Heart Foundation

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AUSTRALIA'S HEALTHY TRANSPORT OPTIONS

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This plan for active travel is drawn from Chapter 6 of Moving People 2030 Taskforce 2013, *Moving Australia 2030: a transport plan for a productive and active Australia*, Moving People 2030 Taskforce, Canberra.

The Taskforce comprises representatives from the Cycling Promotion Fund, National Heart Foundation of Australia (Heart Foundation), Australian Local Government Association, Australasian Railway Association, Bus Industry Confederation, Planning Institute of Australia, Tourism and Transport Forum, and International Association of Public Transport—Australia and New Zealand.

The *Moving Australia 2030* report calls for improved efficiency of the transport system by investing in planning and public transport, and promoting walking and cycling. It also calls for the creation of a truly integrated multimodal transport network that will have significant health, environmental, social, equity and economic benefits.

The Heart Foundation and the Cycling Promotion Fund were the lead agencies for compiling Chapter 6, 'A healthy and active Australia'. This original chapter, which forms the basis for this document, was developed by the Heart Foundation and the Cycling Promotion Fund, with the editorial assistance of Rosemarie Speidel.

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FOREWORD

If physical activity were invented today, it would be regarded as a miracle medicine. Taking it for just 30 to 60 minutes a day leads to stunning health benefits.

Physical activity improves the chances of living longer with less disease. It protects against heart disease and stroke, as well high blood pressure and high blood cholesterol. It helps reduce the chance of getting some cancers, including bowel and breast cancer. It helps prevent type 2 diabetes, helps to control weight and promotes weight loss. It guards against osteoporosis, reduces the risk of falls and improves cognitive function in older people, and helps prevent vascular dementia. It improves mood, aids sleep and relieves the symptoms of depression and anxiety. Physical activity makes you fitter and able to tackle more in your daily life.

Disturbingly, far too few Australians are sufficiently active to gain health benefits. Finding the time to exercise is a major problem. That's why we believe that it is important to find ways to build exercise into everyday lives. As we all have to move around our communities on a regular basis—whether it is to shop, work, learn or play—using active forms of transport is one of the easiest ways to get 30 or more minutes of exercise each day.

Walking, cycling and the physical activity associated with using public transport are keys to help unlock the many benefits that physical activity confers to individuals and society.

Australia spends $9 billion each year subsidising medicines, but we must also invest in interventions that promote physical activity, especially walking, cycling and use of public transport (active travel). Not only does it improve health, but it has many co-benefits—it helps ease congestion, improves productivity, reduces pollution and carbon emissions, and improves urban amenity and social wellbeing.

This policy paper and its ten recommendations set out a way of achieving a healthy and active Australia by 2030. We urge all decision makers to embrace active travel and the multiple benefits it brings.

Dr Lyn Roberts AM

CEO, National Heart Foundation of Australia

Mr Peter Bourke

General Manager, Cycling Promotion Fund

CONTENTS

RECOMMENDATIONS

The following ten recommendations to the Australian Government aim to boost walking and cycling, and improve access to public transport in Australia.

The recommendations are the result of an extensive review of evidence and research, both in Australia and internationally, and recognise the complex nature of the transport environment in this country.

There is a solid evidence base supporting the many benefits of a more diverse set of options for moving people, especially for the health of the nation—the subject of this publication. Small changes in transport behaviour and mode depend on a broad range of incentives, options and push factors. The breadth and number of the following recommendations is a reflection of this complexity.

Recommendation 1: Develop and fund a national active travel strategy embracing walking, cycling and public transport, building on recommendations of the Walking, riding and access to public transport ***report (DIT 2012).***

Recommendation 2: Provide sustained infrastructure funding that supports active travel (for example, renew and expand the $40 million National Bike Path program).

Recommendation 3: Establish an active travel office to coordinate and manage the active travel strategy.

Recommendation 4: Establish and support a walking, riding and access to public transport council to provide advice to transport ministers and the Standing Council on Transport and Infrastructure.

Recommendation 5: Require all Australian Government–funded state and territory infrastructure projects to incorporate or enhance active travel, where feasible.

Recommendation 6: Provide financial incentives (tax and price) to make walking, cycling and public transport cheaper and easier choices.

Recommendation 7: Support active living and ageing principles by funding implementation of the Healthy Spaces & Places initiative.

Recommendation 8: Support programs that encourage active travel to school and other educational facilities.

Recommendation 9: Incorporate health benefit factors in cost–benefit frameworks for all Australian Government–funded transport projects.

Recommendation 10: Fund and expand initiatives that incorporate health in urban planning to create healthy and sustainable outcomes.

The Canberra Transport Photo demonstrates the space required in congested urban environments for 69 passengers and various modes of transport.

MOVE IT—AUSTRALIA'S HEALTHY TRANSPORT OPTIONS

This plan sets out the case for embracing active travel—that is, walking, cycling and using public transport—as an important national priority. It presents ten key recommendations to achieve our vision of getting more people more active by making active travel an easy choice.

With concerted action from the Australian Government, and working with state, territory and local governments, we can dramatically improve participation in active travel by 2030.

By 2030, we want to see:

- walking, bicycling and public transport accounting for more than 30 per cent of all passenger trips in our capital cities
- all Australians using a range of mobility and transport modes that are convenient and accessible
- Australians benefiting from more options to be active in their daily lives, which provide important health and social benefits.

The relationship of health to physical activity

Approximately 60 years have passed since Professor Jerry Morris's publication, 'London busman's study', in *The Lancet*. This iconic study was the first to link physical inactivity with coronary heart disease. Morris studied London double-decker bus drivers and conductors, and found that the conductors were half as likely as the drivers to die of a sudden heart attack because they were constantly active, climbing the stairs collecting fares, compared to drivers who sat all day.

Six decades later, we still haven't heeded the call—physical activity is vital to good health and wellbeing.

Physical inactivity remains a grossly underestimated risk factor for acute and chronic diseases, such as heart attacks, strokes and some cancers. It takes a huge social and economic toll on the Australian community. It has been estimated that 16 178 Australians die prematurely each year due to physical inactivity (Medibank Private 2008), a toll of similar magnitude to that caused by smoking.

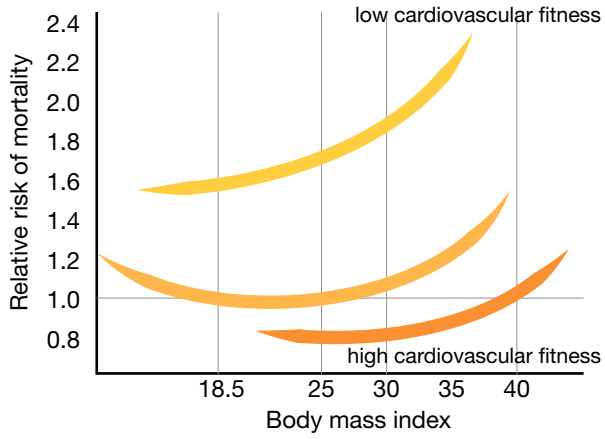
Physical inactivity is also estimated to cost the nation $13.8 billion a year. The direct annual healthcare cost incurred to treat the symptoms of inactivity alone was estimated to be $719 million in 2007–08 (Medibank Private 2008).

» ***Low levels of physical activity are a major risk factor for ill health and mortality from all causes (see Figure 1). People who do not do sufficient physical activity have a greater risk of cardiovascular disease, colon and breast cancers, type 2 diabetes and osteoporosis.***

» ***Being physically active improves mental and musculoskeletal health, and reduces other risk factors such as overweight, high blood pressure and high blood cholesterol (AIHW 2012).***

Physical inactivity is a major contributor to the burden of chronic disease, including cardiovascular disease (heart, stroke and blood vessel disease), and is an important driver of the overweight/obesity epidemic (Heart Foundation 2009a). Disturbing statistics exist in Australia—62.8 per cent of adults were either overweight or obese in 2011–12, up from 56 per cent in 1995. About 8 per cent of children aged 5–18 were obese in 2011–12, and a further 18 per cent were overweight (ANPHA 2013). Despite greater understanding of the significant health burden of physical inactivity, it remains prevalent in Australia. In 2011–12, 66.9% of Australians were either sedentary or had low levels of exercise (ABS 2012).

Figure 1 The effect of cardiovascular fitness on risk of death



The generalised relative risk (RR) of mortality across a range of body mass index (BMI) levels and fitness categories. Three lines illustrate the estimated change on RR as cardiovascular (CV) fitness changes among the populations studied. The curves are drawn as simple approximations of the lines of best fit through numerous published studies. The middle curve shows the overall pattern of increasing RR of all-cause mortality at both lower and higher BMIs. These are shown relative to the 'normal' range of 18–25 BMI units. The top curve shows a higher RR with low CV fitness at any given BMI level. Conversely, the bottom curve shows mortality decreases at any given BMI if CV fitness is high. These curves show that for any BMI level, the risk of mortality is increased in a person of low fitness and decreased in people with high fitness. The figure has been generated using many of the major longitudinal studies reported in systematic reviews.

Source: Reprinted with kind permission from Norton and Norton (2011).

» ***Being physically inactive can take three to five years off your life (Walking for Health 2013).***

Table 1 summarises common risk factors for some chronic diseases and conditions.

Active transport and health

The National Heart Foundation of Australia (Heart Foundation) has developed the *Blueprint for an active Australia*, which outlines key action areas required to increase population-wide physical activity levels to achieve community-wide benefits in health, the environment, social policy and the economy (Heart Foundation 2009a). Both the Blueprint and the Australian Government's National Preventative Health Strategy have recognised that increasing walking and cycling for transport has significant potential to boost physical activity levels in Australia, and requires investment, cooperation, coordination and collaboration between different levels of government and sectors, including transport (Preventative Health Taskforce 2009).

» ***Across the developed world, there are a number of constant factors in travel behaviour, which have not changed noticeably in decades. Among these factors are that most car journeys are short enough to be walked or cycled (Sustrans 2008).***

Current National Physical Activity Guidelines for Australians recommend 30 minutes of moderate-intensity physical activity on most days as the minimum requirement for good health.[1] Given that time is one of the biggest barriers to participation in physical activity, integrating physical activity into daily routines—such as commuting between home and work, or home and school—is increasingly regarded as an effective strategy to increase and maintain population-wide physical activity levels (Garrard 2009).

A recent national survey found that people who cycled for transport averaged 276 minutes of riding each week (Austroads and Australian Bicycle Council 2011), meeting the minimum physical activity requirement for good health from their transport journeys alone.

1 Revised national physical activity guidelines are expected to be released in 2014.

Table 1 Common risk factors for selected chronic conditions

	Behavioural				*Biomedical*		
Conditions	*Tobacco smoking*	*Physical inactivity*	*Alcohol misuse*	*Poor nutrition*	*Obesity*	*High blood pressure*	*High blood cholesterol*
Arthritis	•[a]	•[b]			•[b]		
Asthma	•						
Chronic obstructive pulmonary disease	•						
Colorectal cancer		•	•	•	•		
Depression		•	•		•		
Ischaemic heart disease	•	•	•	•	•	•	•
Kidney disease	•			•	•	•	
Lung cancer	•						
Osteoporosis	•	•	•	•			
Poor oral health	•		•	•			
Stroke	•	•	•	•	•	•	•
Type 2 diabetes		•	•	•	•		

a Relates to rheumatoid arthritis
b Relates to osteoarthritis
Source: Australian Government (2010).

The transport system has potential to make a considerable contribution to boosting physical activity levels by optimising the role of active travel to reduce the burden on our federal and state/territory health budgets and, at the same time, increase the efficiency of the road network.

It is becoming more and more recognised that the transport system affects the health and wellbeing of the whole population, both directly and indirectly. For example, it has been estimated that the Australian healthcare system could save $1.5 billion each year if more people were physically active for 30 minutes a day (Medibank Private 2008).

Where you live affects your health

Where people live can affect physical and mental health. Factors include (Wilson et al. 2010):

> available transport choices

> access to open and green space, footpaths and trails

> availability of local services

> opportunities to exercise

> opportunities for social interaction.

Urban living has both risks and benefits for human health. A comprehensive literature review looking at the relationship between population health and built environment has identified the following as significant domains of the built environment that support human health (Kent et al. 2011):

> physical activity—getting people active for travel and recreation

> social interaction—connecting and strengthening communities through incidental interaction, planning and building community spaces, and designing for crime prevention.

Both factors are strongly linked to transport and access. Walking, cycling and taking public transport all involve significant amounts of physical activity.

Move it—Australia's healthy transport options argues that it is time to recognise that encouraging and supporting walking, cycling and using public transport is the absolute best buy for promoting better health and countering obesity, cardiovascular disease and other chronic conditions that are related to the lack of physical activity in our daily lives.

Additionally, ensuring that our transport network improves access to low and no-cost modes—such as public transport, bicycling and walking—is a significant benefit to disadvantaged and low socio-economic groups, and is recognised in this report.

ADVANTAGES OF ACTIVE TRANSPORT

Walking for transport

The Heart Foundation has identified walking as an effective way to increase levels of physical activity, because it can be incorporated easily into daily activities. Research consistently finds that walking is popular among adults, particularly among women and people in low socio-economic groups (Gebel et al. 2009).

There is clear and robust evidence for the need to promote walking as a means to help people get and stay active. There is a physical inactivity epidemic, and walking is a major part of the solution (Walking for Health 2013).

Walking is the most common form of transport: nearly everyone is a pedestrian for part of their trip, even if they are driving. Despite this, walking is often neglected and is not considered as an important part of the transport system. In Australia, for trips to work or study that are less than 5 kilometres, only about one in five (18.7 per cent) are made by walking (ABS 2008).

However, walking plays a major role in many intracity trips. Just 6.7 per cent of commuters to the central business district (CBD) in Sydney walk to work, but 93 per cent of all internal trips within the City of Sydney are walking trips (City of Sydney 2012). About 50 per cent of day-to-day trips made for purposes other than work or full-time study are made by foot in Melbourne, with people more than 60 years old and young people between 11 and 20 years old making the most walking trips (ABS 2008).

» ***Walking is a core component of journeys involving public transport.***

There is enormous scope to increase walking journeys by prioritising pedestrians in transport planning and transport infrastructure projects.

Cycling for transport

An estimated 1.2 million people make at least one transport journey by bicycle each week, which includes trips to work, school, university, shops, and visits to family and friends (Austroads and Australian Bicycle Council 2011).

Data from Sydney, Melbourne, Brisbane, Perth and Adelaide show an increase in bicycle traffic of up to 18.3 per cent per year on main cycling routes leading into the CBD between 2005 and 2009. A survey to measure progress of the National Cycling Strategy 2011–16 (which aims to double the number of people cycling in Australia by 2016) found that, in a typical week, around 16.6% of the Australian population had ridden in the previous week (Austroads and Australian Bicycle Council 2013).

A 2012 national survey, commissioned by the Heart Foundation and the Cycling Promotion Fund, found that 60 per cent of Australians have access to a bicycle, but 70 per cent of those were not considering cycling for transport in the near future, even though more than 50 per cent would like to (Heart Foundation and Cycling Promotion Fund 2012). The biggest barriers were identified as:

- unsafe road conditions
- speed or volume of traffic
- safety
- the lack of bicycle lanes or trails.

The combination of higher density living that is close to activity centres, increased availability of bicycle parking in new apartments and workplaces, and greater awareness of the health benefits of active travel provides significant opportunities to boost cycling for everyday trips. These opportunities must be capitalised on by making cycling convenient and safe.

Transport choices are influenced by trip cost, time and convenience. Cycling for trips less than 5 kilometres and walking trips of less than 2 kilometres are the most cost-effective transport options for individuals. In congested urban areas, these modes of transport are often faster than other alternatives (NSW Government 2010).

» ***Cycling for trips less than 5 kilometres and walking trips of less than 2 kilometres are the most cost-effective transport options for individuals.***

Recommendation 1: Develop and fund a national active travel strategy embracing walking, cycling and public transport, building on recommendations of the Walking, riding and access to public transport ***report (DIT 2012).***

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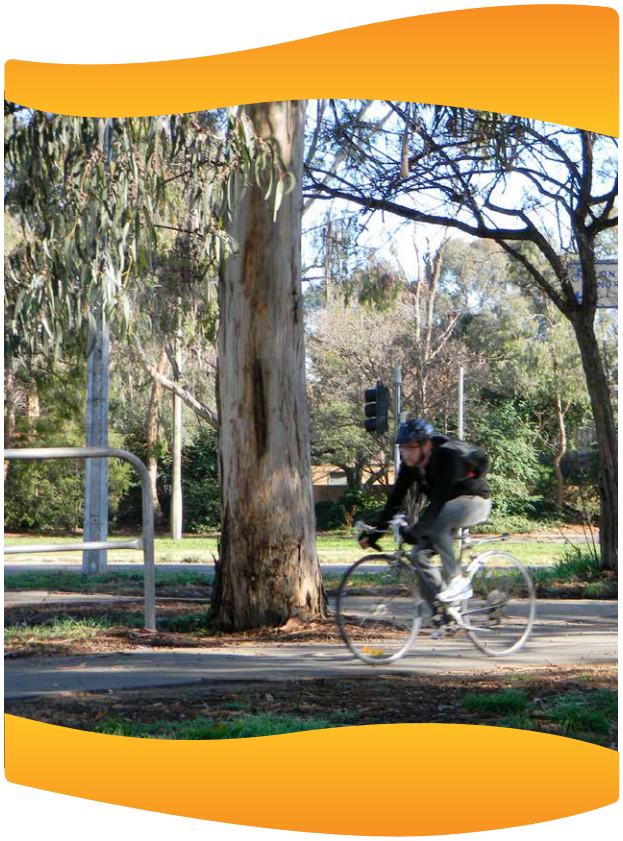

Cycling and walking for day-to-day trips

Day-to-day trips for purposes such as shopping, accessing services (including school and university), and recreation and leisure opportunities are often short, but have significant potential to be undertaken by walking and cycling.

Evidence suggests that the design of activity centres and neighbourhood streets significantly influence people's travel choice. A recent discussion paper showed that communities that have invested in streetscape enhancements to make them more accessible, safer and easier for pedestrians and cyclists have seen some noticeable benefits, including increased small business turnover, increased property value, and improved viability and vitality of areas (Heart Foundation [South Australia] 2011).

Walking and cycling within the public transport system

An integrated transport network that moves people efficiently requires modes of transport to connect seamlessly, to make journeys convenient and intuitive. Improving access by walking and cycling to public transport stops and stations is a cost-effective way to expand the catchment of public transport.

Recommendation 4: Establish and support a walking, riding and access to public transport council to provide advice to transport ministers and the Standing Council on Transport and Infrastructure.

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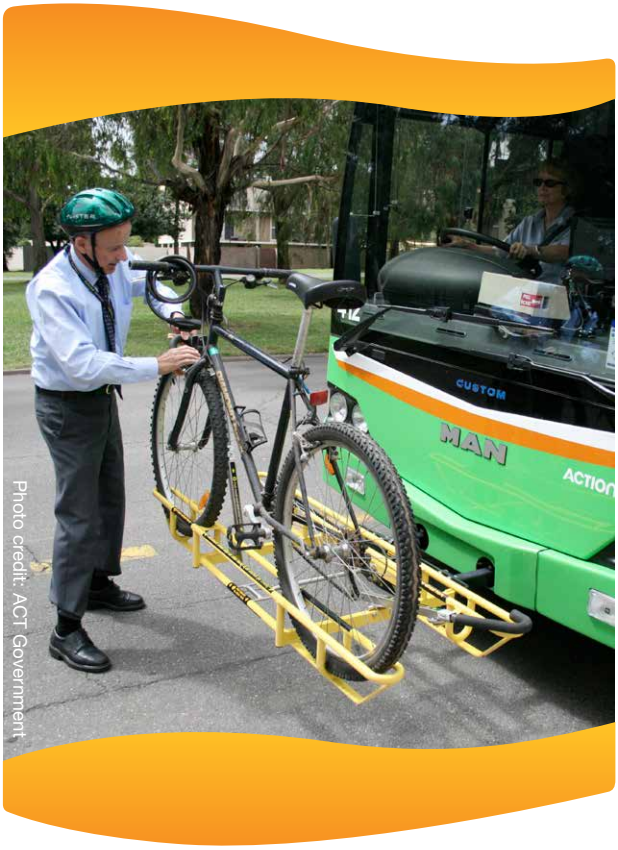
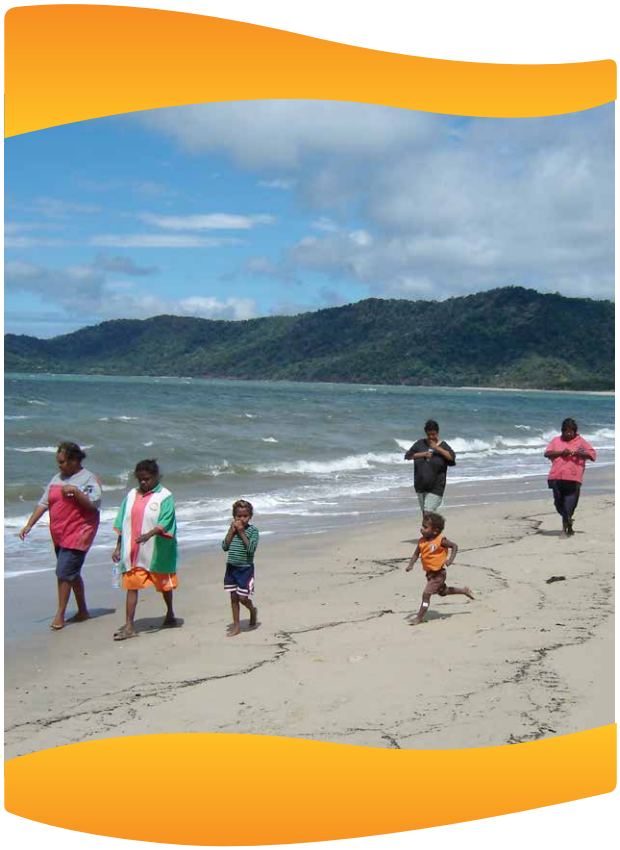


Photo credit: ACT Government



'The West Australian metro rail network, Transperth, regularly sees demand for its Park N Ride facilities at capacity well before 7.00am, causing stress for customers looking to park their vehicle.

'Demand on Perth train station parking is so big that new car parks are needed. Yet in a recent Public Transport Authority survey, 60 per cent of cars parked in these suburban railway stations had driven less than 2 km. That's equivalent to a 10-minute cycle.

'Cycling can be an obvious choice for thousands of Perth commuters.

'The belief that you need a cup of tea and a lie-down after a 2 km cycle is a common misperception, as is the belief that you need a shower and new clothing on arrival (although each case is different).

'Extensive research has shown that train station access that is direct, safe and convenient is vital to promote the choice to cycle to the station.

'And the Public Transport Authority isn't giving up on its commitment to people who want to cycle to train stations either—new convenient, secure, sheltered bicycle parking is continually being rolled out to meet demand where required.

'Transperth has made significant provision for arrivals by walking, cycling and bus at their stations.'

Jim Krynen, Cycling Integration Manager, Public Transport Authority of Western Australia

DISADVANTAGES OF LAND TRANSPORT

Transport provides many benefits to society, but also generates some negative environmental and health impacts. Transport disadvantage is experienced by specific subgroups in the population, such as young people, families with young children, people who are unemployed or on low incomes, older people, culturally and linguistically diverse people, Indigenous Australians and people with disabilities. It is also common in specific geographic locations, such as outer urban areas, and rural and remote Australia (Rosier and McDonald 2011).

This section outlines some of the negative health and social effects of our current land transport system.

Physical inactivity

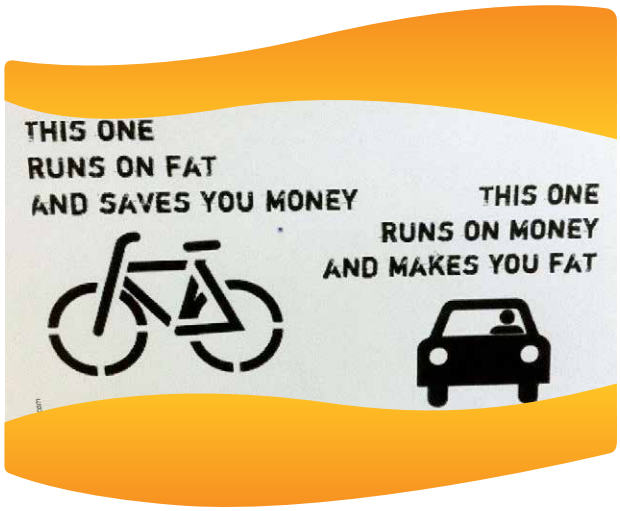
Physical inactivity is a major contributor to the burden of chronic disease, including cardiovascular disease, and is an important driver of the overweight/obesity epidemic (Heart Foundation 2009a). The increase in private motorised transport in Australia during the past four decades has coincided with a significant decline in physical activity in the community.

As previously noted, physical inactivity in Australia has been estimated to cost the nation $13.8 billion a year. In 2008, 33.5 per cent of Australia's adults were physically inactive (ABS 2011b), and it is estimated that 16 178 Australians die prematurely each year due to physical inactivity. The direct annual healthcare cost incurred to treat the symptoms of inactivity was estimated to be $719 million in 2007–08 (Medibank Private 2008).

A range of factors influence physical activity levels. Countries that have maintained high levels of walking and cycling have seen significantly smaller declines in physical activity levels than Australia has (Pucher and Dijkstra 2003).

Air pollution

Urban air pollution is estimated to account for 1 per cent of the disease burden in Australia and more than 3000 premature deaths, mainly among older people. The evidence suggests that Australians are being



exposed to increasing levels of harmful air pollution, causing significant illnesses and leading to thousands of hospitalisations and premature deaths each year (Climate and Health Alliance 2013).

Of particular concern is emissions from transport and power generation, which create toxic air pollution that causes cardiovascular disease, respiratory diseases and cancer, and is also implicated in adverse health impacts on people's reproductive, urological and neurological systems (Climate and Health Alliance 2013). Motor vehicle air pollution is estimated to cause up to 4500 cases of respiratory and cardiovascular disease each year, and the estimated cost of air pollution in Australian capital cities was more than $2 billion in 2005 (DSEWPaC 2011).

Road trauma

On average, four people are killed and ninety are seriously injured every day on Australia's roads. The economic cost of road accidents in Australia is enormous—estimated at $27 billion each year—and the social impacts are devastating (Australian Transport Council 2011).[2] Speed and road trauma are positively correlated; research suggests the City of Melbourne's decision to reduce the CBD speed limit to 40 kilometres per hour (kph), down from 50 kph, would prevent, on average, one fatality and nine serious accidents each year (Carey 2012).

2 Note: This figure is based on a willingness-to-pay methodology.

Traffic noise

Exposure to excessive noise has been shown to cause hearing problems, stress, poor concentration, workplace productivity losses, communication difficulties, fatigue from lack of sleep and a loss of psychological wellbeing.

Noise at home or school can affect children's ability to learn. Compared to those from quieter neighbourhoods, children living near airports or busy highways tend to have lower reading scores and develop language skills more slowly (Bronzaft 1998).

Social exclusion

The current transport system, which relies heavily on private cars, has resulted in increasing social exclusion for people with no or limited access to a private motor vehicle, such as young and older people, students, people on low incomes and people with disabilities.

In addition, an increasing number of households with access to private cars are facing significant financial pressure, with some households on the fringes of Melbourne spending more than 50 per cent of their total income on operating two or more cars to access employment, services and family (Currie et al. 2009).

» ***Some households spend more than 50 per cent of their total income on operating two or more cars.***

Older Australians and mobility

In 2007, the population of people between 65 and 84 years of age was 2.4 million, and it is projected the number of people in this age group will grow to 4 million by 2022. The number of people 85 years and over is also projected to increase rapidly, from 344 000 in 2007 to 1.7 million in 2056 (ABS 2009).

The current transport system is not meeting the needs of older people who no longer drive, with many older people finding it difficult to undertake the most essential trips, such as buying groceries or travelling to medical appointments (NRMA 2010, RACV 2006).

Some of the barriers faced by older Australians to access public or community transport include being unable to walk to the bus stop or train station, inability to access buses or trains due to physical barriers, and fear of safety and falls.

A survey of older people highlighted that 56 per cent rated the quality of footpaths in their local area as inadequate (NRMA 2010):

> *If something as basic as a footpath is not up to scratch for our current population, now is time to start planning and addressing the infrastructure needs for our future ageing population.*

Encouraging and supporting older people to stay physically active is vital, because maintaining physical activity can significantly reduce the risk of heart disease, stroke and diabetes. It is also an important strategy to strengthen bones and reduce the risk of falls. Regular physical activity may also help prevent the onset of chronic illness, and may delay many of the functional losses that may lead to dependency (Carlson et al. 1999). Achieving these benefits is a key focus of the Australian Government's 2012 Living Longer Living Better aged care reform package to support older Australians to stay in their home.

Transport needs of children and young people

Many of Australia's cities and neighbourhoods have changed significantly during the past three decades through increased urbanisation, which creates barriers to children's independent mobility. Streets where children once cycled and played games have become too dangerous because of increased traffic.

According to Australia Walks, the number of children walking to school has more than halved since the early 1970s (Victoria Walks 2010). This decline in walking is significant, as physical inactivity and obesity are rising at an alarming rate: one in four Australian children are now overweight or obese. A study in Queensland showed that up to 30 per cent of children have low fitness levels, while 60 per cent have poor motor skills (Queensland Parliamentary Library 2004).

Only one in ten children ride to school, even though 80 per cent of parents think it would improve their children's health. Although 80 per cent of parents surveyed nominated too much traffic and a lack of safe routes as key barriers to children being allowed to ride to schools, they agreed that cycling is a good way to get fit. Almost 60 per cent of surveyed parents drove

their children to school (Heart Foundation and Cycling Promotion Fund 2012).

Since many home–school trips are relatively short, particularly to primary school, there is significant potential to increase the number of active travel trips as a way to manage network capacity, peak transport congestion and encourage active living.

» ***Only one in ten children ride to school, even though 80 per cent of parents think it would improve their children's health (Heart Foundation and Cycling Promotion Fund 2012).***

Transport is an essential part of life for young people. It enables them to access education, training, employment, and social and recreational opportunities. Research highlights that many young people face significant transport barriers, which are even more severe in regional and rural areas. There are 1.2 million young people living in rural and regional areas. Of the young people surveyed, 96 per cent said that local transport was a problem, and many indicated that lack of transport significantly limits their educational, employment and social opportunities (Currie et al. 2005).

This problem is not limited to rural and regional areas. Research undertaken by the Victorian Council of Social Service has identified the following transport barriers for young people living in Melbourne (VCSS 2010):

- the lack of, or irregular public transport services
- poor connections between buses and trains
- safety fears, particularly at unstaffed stations
- poor amenities
- lack of user-friendly cycling and walking paths.

Improved public transport is the single most common suggestion from young people when asked about transport solutions to their problems (Currie et al. 2005).

For many young people, obtaining a driving licence as soon as they are able is the only way to access employment or training, which exposes them to a high risk of road trauma. According to the NRMA, drivers under 20 years of age are three times more likely than drivers 21 years and over to be involved in a serious crash, and crash risk is higher among young drivers in rural areas.

The transport needs of young people in rural and regional areas and urban fringes are not always met, creating social and economic inequity that can lead to mental health issues and other social problems. Providing better access to alternative transport options in low-density areas is challenging, and requires better and more integrated transport planning and provision.

» ***The transport needs of young people in rural and regional areas, and urban fringes are not always met, creating social and economic inequity that can lead to mental health issues and other social problems.***

Recommendation 7: Support active living and ageing principles by funding implementation of the Healthy Spaces & Places initiative.

Recommendation 8: Support programs that encourage active travel to school and other educational facilities.

BENEFITS OF INTEGRATING ACTIVE TRAVEL IN THE TRANSPORT SYSTEM

Health benefits of active travel

Given physical inactivity is a major contributor to the burden of chronic disease, including cardiovascular disease and diabetes, and an important driver of the epidemic of overweight and obesity, increasing walking and cycling trips has the potential to reduce the burden of preventable disease in Australia (Connelly 2007). There is increasing evidence that creating more connected and liveable neighbourhoods has the potential to reduce some of the negative health impacts of the transport system, and produce significant health and sustainability benefits (Heart Foundation 2009b).

Case study: active travel and health

In 2012, Furie and Desai confirmed what we have known for many years—that transport and planning issues are also health issues. Promoting walking, cycling and public transport is a strategy to reduce population levels of obesity, as well as risk and burden of cardiovascular disease and type 2 diabetes.

The study looked at American adults and found that, compared with people who did not use active transportation:

- *mean body mass index was lower among individuals with low and high levels of active transport, and their waist circumference was lower*
- *odds of hypertension were 24 per cent lower and 31 per cent lower among individuals with low and high levels of active transportation*
- *high active transportation was associated with 31 per cent lower odds of diabetes.*

Active travel was associated with more favourable cardiovascular risk factor profiles, providing additional justification for infrastructure and policies that permit and encourage active transport. Public transport users also walk more often, because the train or bus is a 'linked' trip with a walk or cycle at each end.

Source: Furie and Desai (2012)

Fishman et al. (2012) have costed the health benefits of active transport in Queensland:

- *1 kilometre of walking delivers $2.10 of health benefits*
- *1 kilometre of cycling delivers $3.51 of health benefits.*

An analysis in the United Kingdom established a cost–benefit ratio of up to 37.6 for investments into improving walking environments. It also identified that investments to boost walking and cycling for transport represent excellent value compared with other transport investments (UWE and Cavill & Associates 2011).

An increase in the daily trips undertaken by active modes not only contributes to an increased level of physical activity, but can also contribute to lowering transport congestion on our roads.

» ***The transport system has the potential to make a considerable contribution to boosting physical activity.***

Bus use promotes walking

Research by the Bus Association in Victoria has found that people in Melbourne who use public transport are more likely to get their recommended daily dose of physical activity compared to those who do not. People using public transport spent an average of 41 minutes walking and/or cycling as part of their travel on that particular day. Given these data, it appears likely that most regular public transport users get enough incidental exercise to maintain their general health.

Source: Bus Association of Victoria (2010)

» ***People using public transport spent an average of 41 minutes walking and/or cycling as part of their travel on that particular day.***

Recommendation 9: Incorporate health benefit factors in cost–benefit frameworks for all Australian Government–funded transport projects.

Economic benefits of active travel

Recent research has shown a flattening of growth in passenger vehicle kilometres travelled in capital cities, suggesting there may be a limit to growth in per capita private car travel (BITRE 2011). Most capital cities in Australia have seen a significant increase in demand for public transport services during the past few years from people seeking more convenient, affordable and faster transport options.

» ***Most capital cities in Australia have seen a significant increase in demand for public transport services during the past few years from people seeking more convenient, affordable and faster transport options.***

Population growth and demographic changes have resulted in significant population growth in capital cities, with more than 14.5 million people—close to two-thirds of Australia's population—living in a capital city statistical division. The rapid growth at the fringes of our cities provides Australia with the biggest transport challenge. Some local government areas, such as Wyndham, Victoria, have grown by 7.8 per cent in 12 months. If not addressed urgently, this rapid growth will have serious economic, social and environmental consequences.

All of these elements provide challenges and opportunities for active and public transport and travel.

Many councils and state governments have encouraged higher density housing along transport corridors to manage travel demand. In addition, there is an increasing trend towards inner-city living and increased urban density. Building approvals for higher density homes, including apartments, increased by 127 per cent during the past three financial years in Melbourne and, in 2010–11, accounted for 25 per cent of residential building approvals in Australia (ABS 2011c).

Recent trends in the growth of public transport use in capital cities around Australia highlight high-density living and population growth along transport corridors as an effective strategy to reduce pressure on the road network and boost public transport use. However, this requires public transport service frequency and capacity to be improved to cope with this increased demand.

Recommendation 10: Fund and expand initiatives that incorporate health in urban planning to create healthy and sustainable outcomes.

CONCLUSION

There is a solid evidence base supporting the many benefits of more diverse and active options for moving people, especially for the health of the nation. The current National Physical Activity Guidelines for Australians recommend 30 minutes of moderate-intensity physical activity on most days as the minimum requirement for good health. It therefore makes sense to make our travel more active and convenient.

Time is one of the biggest barriers to participation in physical activity. Integrating physical activity into daily routines such as commuting between home and work, or home and school, is increasingly regarded as an effective strategy to increase and maintain population-wide physical activity levels. A recent national survey found that people who cycled for transport averaged 276 minutes of riding a week, thereby meeting the minimum physical activity requirement for good health from their transport journeys alone (Austroads and Australian Bicycle Council 2011).

The potential economic benefits are also significant. The Australian healthcare system could save $1.5 billion each year if more people were physically active for just 30 minutes a day (Medibank Private 2008). Lower hospital admissions are just one of the potential manifestations of a general improvement in population health.

Urban living has both risks and benefits for human health. A comprehensive review of literature on the relationship between population health and the built environment identified physical activity and social interaction as significant domains of the built environment that support human health (Kent et al. 2011).

Getting people active for travel and recreation, and connecting and strengthening communities through incidental interaction, planning and building community spaces, and designing for crime prevention, are factors that are strongly linked to transport and access.

With concerted action from the Australian Government, and working with state, territory and local governments, we can dramatically improve participation in active travel by 2030. Many of the recommendations in this report are steps that can be taken by all jurisdictions to achieve this objective.

There is enormous scope to increase walking journeys by prioritising pedestrians in transport planning and transport infrastructure projects. This report provides a comprehensive portfolio of policy approaches to improve the state of the nation's health and transport networks.

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FINDING
A WAY INTO
LAST YEAR'S
JEANS

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