Six actions the next Australian Government must take to tackle our biggest killer: HEART DISEASE

National Heart Foundation of Australia 2016
The challenge
The Australian Institute of Health and Welfare (AIHW) has rightly identified chronic disease as Australia’s biggest health challenge.

But to successfully meet the chronic disease challenge, Australia must do more to tackle one of its largest, and most costly, components: cardiovascular disease (heart, stroke and blood vessel disease).

By itself, coronary heart disease is the single biggest killer of Australians, claiming 20,173 deaths, or 13.1% of all deaths registered in 2014.1 Coronary heart disease is a major cause of premature death.

This policy paper identifies six cost-effective actions that the next Australian Government must take in order to:

• help all Australians lead longer, healthier lives
• boost productivity
• improve the efficiency and effectiveness of our healthcare system
• help prevent not only heart disease, but many other chronic conditions, including some cancers, type 2 diabetes, kidney disease and dementia.

The facts
Cardiovascular disease (heart, stroke and blood vessel disease) is:

• the most costly disease group ($7.7 billion a year, or 10.4% of direct healthcare expenditure, including $4.5 billion on hospital admissions and $1.65 billion on pharmaceuticals)2
• highly prevalent, with 4.2 million Australians living with some form of cardiovascular disease3
• a major cause of avoidable hospital admissions4
• the cause of almost one-third of all deaths (30%)5
• responsible for 24% of fatal burden of disease (Years of Life Lost, YLL)6
• largely preventable.

Our policy proposals align with national health objectives

Intergenerational Report
The 2015 report identifies changing patterns of chronic disease as a key health cost driver, acknowledges the importance of prevention and improved cardiac care as a factor in increased life expectancy, and identifies the need for Australians to stay active as they age.

Reform of the Federation
‘A new focus on primary care and keeping people out of hospital is necessary. When it comes to chronic care, the issues of diabetes, heart disease and mental health require particular attention.’
– Leader’s Retreat communique, July 2015

Implementation Plan to Close the Gap
The implementation plan has a strong focus on prevention, as well as on improving the patient journey of Aboriginal and Torres Strait Islander peoples through the health system.

Australian Institute of Health and Welfare
With an ageing population and more prevalent risk factors, the AIHW identifies chronic disease as ‘Australia’s greatest health challenge’. Chronic disease is often discussed in terms of four major disease groups – cardiovascular diseases, cancers, chronic obstructive pulmonary disease and diabetes – with four common behavioural risk factors: smoking, physical inactivity, poor nutrition and harmful use of alcohol. Between them, these four disease groups account for three-quarters of all chronic disease deaths.
Six actions to tackle cardiovascular disease

1. Develop national heart and stroke strategy
   Address a glaring gap in the current Federal health approach to chronic disease by developing a heart disease strategy to sit under the National Strategic Framework for Chronic Conditions. $0.5 million

2. Detect and manage those at risk
   Prevent avoidable hospital admissions through early detection of those at risk of heart attack, stroke, diabetes, kidney disease and other vascular conditions by increasing uptake of the Integrated Health Check. No cost for new quality incentive program and fund new MBS item

3. Fund 50 cardiovascular disease research fellowships
   Fund 50 cardiovascular research fellowships and ensure the new Medical Research Future Fund invests in research that focuses on the major causes of the Australian disease burden. $24 million over 3 years

4. Help Australians ‘Move more, sit less’
   Fund the development of a national physical activity action plan to help tackle chronic disease by educating and enabling Australians to be active in their everyday lives. Scalable from $35 million a year

5. Close the gap on rheumatic heart disease
   Continue to fund the National Partnership for the rheumatic heart disease strategy and Rheumatic Heart Disease Australia at current or greater levels. $10 million over 3 years

6. Fund a national audit of cardiac rehabilitation service
   Improve chronically low levels of participation in life saving cardiac rehabilitation program through an annual audit. $1 million a year
1. Develop a heart and stroke action plan

**Recommended action:** Develop a comprehensive national action plan for heart disease and stroke as an integral part of the National Strategic Framework for Chronic Conditions.

Although cardiovascular disease remains a leading killer of Australians and is the most costly disease in terms of direct healthcare costs, there is no national action plan to promote measures that will ease the burden this disease group imposes on our community.

This is a glaring omission, particularly as there are major gaps in the current approach to cardiovascular disease prevention, early detection, management and research.

There is now an ideal opportunity to develop a national heart and stroke action plan as all Australian governments have agreed to develop a new National Strategic Framework for Chronic Conditions. Work is well underway to develop the new framework, which will replace the ageing national chronic disease strategy.

While the framework will inevitably be a high-level document, it will sit above a range of important strategies and action plans that will cover specific disease groups and risk factors. The development of an Australian heart and stroke strategy must be part of the new approach to chronic disease.

Much more can be done – and done in a highly cost-effective way – to prevent premature death, improve quality of life and reduce the immense economic burden cardiovascular disease places on the health system.

A well-constructed national heart and stroke action plan can achieve these objectives and sit alongside other disease-specific strategies that have been developed, including the recently announced National Diabetes Strategy.

The case for a national heart and stroke action plan is clear. While mortality rates have been in decline for several decades, cardiovascular disease still causes almost 30% of all deaths, is a leading cause of the total burden of disease in Australia (14% of the total burden) and imposes massive social and economic costs comprising 10.4% of total direct healthcare expenditure. A national heart and stroke action plan has already been supported by the Australian Government’s Review of Cardiovascular Disease Programs (Birch Review).

Disturbingly, the number of people with cardiovascular disease is set to increase as the population grows, ages and becomes increasingly overweight and obese, and some risk factors, such as poor nutrition, lack of physical activity, high blood cholesterol and high blood pressure, continue at alarmingly high rates.

2. Detect and manage those at risk

**Recommended action:** Include the integrated Health Check and on-going management of patients at risk as part of the development of a new, quality-focused Practice Incentive Program (PIP). Provide a Medicare Benefits Schedule (MBS) item to support uptake of the integrated health check.

Much attention on chronic disease is rightly focussed on either disease prevention for those who are still well or programs for those already sick. However, not enough focus is placed on those who are about to get sick.

Well-established, National Health and Medical Research Council (NHMRC) approved-guidelines call for general practitioners (GPs) to conduct assessments for eligible patients to detect those at risk of having a heart attack, stroke or developing type 2 diabetes or chronic kidney disease.

Because these diseases often co-exist and share many risk factors, it is recommended that these assessments be done concurrently as part of an integrated health check.

A new quality-focused PIP that includes detection and prevention of vascular and related diseases should require general practices to:

- check eligible patients for vascular and related conditions
- manage the overall risk profile of patients, stratify risk (high, moderate, low) and address their combined risk factors
- maintain a patient register, with recall and reminder system
- record and report the proportion of eligible patients who are checked, have their risk managed, have a GP Management Plan (GPMP) and access evidence-based prevention programs

An MBS item should also be established to support uptake and implementation of the integrated health check.
For more than 50 years, the Heart Foundation has played a vital role in the research of the causes, treatment and prevention of cardiovascular disease and its related disorders.

Over this time, the Heart Foundation has invested more than $500 million towards cardiovascular research helping to attract the best and brightest medical minds to cardiovascular research. But cardiovascular research now faces a serious crisis.

There is a need to break the cycle of decline and restore funding so that the research community can continue to build on the success of the past six decades and keep mortality rates in decline as the population ages and grows.

This is critical for the social and economic well-being of the nation, as cardiovascular disease is a leading killer of Australians and the most expensive disease in terms of direct healthcare costs.

Investment in cardiovascular research reaps enormous social and economic benefits and drives improvement in quality and outcomes.

Australian Government funding for 50 cardiovascular research fellowships will help break the cycle of decline in cardiovascular research and enable heart and stroke research to continue to contribute to keeping our ageing population fit, well and out of hospital.

The fellowships should be aimed at attracting mid-career researchers who are 5–12 years post their doctorates.

In order to attract high-calibre candidates, each fellowship would offer $110,000 per annum in a salary and an annual project support package of $40,000. This will require an investment of $24 million over three years.

The investment in 50 cardiovascular research fellowships will significantly boost the capacity of cardiovascular disease research in Australia.

In addition, funding that will flow from the new Medical Research Future Fund should be allocated to priorities that reflect the burden of disease facing the nation, ensuring that the leading causes of death and disease attract appropriate research funding.

The benefit-cost ratio of investment in research across specific disease areas for cardiovascular disease (including stroke) was 6:1.10

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Australian needs a funded national physical activity action plan to help people move more, sit less. The evidence is compelling.

Physical inactivity is a major health problem in its own right. Disturbingly, two in three (66.2%) Australians aged 15 and over are sedentary or have low levels of exercise.11,12

Physical inactivity:

- costs the health budget an estimated $1.5 billion a year13
- causes an estimated 14,000 deaths a year14
- contributes to almost one-quarter of the cardiovascular burden of disease in Australia (24%)15
- is a critical factor in Australia’s obesity epidemic, with more than half of all Australian adults being overweight or obese.16

And yet, despite strong evidence of the benefits of physical activity, far too many Australians lead sedentary lives. Eight in 10 children do not meet the physical activity guidelines of 60 minutes a day.17

Older Australians fare little better. Most Australians are either sedentary or undertaking low levels of physical activity.18 Since 2001, the number doing very little or no exercise has continued to increase.

Despite these disturbing statistics, Australia is yet to develop a national physical activity action plan. Many other nations, including the US, New Zealand and Canada, have done so. In fact, an international assessment of 131 countries conducted in 2015 by the Global Observatory for Physical Activity, revealed that 37 nations have national physical activity action plans, and a further 64 had physical activity included as part of their chronic disease plans.

The Heart Foundation calls for the development of a national physical activity action plan that supports programs and initiatives in the nine priority areas identified at the national physical activity consensus summit in Canberra in 2015.19

4. Help all Australians ‘Move more, sit less’

Recommended action: Develop a comprehensive, funded national physical activity action plan.

If physical activity is thought of as a medication with an adult dose of 30–60 minutes a day, there is scarcely anything that could be taken daily that would provide comparable health benefits.
5. Close the gap on rheumatic heart disease

**Recommended action:** Continue to fund the National Partnership for the rheumatic heart disease strategy and Rheumatic Heart Disease Australia at current or greater levels.

Rheumatic heart disease (RHD) is primarily a disease of social disadvantage in which the highest burden, sadly, falls on Aboriginal and Torres Strait Islander communities. It is considered a Third World disease that unnecessarily adds to the already high burden of cardiovascular disease for Aboriginal and Torres Strait Islander peoples.

Cardiovascular disease is the leading cause of death for Aboriginal and Torres Strait Islander peoples and it adds insult to injury that they are eight times more likely than other Australians to be hospitalised for rheumatic fever and RHD. In the Northern Territory in 2010, the prevalence of RHD among Aboriginal and Torres Strait Islander peoples was as much as 26 times the rate for non-Indigenous people.

While Australia is one of only three countries that take a national approach to RHD, more needs to be done. A three-step action plan on RHD to lock in the gains, accelerate recovery and secure vital funding will close the gap between Aboriginal and Torres Strait Islander peoples and non-Indigenous Australians.

- We need to build on the work of the National Partnership for the rheumatic fever strategy and strengthen current levels of funding for control programs and RHD Australia.
- We need to employ the wider use of low-cost diagnostics such as echo screening because for every child diagnosed with RHD, there is one that goes undiagnosed.
- We need to accelerate the elimination and prevention of RHD through government support for the development of an easily-administered, long-acting penicillin as part of a management strategy.
- We need targeted support of current research trails underway in Australia to develop a vaccine to prevent RHD.

By committing to addressing rheumatic heart disease, the Government can enhance its ability to reduce the disparity between Aboriginal and Torres Strait Islander peoples and non-Indigenous Australians, and eliminate this disease as a public health priority within five years.

6. Fund a national audit of cardiac rehabilitation services

**Recommended action:** Fund an audit of cardiac rehabilitation referral and completion rates that will help to identify gaps and opportunities for improvement in existing services.

People who have had a heart attack or who have heart failure should be referred to, and complete, a cardiac rehabilitation or heart failure program. It is one of the very best things a heart attack survivor can do to reduce the chances of having a further cardiac event. It also enhances the quality of life for heart attack survivors and those suffering from heart failure.

Cardiac rehabilitation and heart failure programs are an essential but underused part of recovery from heart attack and/or management of heart disease. It is estimated that attendance rates for cardiac rehabilitation are as low as 11–31%.

Cardiac rehabilitation programs guide and support patients to help them recover from heart attack. They encourage lifestyle modification, such as quitting smoking; address psychosocial risk factors, including depression; and improve medication management and compliance.

Data from AIHW shows 55,000 Australians were admitted to hospital in 2009–10 because they had a heart attack. Each hospital admission for heart attack costs around $25,000 per patient, including more than $18,000 in direct hospital costs. This costs the hospital system in Australia $1.4 billion a year.

Unfortunately, referral to cardiac rehabilitation programs does not happen often enough, despite strong evidence showing these programs work. A recent cost-benefit analysis of increased cardiac rehabilitation uptake in Victoria, over a 10-year period, estimated overall net benefits (economic and social) of up to $227 million.

Another Victorian study showed a 35% increase in five-year survival rates among patients who attended cardiac rehabilitation. Other studies have shown better outcomes for physical activity, blood lipid levels, medication adherence, healthcare use, social adjustment, smoking reduction and reduced risk of a cardiac event reoccurring.

In the UK, an annual audit of cardiac rehabilitation has helped shine the light on referral and completion rates, and has helped drive improvements across the system. Australia needs a similar annual audit to help save lives and reduce costs. A small investment in the audit has the potential to drive major change.

While the measures listed above target key areas that need action if we are to tackle Australia’s leading cause of death and disease, the table below outlines the full suite of measures that should inform a comprehensive approach to heart disease.
### A comprehensive approach to heart disease

**Six actions to tackle cardiovascular disease**

<table>
<thead>
<tr>
<th>Action</th>
<th>Cost</th>
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<tbody>
<tr>
<td>Develop a heart and stroke action plan</td>
<td>$0.5 million</td>
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<tr>
<td>Detect and manage those at risk</td>
<td>No cost, MBS item</td>
</tr>
<tr>
<td>Fund 50 cardiovascular disease research fellowships</td>
<td>$24 million over 3 years</td>
</tr>
<tr>
<td>Help all Australians ‘Move more, sit less’</td>
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<td>$1 million a year</td>
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**Additional measures**

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<tr>
<th>Measure</th>
<th>Cost</th>
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<tr>
<td>Increase public health investment</td>
<td>Boost investment</td>
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<tr>
<td>Strengthen national food reformulation program</td>
<td>$5 million a year</td>
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<tr>
<td>Fund national obesity prevention and nutrition strategies</td>
<td>Scalable</td>
</tr>
<tr>
<td>Invest in tobacco control, especially education campaigns</td>
<td>Boost investment</td>
</tr>
<tr>
<td>Review cardiovascular disease risk guidelines</td>
<td>$1.2 million</td>
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<tr>
<td>Fund the review of vital heart failure guidelines</td>
<td>$2.8 million</td>
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<tr>
<td>Fund national heart failure study</td>
<td>$5 million</td>
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<tr>
<td>Fund expansion of telemedicine pilot programs for stroke</td>
<td>$2.2 million over 2 years</td>
</tr>
<tr>
<td>National defibrillator program for sport venues and clubs</td>
<td>$6.5 million a year</td>
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<tr>
<td>Reduce the incidence of rheumatic heart disease</td>
<td>$15 million over 4 years</td>
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<tr>
<td>Reporting of treatment times for heart attack and stroke</td>
<td>$4 million over 4 years</td>
</tr>
<tr>
<td>Monitor stroke quality care and target quality improvement</td>
<td>$6.4 million over 4 years</td>
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<tr>
<td>Biomedical component of the National Health Survey</td>
<td>$12 million every 6 years</td>
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### References
