below, along with some specific examples currently underway in Australia. Strategies and guidelines are summarised in Box 3.5.

Box 3.5: Strategies and guidelines for the prevention of smoking

- *National Tobacco Strategy 2004–2009*
- *World Health Organization's Framework Convention on Tobacco Control*
- *National Tobacco Youth Campaign (DoHA 2009i)*
- *National Partnership Agreement on Preventative Health*
- *Reinvigorating the National Tobacco Strategy (Indigenous Tobacco Control Initiative)*
- *Indigenous Tobacco Control Initiative*
- *Council of Australian Governments' (COAG) Action to Reduce Indigenous Smoking*
- *New South Wales: NSW Tobacco Action Plan 2005–2009*

(continued)

- *Queensland: Queensland Drug Strategy 2006–2010*

- *South Australia: SA Tobacco Control Strategy 2005–2010*

- *Tasmania: Tasmanian Tobacco Action Plan 2006–2010 (Tas. DHHS 2006)*

- *Victoria: Victorian Tobacco Control Strategy 2008–2013*

- *Western Australia: Western Australian Tobacco Action Plan 2007–2011.*

Laws and regulations

The National Tobacco Strategy 2004–09 outlines changes to laws and regulations to combat smoking. They include eliminating tobacco advertising and promotion, reducing the visibility of tobacco products and the accessibility to young people, making tobacco products less affordable, eliminating exposure to environmental tobacco smoke, and developing a system to reduce overall harm associated with dependence on tobacco-delivered nicotine. Many of these approaches are not new: Australian governments have been regulating tobacco for many years.

At a national level, the Australian Government is responsible for a range of national strategies (Talbot & Verrinder 2005); states and territories also have their own strategies and legislation. Key recommendations from the National Preventative Health Taskforce, many of which are underway in some form, include:

- mandating plain packaging of cigarettes

- ensuring regulations regarding advertising apply to modern forms of media, and banning point-of-sale displays

- establishing a national system to review more regularly mandated warnings and warn smokers about new health effects in a timely manner

- establishing a new regulatory body for tobacco

- strengthening state and territory legislation to ensure cigarettes are not sold to children

- establishing changes to laws that protect against second-hand smoke (NPHT 2009).

Tobacco advertising

Longitudinal studies consistently provide evidence that exposure to tobacco advertising and promotion is associated with the likelihood that adolescents will start to smoke (Lovato et al. 2003). Bans on tobacco advertising are recognised as being an essential component of a comprehensive tobacco control strategy (Cancer Council Victoria 2008).

Tobacco advertising and promotion have almost vanished from the mainstream media in Australia, as a result of federal and state laws (Quit Victoria 2008). Under the *Tobacco Advertising Prohibition Act 1992*, it is an offence to publish or broadcast a tobacco advertisement unless one of the few limited exceptions under the Act can be applied to the advertisement (DoHA 2009h). The purpose of the Act is to establish a national prohibition on tobacco advertising, expanding bans already in existence in some states and territories. The Act defines a tobacco advertisement as any writing, sign, symbol or image that gives publicity to or is intended to promote smoking or the purchase or use of tobacco products (Quit Victoria 2008).

In Australia, tobacco cannot be advertised in electronic or print media such as newspapers and magazines. Exemptions on advertising include imported magazines, point-of-sale advertising and product placement. Product placement occurs when a tobacco product or brand is shown in a film or photograph, or even in an advertisement for something else. The exposure of the product or brand is random, making legislation to ban it difficult (Quit Victoria 2008).

Sponsorship by tobacco companies is also banned or strictly limited in most Australian states (Quit Victoria 2008). Sponsorship is the provision of financial support in return for receiving publicity. In the past, Australian tobacco companies have been major sponsors of sports and cultural events. Linking a cigarette brand with an exciting, popular and highly skilled sport improves the image of the product in people's minds. It also undermines health messages by linking smoking with physical fitness and excellence.

Health warnings

Health warnings are mandatory on all tobacco products sold in Australia, providing information to smokers on the health effects of smoking. The warnings now occupy 30% of the front and 90% of the back of each pack, with a graphic appearing on the front and back. These warnings build on earlier systems of health warnings on tobacco products, and were implemented on 1 March 2006. The health warnings and accompanying information aim to increase smokers' knowledge of the health effects of smoking, encourage cessation and discourage uptake or relapse.

Smoking in public

The first public area smoking bans were implemented in cinemas and public transport, not to support health concerns but to reduce the risk of fire. Now, the increasing recognition of the health effects of second-hand smoke and a growing public dislike of cigarette smoke have contributed to smoke-free policies and legislation (Scollo & Winstanley 2008).

Smoking in public places and workplaces comes under the jurisdiction of the states and territories. The Australian Government controls the ban of smoking on domestic and international flights, and in airport buildings. In all states and territories except the Northern Territory, smoking is prohibited in enclosed dining areas, enclosed public places and almost all enclosed workplaces (Box 3.6). Public places such as pubs, clubs, casinos (exemptions apply for 'high roller rooms' in some states), shopping centres, cafes and workplaces became smoke-free Australia-wide on 31 October 2007. Most states and territories have legislated for smoke-free outdoor dining and other areas, and have laws, either in place or starting soon, prohibiting smoking in a vehicle carrying children.

Restrictions on smoking in public places can lead to reductions in smoking by limiting the opportunity to smoke and influencing the perceived social acceptability of smoking (Clark et al. 2008; US DHHS 2006). Restrictions also influence the health and wellbeing of people who do not smoke (Scollo & Winstanley 2008; US DHHS 2006). When people cannot smoke for long periods of time because of bans on smoking in their workplace, public transport and other public locations, they may be stimulated to attempt to quit. Some smokers may smoke less because they have fewer hours available in which they can smoke (Chapman et al. 1999; Farkas et al. 1999; Fichtenberg & Glantz 2002; IARC 2009).

Box 3.6: Legislation on smoking in public places

- *Australian Capital Territory:* Smoking (Prohibition in Enclosed Public Places) Amendment Act 2005
- *New South Wales:* Smoke-free Environment Act 2000
- *Northern Territory:* Tobacco control Act 2005
- *Queensland:* Tobacco and Other Smoking Products Act 1998
- *South Australia:* Tobacco Products Regulation Act 1997
- *Tasmania:* Public Health Act 1997
- *Victoria:* Tobacco Act 1987
- *Western Australia:* Tobacco Products Control Act 2006.

Source: *Scollo & Winstanley 2008.*

Legal tobacco purchasing age

The ability of teenagers to purchase cigarettes increases the initiation and likelihood of smoking (AIHW 2008c; Scollo & Winstanley 2008). Accordingly, all states and territories in Australia have legislation prohibiting the supply of cigarettes to people under the age of 18 years (Box 3.7). The legal age for purchasing tobacco products in all states and territories of Australia is 18 years of age (NPHT 2009; Scollo & Winstanley 2008). Since the introduction of a legal purchasing age, along with many other initiatives, Australia has seen significant reductions in smoking rates in young people that have been sustained over many years (Scollo & Winstanley 2008).

Box 3.7: Legislation on supplying tobacco to minors

- *Australian Capital Territory:* The Tobacco (Amendment) Act 1990 *prohibits the sale of tobacco to a person under the age of 18.*
- *New South Wales:* The Public Health (Tobacco) Act 2008 *prohibits the sale of tobacco and non-tobacco smoking products to minors (a person under the age of 18), and also prohibits the purchase of tobacco or non-tobacco smoking products on behalf of minors.*
- *Northern Territory:* The Tobacco Act 1992 *prohibits the sale of cigarettes to a child under the age of 18.*
- *Queensland:* The Tobacco and Other Smoking Products Amendment Act 2004 *prohibits the sale of tobacco to a person under 18.*
- *South Australia:* The Tobacco Products Regulation Act 1997 *prohibits the supply of tobacco to a child under the age of 18.*
- *Tasmania:* The Public Health Act 1997 *prohibits the supply of tobacco to those under the age of 18.*
- *Victoria: from 1 January 1994 it was illegal to sell tobacco to children under the age of 18, under the* Tobacco Act 1987.
- *Western Australia:* The Tobacco Products Control Act 2006 *prohibits the supply or sale of tobacco to children under the age of 18.*

Source: *Quit 2006.*

Tax and price interventions

Increases in tobacco tax are considered to be one of the most effective tools for decreasing smoking rates, especially among children (Lewit et al. 1997; World Bank 1999). In Australia, tax and price interventions for reducing tobacco smoking are the responsibility of the Australian Government. Because taxes make up a substantial percentage of the price, and because consumers are moderately (but not dramatically) responsive to price changes, increasing the rate of tax on tobacco products allows governments to both reduce the consumption of tobacco and increase government revenue (Cancer Council Victoria 2008).

There has been a tax on tobacco products in Australia since 1901. The current tax applied to tobacco products is through excise duty tax, customs duty tax and the GST (VicHealth Centre for Tobacco Control 2008).

The levels of taxation were increased between 1993 and 1995, and have been increased in line with the consumer price index since then. Changes to the method of taxing tobacco products in 1999—to a 'per stick' system for most cigarettes sold—resulted in some price increases. The introduction of the economy-wide GST in 2000 also led to a further real price increase (Box 3.8). The National Preventative Health Taskforce has recommended further increases on excise and customs duty on tobacco (NPHT 2009).

Box 3.8: Types of tax applied to tobacco in Australia

Goods and services tax

The GST is a broad, indirect tax levied at a rate of 10% on most goods and services consumed in Australia. The GST is estimated to be levied on around 60% of total household consumption, excluding basic food items, health care, child care, rent and education. Exports are not consumed in Australia and are therefore exempt from the GST. The Australian Government administers the GST on behalf of the states and territories, which receive GST revenues.

Customs duty tax

Custom duty is imposed on tobacco products imported into Australia, under the Customs Tariff Act 1995. The current rate of customs duty, which applies per stick, is the same as the rate of excise duty imposed on tobacco products manufactured in Australia, and is set out in section IV of Schedule 3 to the Act.

Excise duty tax

A single rate 'per stick' excise applies to all cigarettes with a tobacco content up to and including 0.8 g per cigarette. An excise per kilogram of tobacco applies to all other tobacco products, including cigarettes heavier than 0.8 g tobacco per cigarette, loose tobacco and cigars. As at 1 August 2009, the excise paid per stick on a cigarette containing up to 0.8 g tobacco is 25.833 cents per stick. Tobacco products containing more than 0.8 g tobacco are charged excise at the weight-based rate of $322.93 per kilogram. These rates are subject to an increase in line with the consumer price index, occurring in August and February each year.

Sources: ATO 2009; DoHA 2008l; Treasury 2009; VicHealth Centre for Tobacco Control 2008.

Improving the built environment

The socioeconomic and physical environment of neighbourhoods is associated with individual levels of smoking (Chuang et al. 2005). Interventions relevant to the built environment include restrictions on smoking in public places (see laws and regulations), the density of tobacco outlets, and point-of-sale displays of tobacco.

The higher the density of tobacco retail outlets, the higher the rate of smoking in that area. Lowering the effort and cost of accessing cigarettes is likely to increase consumption (Novak et al. 2006; Pokorny et al. 2003; Schneider et al. 2005).

Related to this, a major area of concern is the availability of tobacco outlets near schools as the density of cigarette outlets is associated with student smoking behaviours (Leatherdale & Strath 2007). Improving the built environment to reduce the uptake of smoking in young people includes preventing the number and proximity of tobacco retailers in school neighbourhoods (Henriksen et al. 2008; Leatherdale & Strath 2007; Schneider et al. 2005).

Point-of-sale tobacco displays have been shown to influence the impulse buying of cigarettes (Wakefield et al. 2007). See Box 3.9.

Box 3.9: Examples of interventions in the built environment

The New South Wales Public Health (Tobacco) Act 2008, *which came into effect in July 2009, bans the display of tobacco products, non-tobacco smoking products and smoking accessories in shops. The implementation will be phased in. The Act also restricts the sale of tobacco products and non-tobacco smoking products to a single point of sale on premises.*

The Tasmanian Government has amended the Public Health Act 2007 *to ban point-of-sale displays of tobacco. The Act will come into effect in February 2011.*

Victoria has amended the Tobacco Act 1987 *to ban point-of-sale displays of tobacco (exemptions apply for special tobacconists). This will come into effect on 1 January 2011. In March 2006, amendments to the* Tobacco Act 1987 *banned all tobacco-vending machines in public places except for permitted nightspots, casinos and bottle shops. This reduces the availability of tobacco, especially to underage people (as people must be aged 18 years or over to enter these premises).*

Refer to the section 'Smoking in public', and Box 3.6 for laws and regulations on smoking in public places.

Public awareness campaigns

Anti-smoking mass media advertising has played a major role in reducing the incidence and prevalence of smoking and is viewed as important for reducing the prevalence of smoking (Wakefield et al. 2008). Advertising raises public awareness about smoking and health, and has been shown to be cost-effective (Keleher & Murphy 2004).

In Australia's national tobacco strategies, social marketing campaigns play a major role in raising awareness of smoking-related health risks. This has resulted in large changes in attitudes toward smoking, including increased quitting attempts, and significant downward trends in smoking prevalence (Cancer Council Victoria 2008). The National Preventative Health Taskforce had recommended that funding be provided for several years to continue a social marketing campaign. This was agreed and has been funded through the National Partnership Agreement on Preventative Health. See Box 3.10 for examples of campaigns.

Box 3.10: Examples of public awareness campaigns

The Australian Government, state and territory governments, and non-government organisations (including Quit) run media campaigns to encourage quitting and prevent uptake of smoking. Quit encourages and supports the community and individuals to quit, and promotes awareness of the serious health effects of smoking (Quit Victoria 2009).

The Cancer Council Western Australia launched the Make Smoking History campaign focusing on 'who will you leave behind?' in May 2009. The campaign explores the experiences, thoughts and emotions of family members left behind by those who have died from smoking-related diseases (Cancer Council Western Australia 2009).

The current public awareness campaign Smarter than Smoking, What's the Point of Smoking When All it Does is Cost You? implemented by the Heart Foundation in Western Australia, targets young people to reinforce the short-term effects of smoking, and the impact it has on health, finances, performance, appearance and social opportunities. It uses television, radio, print and cinema to promote the message (Smarter than Smoking 2008).

National Youth Tobacco Free Day is an annual event aimed at educating young people about the health effects, environmental effects and the law. By raising the awareness of the dangers of smoking, the day seeks to create a tobacco-free generation. Each year, the event has a theme. In 2009 it supported the plain packaging of cigarettes (OxyGen 2009).

Community-based interventions

Community-based smoking interventions aim to reduce the number of people taking up smoking, and help those who already smoke to quit. Community-based interventions exist in schools, workplaces and the wider community, and are usually aimed at particular population groups such as young people).

In 1986, the first smoke-free policy was implemented in all Australian Government workplaces. Further, most enclosed workplaces in Australia implemented a smoke-free policy between 1986 and 1995 (University of Sydney 2007). It is a legal obligation of employers to provide safe workplaces, including eliminating tobacco smoke. Most states and territories support and encourage the development and implementation of workplace tobacco control policies (Scollo & Winstanley 2008).

States and territories work in collaboration with their departments of education to ensure that there is appropriate education about smoking in their school curricula and environments (Queensland Health 2008). The Smarter than Smoking SA Project introduced learning activities on tobacco into their curriculum for senior secondary years in Australian studies, mathematics and English (Quit South Australia 2008; Smarter than Smoking SA & Quit SA 2009). See Box 3.11.

Box 3.11: Community intervention examples

In South Australia, the Riverland Youth Anti-Tobacco Project was set up to reduce the uptake of smoking among 12–17 year olds and increase smoking cessation among 18–29 year olds. The project is funded by Drug and Alcohol Services South Australia.

In 2008, Western Australia implemented the Smoke Free WA Health System policy at all 42 Department of Health sites. The Smoke Free WA Health System Working Party was established, and is responsible for facilitating, implementing, evaluating and monitoring the state-wide policy.

In the Northern Territory, the Department of Health and Families has implemented a smoke-free policy in all grounds and vehicles of all facilities.

From 1 May 2009, all ACT Health facilities and vehicles became smoke-free. Smoking is not permitted at any ACT Health facility, except in a designated outdoor smoking area. ACT Health staff who wish to quit smoking are supported through the provision of free nicotine replacement therapy and smoking cessation courses. Patients admitted to Canberra Hospital who smoke are helped to manage their nicotine dependence while at the hospital through nicotine replacement therapy.

Queensland has had a smoke-free health facilities policy, the Queensland Health Smoking Management Policy, in place since 2006, with free nicotine replacement therapy offered to smokers admitted to hospital (Queensland Health 2009a).

Alcohol

Reducing the misuse of alcohol and its effects requires a reduction in the incidence of risky drinking. Risky drinking is often referred to as 'binge drinking'. There is much debate over the definition of the term, and is difficult to scientifically define it. However, the term generally refers to drinking heavily over a short period of time with the intention of becoming intoxicated, resulting in immediate and severe intoxication (DrugInfo Clearinghouse 2009). Initiatives to help in reducing risky drinking focus on increasing public safety where alcohol is consumed, increasing the number of alcohol-free events, setting up workplace policies that support responsible drinking, providing equitable access to prevention and treatment services for alcohol misuse, and regulating alcohol availability—all of which are addressed in the National Alcohol Strategy 2006–09 (DoHA 2009b,l). The Australian Government has commissioned advice on preventing alcohol-related harm from the National Preventative Health Taskforce (NPHT 2009).

Strategies and guidelines

The National Alcohol Strategy 2006–2009 is a government initiative to minimise the harmful effects of alcohol use in Australia (DoHA 2009b,l). The strategy was developed in response to the Australian culture of high-risk alcohol consumption (DoHA 2009a). The strategy was developed through collaboration among the Australian Government, non-government organisations, industry and the community (DoHA 2009b). It outlines priority areas for coordinated action to develop drinking cultures that support a reduction in alcohol-related harm. The priority areas include intoxication, public safety and amenity, health effects, cultural considerations and alcohol availability (DoHA 2009l). The strategy identifies prevention as the most important goal.

In March 2008, the Australian Government announced the National Binge Drinking Strategy, which includes a range of measures to help tackle binge drinking among young Australians. These include a social marketing campaign, grants-based programs to support community partnerships with sporting and other non-governmental organisations, and innovative early intervention and diversion programs to identify young people who have been involved in an alcohol-related incident (DoHA 2009a).

Most state and territory governments have their own alcohol action plans and strategies (see Box 3.12) to tackle alcohol misuse. These action plans are similar in their priorities, approach, implementation, and evaluation and monitoring. For example, the Queensland Drug Strategy 2006–2010 aims to improve people's health, social and economic outcomes by preventing and reducing the harmful effects of alcohol and other drugs used in Queensland (Queensland Government 2006).

The NHMRC has produced the *Australian guidelines to reduce health risks from drinking alcohol*, specifically to prevent alcohol-related disease. The guidelines are based on the lifetime risk of alcohol-related harm, and recommend that both women and men drink no more than two standard drinks a day if they want to reduce their risk of being harmed by an alcohol-related injury or disease (NHMRC 2009).

Box 3.12: Strategies for preventing excess alcohol consumption

- *Australia-wide: The National Alcohol Strategy 2006–2009 (DoHA 2009l)*

- *Australian Capital Territory: The ACT Alcohol, Tobacco and other Drug Strategy 2004–2008 (ACT Government 2004).*

- *New South Wales: The Drug and Alcohol Plan 2006–2010 (NSW Health 2007).*

- *Queensland: The Queensland Drug Strategy 2006–2010*

- *Western Australia: The WA Drug and Alcohol Strategy 2005–2009 (Drug and Alcohol Office 2005)*

- *Tasmania: The Tasmanian Alcohol Action Plan 2009–14*

- *Victoria: Victoria's Alcohol Action Plan 2008–2013 (Vic. DH 2008).*

Laws and regulations

At the state and territory level, alcohol policies and program responsibilities include law enforcement, licensing regulation, treatment services and drug education in schools (NPHT 2009).

In Australia, alcohol is a legal drug; however, there are laws restricting its manufacture, supply, promotion and consumption (DASSA 2009). Over the past 25 years, changes to licensing laws have allowed more convenience and competition in the supply of alcohol, making alcohol more available than ever (Vic. DH 2008).

Liquor licensing

Regulating the physical availability of alcohol is important in reducing alcohol misuse (NPHT 2009). Liquor licensing laws cover aspects of regulation such as restrictions on the hours during which licensed premises can trade, the type of locations where alcohol can or cannot be sold (for example not in petrol stations or supermarkets in some states and territories) and limiting the number of sellers in the alcohol retail market (Donnelly et al. 2006).

Each state and territory has separate laws regarding the selling, buying and consumption of alcohol (Box 3.13). Some of these have recently changed to allow the police more control over licensed premises and harsher penalties Vic. DH 2007).

Restricting the hours and days of sale of alcohol is a standard component of alcohol policy and regulation (NPHT 2009). For example, some states have restricted trading hours by not allowing alcohol sales before a certain time of day, and by reducing hours on Sundays. Studies on the effects of increased restriction of opening hours of liquor outlets have reported decreases in alcohol consumption, incidence of crime and injury requiring hospitalisation (Chikritzhs et al. 2007b; Douglas 1998). Such interventions are more successful with high community involvement and support (Chikritzhs et al. 2007b).

Box 3.13: State and territories liquor and licensing acts

- Australian Capital Territory: Liquor Act 1975
- New South Wales: Liquor Act 2007
- Northern Territory: Liquor Act 1978–79
- Queensland: Liquor Act 1992
- South Australia: Liquor Licensing Act 1997
- Tasmania: Liquor Licensing Act 1990
- Victoria: Liquor Control Reform Act 1998
- Western Australia: Liquor Control Act 1988.

Legal drinking age and legal purchase age

The benefits of a legal minimum drinking age are reduced alcohol use and the associated issues and problems in young people. There are several regulations in each of the state and territory liquor licensing Acts which protect minors from alcohol. Laws regarding age and alcohol purchasing can influence drinking behaviours.

In all states and territories, the legal drinking age is 18 years (NPHT 2009). This is the earliest age that anyone in Australia is legally allowed to drink, purchase or possess alcohol in licensed premises. Consistent enforcement of purchase age laws is seen as critical in reducing alcohol consumption and related harm (Babor et al. 2003). States and territories vary in allowing drinking or possessing alcohol on private premises for people under the age of 18, but most allow some alcohol drinking under the supervision of at least one adult (such as a parent).

Alcohol labelling and the law

All bottles, cans and casks containing alcoholic beverages for sale in Australia are required by law to state on the label the approximate number of standard drinks that they contain (NHMRC 2009). The consumption limits in the Australian Alcohol Guidelines are based on the 'standard drink' concept.

The Australia New Zealand Food Standards Code provides specific requirements for alcoholic beverages and food containing alcohol. The labelling under this standard covers the declaration of alcohol by volume, standard drink and representation of low alcohol; representations on non-intoxicating beverages and food containing alcohol should not be presented as non-alcoholic. Beer, wine, wine products and spirits are also defined in the Code (FSANZ 2003).

By clearly displaying how many standard drinks the bottle or can contains, the label allows the consumer to monitor and calculate their consumption, and recognise that different types of alcoholic drinks can have different effects. When used in conjunction with the Australian Alcohol Guidelines (no more than two drinks per day for both men and women), it can help in preventing alcohol misuse and overconsumption. Where drinks are served in a glass, as in a bar, restaurant or pub, the staff are obliged to tell the consumer how many standard drinks each glass contains.

Alcohol advertising and the law

Australia has a quasi-regulatory system for alcohol advertising. Instead, there are guidelines in place called the *Alcohol Beverages Advertising Code*. The code is designed to:

> ensure that alcohol advertising will be conducted in a manner which neither conflicts with nor detracts from the need for responsibility and moderation in liquor merchandising and consumption, and which does not encourage consumption by underage persons (Management Committee of the ABAC Scheme 2009).

Alcohol advertising is assessed for the effects it will have on the public and on particular types of individuals, and who the advertisement is directed and communicated to as a whole (Management Committee of the ABAC Scheme 2009). Advertisements must present mature, balanced and responsible approaches to consumption. They must not have a strong or obvious appeal to children or adolescents; suggest that consumption will contribute to a significant change in mood or environment; associate the operation of vehicles, sport or dangerous activity with alcohol use; challenge or dare people to drink; or induce people to prefer a beverage of higher alcohol content (AFA 2009).

Alcohol diversion programs offer the opportunity for offenders to attend education sessions or counselling about the harms of alcohol use and responsible drinking skills (AMA 2009). These programs run in most states and territories and some local governments, often for specific at-risk population groups. For example the Queensland Indigenous Alcohol Diversion Program, provided by Legal Aid Queensland, is a treatment and support program for Aboriginal or Torres Strait Islanders who are charged with alcohol-related offences, or have been referred by the Department of Child Safety.

Tax and price interventions

Making alcohol more expensive is a cost-effective strategy to reduce the misuse of alcohol (Wagenaar et al. 2009). In Australia, there are four different taxes that are applied to alcohol (Box 3.14).

Box 3.14: Taxes applied to alcohol in Australia

Goods and services tax

The GST is a broad, indirect tax levied at a rate of 10% on most goods and services consumed in Australia. The Australian Government administers the GST on behalf of the states and territories, which receive GST revenues.

Custom duties tax

Duties apply only to imported alcohol. It is generally imposed as a percentage of the imported good but on a volumetric basis for excise-equivalent products.

Wine equalisation tax (WET)

All wines, meads, perries, ciders and sakes are subject to the wine equalisation tax. Unlike alcohol excises, the wine equalisation tax is an 'according to value' tax. It is calculated at a rate of 29% of the final wholesale price or, in certain other permitted circumstances, of a nominal wholesale value calculated as 50% of the retail price, or alternatively at the average wholesale price for identical wine.

Excise duties tax

For beer, spirits and other alcoholic beverages, excise is imposed on the alcohol content. Excise duties are levied per litre of alcohol content, with the rates varying according to the following categories: draught beer, other beer, non-commercial beer, other beverages not exceeding 10% of alcohol and potable spirits. The excise rate on commercial beer in containers greater than 48 litres (draught beer) is lower than for other commercial beer. The excise on 'other excisable beverages' is the same rate as for full-strength spirits. Other excisable beverages are those not exceeding 10% by volume of alcohol and include most ready-to-drink alcoholic mixed beverages. (DoHA 2009b; Treasury 2009).

Recently, tax has been increased on drinks known as 'alcopops'. The alcopop tax falls under the excise duties tax category and was increased from $39.36 to $66.67 per litre of alcohol in April 2008, as part of the Australian Government's 5-year plan to reduce teenage excessive alcohol consumption (DoHA 2009j; Vic. DPCD 2009a).

Improving the built environment

In recent years, there has been a relaxation of liquor licensing laws in Australia, and a marked increase in liquor outlets (NPHT 2009). The literature suggests that there is a relationship between the density of liquor outlets and alcohol-related harms, increased consumption, adverse health effects and violent crime (Chikritzhs et al. 2007a; Donnelly et al. 2006; Jackson 2003; Rabow & Watts 1983; Stevenson et al. 1999; Stockwell 1997).

Laws and policies that limit where alcohol can be consumed are common throughout the world. Partial or complete liquor bans in public places operate in Australian state and territory capitals, and regional towns and cities (Webb et al. 2004). The places affected are usually streets and paths, parks and public transport stations. Control over consuming alcohol in public places comes from the knowledge that poorly controlled drinking environments can influence alcohol-related harm (Babor et al. 2003; Plant & Thornton 2002).

Researchers believe that some urban environments promote the use of alcohol through outdoor advertising (Collins Perdue et al. 2003). In Australia, the second-greatest expenditure and exposure to alcohol is outdoor advertising (NPHT 2009). A study by Kelly and colleagues (2008) found that soft drinks and alcoholic beverages were the most commonly advertised products found outdoors around schools in Australia. The Outdoor Media Association Inc. introduced a policy in March 2009, limiting the advertising of alcohol products on fixed signs that are located within 150 metres of a primary or secondary school (OMA 2009).

> **Box 3.15: Examples of initiatives to improve the built environment**
>
> *The Safer Venues Program run by the Queensland Government aims to reduce excessive alcohol consumption that is linked to injury, violence and street crime by working with the liquor industry to improve safety in and around licensed premises (Queensland Health 2008). This program indirectly benefits the community's risk of chronic disease by attempting to reduce alcohol consumption.*
>
> *The City of Sydney Council's Street Drinking Strategy 2006–2011 aims to reduce the social effects of street drinking and improve the health of individuals as well as increase public safety and amenity (City of Sydney 2007).*

Public awareness campaigns

Public awareness campaigns are perhaps one of the most commonly used tools to target risky alcohol behaviour. In Australia, public awareness campaigns are run at all levels of government and by non-government organisations. In the case of excess alcohol consumption, most campaigns are part of wider drug strategies. See Box 3.16 for examples of current campaigns.

Box 3.16: Examples of public awareness campaigns

The National Binge Drinking Campaign was introduced by the Australian Government in March 2008 to tackle the high levels of binge drinking in young Australians. The campaign's primary audience is teenagers aged 15–17 years and young adults aged 18–25 years. The secondary audience is parents of 13–17 year olds, as they are a major influence on their child's drinking behaviours. The campaign focuses on acute harms, as they are most relevant to episodes of intoxicated drinking. The main message of the campaign is 'Don't turn a night out into a nightmare'. The campaign includes television, radio, online and print advertising. The strategies involve raising awareness of the harms and costs associated with drinking to intoxication and delivering personally relevant messages to encourage, motivate and support (DoHA 2008b, 2009a).

The Community Pharmacy Alcohol Standard Drink Awareness Campaign provides alcohol information with a consumer's prescriptions. The information aims to increase awareness of the concept of a standard drink, how to reduce health risks from drinking alcohol and the interaction between some medications and alcohol (May 2009).

In South Australia, the alcohol intoxication campaign Drink Too Much, It Gets Ugly is a state-wide campaign that targets the group identified as most likely to binge drink (men aged 18–39 years). The objective is to reduce the acceptance of public drunkenness and encourage the target audience to re-think how much they drink.

The Victorian Government has produced a number of social marketing campaigns, most recently the alcohol and violence community awareness campaign Will You Handle Your Alcohol? Or Will Alcohol Handle You?. This campaign promotes the need for personal responsibility in alcohol consumption and associated behaviours, and highlights the potential consequences for those whose violent behaviour affects others (Vic. DHS 2009).

The Queensland Young Women and Alcohol Campaign aims to empower and support young Queensland women in reducing harmful alcohol consumption. Women aged 18–22 years are the primary target, as they are seen as the most at-risk population group. The campaign encourages young women to make their own decisions about drinking and promotes the idea that it is okay to say 'no' (Queensland Health 2009b).

Community-based interventions

Community settings are ideal for health promotion interventions as they allow the community to have ownership of their health, develop an awareness of all levels of health and develop a sense of involvement (Corcoran & Bone 2007). In the case of alcohol, the relevant aspects are community culture, geography and local regulations. See Box 3.17 for examples.

Box 3.17: Examples of community-based interventions

The Good Sports program is an initiative of the Australian Drug Foundation to develop safer and healthier communities. Alcohol and sports in Australia have been closely linked for many years. Most major sporting competitions and teams promote and advertise alcohol consumption, and many sports clubs have a tradition of heavy drinking. A large number of clubs depend on revenue from alcohol to finance club activities. The program helps sporting clubs manage alcohol responsibly and reduce alcohol-related problems such as binge and underage drinking. It challenges community and club culture around excessive alcohol consumption, underage drinking and drink driving. It currently operates in every state and territory except for the Australian Capital Territory (ADF 2008).

Rethinking Drinking is an Australian government-funded initiative that seeks to provide practical assistance to students, teachers and parents on how to minimise the harms associated with alcohol misuse. The project aims to encourage families to discuss alcohol issues by providing information to students, parents and other caregivers at alcohol information nights (Rethinking Drinking 2009). These information nights are usually held at schools, and respected members of the public, such as GPs, police officers and other role models, are invited.

FReeZA, a Victorian Government initiative, is a program that provides young people in Victoria with the opportunity to enjoy local drug- and alcohol-free music, sport and other events. Young people are involved in the planning and running of the events, with the help of community organisations (Vic. DPCD 2009b).

The Aboriginal Drug and Alcohol Council (SA) Inc. regularly run camps through the Makin' Tracks program to help Indigenous men realise that they do not need alcohol or drugs to have a good time (ADAC 2009).

Depression

Depression has had increased attention for the last 10 years with a national strategy to combat depression in place since October 2000—Beyond Blue. Prevention of depression has focused firstly on developing recognition in the community that depression is a real disease, enhancing protective factors and preventing its risk factors. Protective factors for depression include social connectedness and activities that promote health and wellbeing, such as physical activity. Risk factors for depression include alcohol consumption, illicit drug use, partner violence and childhood sexual abuse.

Due to the huge amount of effort currently being made to combat depression, it is not possible to describe all population-level interventions. Most Beyond Blue interventions occur across states and territories and there are numerous other initiatives (see Box 3.18 for examples). In the context of the framework used in this report, there are no interventions that specifically target depression in the tax and price incentives or laws and regulations categories, although some interventions may indirectly help prevent depression. Initiatives currently in place to improve the built environment described in the sections on overweight and obesity, physical inactivity and poor nutrition are also likely to help prevent depression as poor built environments and a lack of physical activity are associated with an increased likelihood of depression (Galea et al. 2005).

Box 3.18: Mental health campaigns and community interventions

Beyond Blue includes a national advertising campaign to promote awareness of a variety of mental health illnesses including depression. A range of media is used, including television, radio, print, billboards, public transport and public amenities. The advertising covers postnatal depression, depression in later life, depression or anxiety and alcohol use, depression in men, depression in rural areas, and depression in the workplace.

The Australian Men's Shed Association has 'sheds' all over Australia. Many of these sheds are located in rural and outer areas, and are usually run by the local heath centre. Men from all backgrounds and ages are encouraged to join a shed, where they have the opportunity to get together in their own space, and spend time and work with other men (AMSA 2009).

Headspace, or Australia's National Youth Mental Health Foundation, provides mental health and wellbeing support, information and services to young people aged 12–25 years and their families. The young people can seek help from health professionals from one of their many locations across Australia. These professionals provide services for general health, mental health and counselling, education and employment, and alcohol and other drugs (NYMHF 2009).

The aim of Multicultural and Mental Health Australia is to build awareness of the mental health of Australians from culturally and linguistically diverse backgrounds, through campaigns, projects, information fact sheets, and resources and training for mental health professionals (MMHA 2009).

Flanno Weekend, supported by the Black Dog Institute, is a 3-day campaign to help raise awareness and de-stigmatise mental illness in the Hunter region of New South Wales. Workplaces, school and the community are encouraged to wear a flannelette shirt, as it represents 'working-class, endurance and comfort', and to donate a gold coin (Black Dog Institute 2009).

Mental health and wellbeing strategies, policies and plans recognise the importance of mental health and wellbeing to Australians. Improving mental health and wellbeing is achieved by increasing the allocations of money, implementing frameworks, improving the delivery of health care and services, collaborations, and facilitating community involvement.

Most Australians would be familiar with their workplace or school harassment and bullying policies, in place to protect the mental health and wellbeing of employees or students. These policies usually stem from the state or territory mental health and wellbeing strategy. Suicide prevention action plans are vital in some areas, and have indirect benefits on mental health and wellbeing. See Box 3.19.

Box 3.19: Mental health and wellbeing strategies and policies

Australia-wide: COAG National Action Plan on Mental Health 2006–2011

Australian Capital Territory: Action Plan for Mental Health Promotion, Prevention and Early Intervention, 2006–2008

New South Wales: Community Mental Health Strategy 2007–2012

Northern Territory: Northern Territory Suicide Prevention Action Plan 2009–2011

Queensland: Health Plan for Mental Health 2007–2017

South Australia: South Australia's Mental Health and Wellbeing Policy 2009–2014

Tasmania: Tasmania Mental Health Strategic Plan 2006–2011

Victoria: Because Mental Health Matters—Victoria's Mental Health Reform Strategy 2009–2019 (Vic. DH 2009)

Western Australia: State Mental Health Policy and Strategic Plan 2010–20 for Western Australia.