

AUSTRALIAN CHRONIC DISEASE PREVENTION ALLIANCE



Submission to the Select Committee into the Obesity Epidemic in Australia

July 2018

The Australian Chronic Disease Prevention Alliance welcomes the opportunity to provide a submission to the Select Committee into the Obesity Epidemic in Australia.

About the Australian Chronic Disease Prevention Alliance

The Australian Chronic Disease Prevention Alliance (ACDPA) brings together Cancer Council Australia; Diabetes Australia; National Heart Foundation of Australia; Kidney Health Australia; and the Stroke Foundation. These leading Australian non-government health organisations share a commitment to reducing the growing incidence of chronic disease in Australia attributable to modifiable risk factors.

ACDPA members work together in the primary prevention of chronic disease, with emphasis on changes to the food and physical environments to improve nutrition, increase physical activity and decrease sedentary behaviour, and reduce unhealthy weight at a population level.

Overview

Chronic disease is described as Australia's greatest health challenge, due to its personal, social and economic impacts.¹ One in two Australians have a chronic disease and one in four have at least two chronic diseases.² Chronic disease accounted for 36% of national health expenditure in 2008-09.³ As the population ages, these costs are anticipated to grow.

Yet one-third of disease burden could be prevented by addressing modifiable risk factors, including overweight and obesity.⁴ Overweight and obesity is responsible for 7% of disease burden and contributes to increased risk of cardiovascular disease, stroke, type 2 diabetes, chronic kidney disease, depression, osteoarthritis⁵ and 12 types of cancer (mouth, pharynx and larynx cancers; oesophageal cancer (adenocarcinoma); stomach cancer (cardia); pancreatic cancer; gallbladder cancer; liver cancer; colorectal cancer; breast cancer (postmenopause); ovarian cancer; endometrial cancer; prostate cancer (advanced); kidney cancer).⁶

When combined with physical inactivity, the burden caused by overweight and obesity grows to 9% – equivalent to the burden attributed to tobacco.⁷

Recommendations

1. ACDPA recommends that a national obesity strategy be prioritised to reduce the impact of childhood and adult obesity in Australia, including other initiatives recommended in the *Tipping the Scales* consensus report to improve food and physical environments.
2. ACDPA recommends that the Australian Government protect children by restricting the marketing of unhealthy food and beverages (i.e. energy-dense, nutrient-poor food and beverages). This includes:
 - legislating to implement time-based restrictions on unhealthy food marketing on television;
 - drawing on existing legislation, regulation and regulatory agencies to restrict unhealthy food marketing to children in all other media;
 - developing independent and consistent nutrient criteria to determine which foods are classified as unhealthy;
 - establishing independent, clear and transparent monitoring and enforcement processes with meaningful penalties to deter companies from breaching regulations.
3. ACDPA recommends that the Health Star Rating system be: amended to improve alignment with the Australian Dietary Guidelines, mandated at the 5-year review to facilitate meaningful product comparisons, and promoted through education campaigns and in-store advertising to enhance consumer awareness and encourage uptake.
4. ACDPA recommends that new targets and timeframes for food reformulation be set by the Healthy Food Partnership with co-regulation from government to encourage timely and meaningful reformulation to enhance the healthiness of products.
5. ACDPA recommends sustained, funded and well-researched mass media campaigns to increase physical activity and improve nutrition.

Terms of Reference

- a. **The prevalence of overweight and obesity among children in Australia and changes in these rates over time;**

Prevalence among children

More than one in four (27.4%) Australian children aged 5-17 years are overweight or obese.⁸ Alarming, 20% of very young children (aged 2-4 years) are already overweight or obese. These children are more likely to grow up to become overweight or obese adults with an increased risk of chronic disease and premature mortality.⁹ Therefore, preventing weight gain in children is important to impact rates of obesity in adulthood and future wellbeing.

The prevalence of overweight among Australian children doubled from the mid-1980s to the mid-1990s while rates of obesity trebled.¹⁰ Overweight and obesity among children has continued to grow since then, but at a slower rate from 20.9% in 1995 to 27.4% in 2014-15.¹¹

The Longitudinal Study of Australian Children found that 48% of children who were obese at 4 years of age were still obese at 12 years old.¹² Additionally, 17% of children who were overweight at 4 years old had become obese by 12 years of age. Preventing unhealthy weight gain remains the most important strategy to control obesity at the population-level due to the difficulties in reversing excess weight gain.

Population groups

There is a disproportionate prevalence and burden of overweight and obesity amongst some population groups, including people living in rural, regional and remote areas, people from lower socioeconomic areas, and Aboriginal and Torres Strait Islander peoples.

A greater proportion of Aboriginal and Torres Strait Islander children are overweight or obese, compared to non-Indigenous children. In 2012-13, almost one-third (30%) of Aboriginal and Torres Strait Islander children were overweight or obese, comprising 20% overweight and 10% obese.¹³

Children living in Outer regional/Remote areas are also more likely to be overweight or obese than children living in Major cities (36% compared to 25%), as well as children in the lowest socioeconomic group (35%) compared to those in the highest socioeconomic groups (23%).

Adult population

The prevalence of overweight and obesity among Australian adults is even greater than among Australian children, with 63.4% of Australian adults overweight or obese in 2014-15 (11.2 million people).¹⁴ Australia has the fifth highest adult obesity rate amongst OECD countries,¹⁵ and more than one in four Australians are now obese (28% in 2014-15), up from 19% in 1995.¹⁶ By 2031-32, an estimated 41% of Australian adults are expected to be obese.¹⁷

b. The causes of the rise in overweight and obesity in Australia;

A range of factors contribute to unhealthy weight gain, including individual, behavioural, social and environmental factors. The obesogenic environment is likely a major contributing factor, considering the dramatic increase in overweight and obesity in recent decades.¹⁸ Overweight and obesity generally arises when energy intake through diet exceeds energy expended through physical activity.

Poor nutrition

The impact of poor nutrition in Australia is of particular concern. It contributes to overweight and obesity, and independently increases risk of cardiovascular disease, type 2 diabetes, and certain cancers. Together, dietary risk factors account for 7% of the Australian burden of disease.¹⁹

Australians are consuming more and more unhealthy foods and beverages.²⁰ Discretionary foods containing saturated fat, added salt and added sugars account for around one-third of adults' daily energy intake and almost 40% of children's intake,²¹ despite the Australian Dietary Guidelines' recommendations to limit discretionary choices. In contrast, only 5% of Australian adults consume the recommended two serves of fruit and five serves of vegetables each day.

Poor dietary choices are exacerbated by the food environment, with high levels of snack food and soft drink displays in stores²² and advertising of unhealthy foods.²³ Energy-dense and nutrient-poor foods are increasingly available, accessible, affordable and marketed.²⁴ Growing portion sizes and 'upsizing' portions also contribute to increasing energy (kilojoule) intake. Shelf space for energy-dense foods and drinks is even greater in stores in socioeconomically disadvantaged neighbourhoods.²⁵

Alcohol

Alcohol can also contribute to unhealthy weight gain, as it is high in kilojoules and nutrient poor.²⁶ The Australian Dietary Guidelines recommend limiting alcohol consumption as an important component of balancing dietary energy intake, in light of the increasing rates of overweight and obesity.

Physical inactivity

Physical activity helps to prevent unhealthy weight gain and maintain or improve blood pressure, cholesterol and blood sugar levels.²⁷ On the other hand, physical inactivity contributes to endocrine diseases, cardiovascular disease and some cancers.²⁸

The obesogenic environment reduces opportunities for physical activity through changes to urban planning and school environments, changing work lives, and increasing technology and screen-based activities.²⁹ Despite the common perception that Australia is a sporting nation, more than half of Australian adults are not active or do not meet the physical activity guidelines. Meanwhile 80% of children and young people do not meet the daily national physical activity recommendations.³⁰

The prevalence of physical inactivity has remained high over two decades, and health efforts to increase activity among Australian adults have been relatively ineffective.³¹ However, modelling suggests that small sustained increases in daily activity could improve population health. Disease burden could be reduced by 13% through an additional 15 minutes of brisk walking on 5 days per week, and 30 minutes of activity on 5 days per week could reduce burden by 26%.³²

c. The short and long-term harm to health associated with obesity, particularly in children in Australia;

Childhood obesity

The World Health Organization recognises childhood obesity as an urgent global challenge with serious short- and long-term consequences.³³ The World Health Organization reports that childhood obesity is a direct cause of childhood morbidities, including gastrointestinal, musculoskeletal and orthopaedic complications, sleep apnoea, and early onset of cardiovascular disease and type-2 diabetes. In addition, potential psychological consequences include behavioural and emotional difficulties, stigmatisation, poor socialisation and decreased educational attainment.

Childhood obesity also strongly predicts adult obesity, which is associated with a range of chronic diseases.³⁴ Therefore, efforts to prevent childhood obesity are essential for improvements in short and long-term health.

Adult obesity and chronic disease

On its own, overweight and obesity is responsible for 7% of the total burden of disease and injuries in Australia, rising to 9% when combined with physical inactivity.³⁵

Adult obesity increases risk of many chronic conditions, including: cardiovascular disease, stroke, certain cancers, asthma, back pain, chronic kidney disease, dementia, diabetes, gallbladder disease, gout, and osteoarthritis.³⁶ Further, obesity is estimated to result in 1.75 million premature deaths from 2011 to 2050, if trends continue.³⁷

Of the disease burden attributable to overweight and obesity in 2011, 38% was from cardiovascular diseases (heart disease and stroke), 19% from cancers (breast, bowel, oesophageal, liver, kidney, pancreatic, uterine, leukaemia, gallbladder, ovarian, and thyroid), 17% from diabetes, and 5% from chronic kidney disease, among other diseases.³⁸

The recent *Australia's Health 2018* reported that disease burden could be dramatically reduced if everyone in Australia was a healthy weight. This could reduce diabetes by 53%, chronic kidney disease by 38%, oesophageal cancer by 38%, coronary heart disease by 25%, stroke by 22% and breast cancer by 22%, among other reductions.³⁹

Obesity and kidney disease

Obesity is an established risk factor for chronic kidney disease. Around 1.7 million Australian adults have at least one clinical sign of chronic kidney disease⁴⁰ and one in three Australians are at increased risk of developing chronic kidney disease.⁴¹ Yet one-third of chronic kidney disease cases in Australia could be related to excess weight.⁴² Obesity doubles risk of developing chronic kidney

disease compared to people with a healthy body weight, while being overweight increases risk 1.5 times. The risk of developing chronic kidney disease is higher for obese women than for obese men.

In obese individuals, the kidneys have to work harder, filtering more blood than normal to meet the metabolic demands of increased body weight. The increase in function can damage the kidneys and heightens the risk of developing chronic kidney disease in the long-term. Being overweight is associated with an increased risk of kidney stones,⁴³ and an estimated 17% and 26% of all kidney cancers in men and women.⁴⁴

Obesity also indirectly impacts on chronic kidney disease via the mediating effect on increasing the risk of developing diabetes and high blood pressure,⁴⁵ which are the two most common causes of end-stage kidney disease in Australia.⁴⁶

Obesity and stroke

Obesity is a risk factor for stroke. In 2017, Australians suffered more than 56,000 strokes – one stroke every 9 minutes.⁴⁷ There are more than 475,000 stroke survivors living in the Australian community, and this is predicted to increase to one million people by 2050.

However, more than 80% of strokes can be prevented.¹² In 2011, 22% of the stroke burden in Australia was attributable to overweight and obesity.⁴⁸ A 2010 meta-analysis of more than 2.2 million people found that overweight and obesity were significantly associated with progressively increasing risk of stroke.⁴⁹ Each unit increase in Body Mass Index (BMI) is associated with a significant 6% increase in the adjusted relative risk of stroke.⁵⁰ The association between BMI and risk of ischaemic stroke is linear,⁵¹ similar in men and women and independent of race.⁵²

While there is a lack of evidence in Australia, increasing rates of young stroke have been observed internationally. The Global Burden of Disease Stroke Experts Group noted a 25% increase in stroke incidence in people aged 20–64 years between 1990 and 2010.⁵³ The increasing rates of stroke in younger people worldwide are thought to be due, at least in part, to an increase in modifiable risk factors such as obesity. The US ‘Stroke Prevention in Young Adults’ study of people aged 15-49 years found that obese men were 73% more likely to have a stroke than their normal weight counterparts, with obese women facing a 46% added risk compared to those of average weight.⁵⁴

This suggests that younger people may be experiencing an increased risk of stroke as a result of increasing levels of obesity and accompanying co-morbidities, highlighting the need to recognise obesity as a risk factor for stroke in younger adults.

Obesity and cancer

Collectively, the independent risk factors of overweight and obesity, physical inactivity, and poor diet are second only to tobacco as modifiable risk factors for cancer.^{55,56}

A 2015 study commissioned by the Cancer Council found that 3,917 cancer cases in 2010 were attributable to overweight/obesity.⁵⁷ Another analysis in 2017 found nearly 2,000 cancer deaths were attributable to overweight/obesity in 2013.⁵⁸

An estimated 3.4% of all cancers diagnosed in 2010 were attributable to overweight/obesity,⁵⁹ 1.6% (1,814 cases) to insufficient physical activity,⁶⁰ 4.0% (4,475 cases) to inadequate intake of fruit, non-starchy vegetables and dietary fibre,⁶¹ and 2.3% (2,614 cases) to consumption of red and processed meat.⁶² Tumour-specific examples of a spike in cancer that appears associated with the rise in obesity include kidney cancer, rates of which have doubled in 35 years, and uterine cancer, which has increased by around 50% over the same period.⁶³ This includes earlier onset and a doubling of kidney cancer rates in early middle age (45+), a risk for an increasing number of overweight younger Australians.

Obesity and diabetes

The links between overweight and obesity and diabetes are well established. One meta-analysis found that obese men have a sevenfold higher risk of developing type 2 diabetes and obese women have 12-fold higher risk compared with people in a health weight range.⁶⁴ Additionally, evidence shows the condition can be prevented through lifestyle interventions that help people lose weight in 58% of cases.⁶⁵

There are currently more than 1.1 million people with type 2 diabetes registered with the National Diabetes Services Scheme.⁶⁶ This has climbed from just over 430,000 in 2001.⁶⁷ There may also be as many as 500,000 Australians living with silent, undiagnosed type 2 diabetes. Historically, the condition has been diagnosed in people over 50 years of age, however the rates of younger adults, adolescents and children diagnosed with the condition are increasing rapidly. A major contributor to this increase in prevalence has been the increasing number of Australians who are overweight or obese.

Diabetes has a major impact on the Australian economy, costing around \$14.6 billion per annum.⁶⁸ This is forecast to rise to \$30 billion by 2025 unless we reduce the number of people developing type 2 diabetes.

Diabetes-related complications, including blindness, limb amputation, kidney failure and heart disease, are major contributors to the burden of disease in Australia. Diabetes is the leading cause of preventable blindness in Australia;⁶⁹ a contributor to more than 4,400 amputations every year;⁷⁰ a major cause of end stage kidney disease⁷¹ and a leading contributor to heart disease.⁷²

Obesity and cardiovascular disease

Overweight and obesity is a major modifiable risk factor for cardiovascular disease (CVD). It is an independent risk factor and negatively impacts on other CVD risk factors, increasing the likelihood of an individual having high blood pressure, high cholesterol, and diabetes.

In 2011, 7% of the total burden of disease in Australia was due to overweight and obesity with 63% of this due to fatal burden.⁷³ About 38% of the burden attributable to overweight and obesity was from CVD. Within this disease group, coronary heart disease accounted for 27% of disease burden, and stroke accounted for 10%.

Prevalence of heart stroke and vascular disease (i.e. angina, heart attack, other ischaemic heart disease, stroke, other cerebrovascular diseases, oedema, heart failure, and diseases of the arteries, arterioles and capillaries) in 2014-15 was 10% in obese adults and 6.6% in those overweight but not obese, compared to 4.3% of those in the normal weight range. Prevalence of hypertension in 2014-15 was 24.5% among obese adults and 14.8% among overweight adults.

In 2015-16, there were over 1.1 million hospitalisations for CVD, accounting for 11% of all hospitalisations. Small decreases in weight in the Australian population would have significant positive impacts on CVD prevalence and health system costs.⁷⁴

Together, cardiovascular disease and type 2 diabetes accounted for about \$16 billion of health service expenditure in Australia in 2011-12, with this amount expected to increase to \$58 billion by 2031-32 (equivalent to 14% of health expenditure).⁷⁵ Around one-fifth of CVD expenditure (\$2.7 billion) in 2011-12 was estimated to be attributable to high BMI. From 2011-12 to 2031-32, the total extra expenditure for CVD and type 2 diabetes due to excess weight is estimated to be \$187 billion.

d. The short and long-term economic burden of obesity, particularly related to obesity in children in Australia;

Obesity imposes massive health, economic and social costs.

In 2011-12, obesity cost the Australian economy an estimated \$8.6 billion (in 2014–15 dollars).⁷⁶ Direct healthcare costs, including hospital care, pharmaceuticals, health services, and weight loss interventions, accounted for \$3.8 billion, with the remaining \$4.8 billion attributed to indirect costs including foregone tax, absenteeism, and government subsidies. Further costs would arise from reduced wellbeing and foregone earnings. If no action is taken to slow the growth in obesity, it is estimated to cost a further \$87.7 billion in additional costs from 2015-16 to 2024–25.

The Grattan Institute estimates that obesity costs around \$5.3 billion per year, based on foregone tax, and health and welfare expenses.⁷⁷ Obesity contributes to greater welfare and healthcare costs, through higher hospitalisations and primary care visits, while decreasing income tax due to lower rates of employment among people who are obese.

Other broader estimates put the total costs associated with overweight and obesity at over \$56 billion each year⁷⁸ and up to \$120 billion per year (equivalent to around 8% of the economy's annual output), using a measure of wellbeing that encompasses more than economic costs.⁷⁹

Health expenditure

As prevalence of obesity increases, healthcare expenditure increases. Healthcare expenditure in Australia has been demonstrated to increase with BMI.⁸⁰ For adults with a BMI between 30 and 35 and those with a BMI higher than 35, annual health spending is 19% and 50% higher respectively than for individuals with normal weight.

In 2014-15, more than 124,600 procedures relating to weight-loss surgery were billed to Medicare across public and private hospitals and non-hospital settings.⁸¹ Across all settings, these Medicare-billed procedures cost around \$62.8 million, including \$25.7 million in benefits paid by Medicare as well as around \$37.1 million in out-of-pocket costs borne by patients or insurers. In public hospitals, the 10 most common weight loss surgery procedures cost an estimated \$30.4 million. Hospitals also require specialised and costly equipment to care for and transport patients who are obese.⁸²

The most expensive medications to government on the Pharmaceutical Benefits Scheme include Atorvastatin, Rosuvastatin, Esomeprazole, Pantoprazole and Perindopril, which are used for treating conditions related to poor nutrition, high body mass and digestive conditions. These medicines, for predominantly preventable conditions, cost the Australian taxpayer \$378 million in 2016-17.⁸³

There are increased healthcare costs associated with obesity from childhood. Australian research indicates that children aged 2-5 years who are obese incur healthcare costs that are 60% greater than the costs of children of normal weight.⁸⁴ Obesity is also a major risk factor for many chronic conditions, which account for more than one-third of potentially preventable hospitalisations and nearly one in three problems managed in primary care.⁸⁵

e. The effectiveness of existing policies and programs introduced by Australian governments to improve diets and prevent childhood obesity;

The 2017 report *Policies for tackling obesity and creating healthier food environments* assessed Federal and State/Territory government policies to address unhealthy diets and obesity.⁸⁶ The report assessed how jurisdictions are implementing globally recommended policies and identified priority actions for each government.

The report highlighted that the Federal Government is meeting best practice in the implementation of some policies to improve the food environment, such as aspects of food labelling, regulating health claims, food prices (with no GST on fresh foods), and regular monitoring of population body weight. The report also flagged priority areas for Federal Government action including: developing a national nutrition strategy and implementation plan, taxes to increase the price of unhealthy foods including sugary drinks, and regulations to reduce marketing of unhealthy foods to children.

The report found that State and Territory governments varied in the implementation of internationally recognised policies. Some policies were meeting global best practice, including menu labelling regulations across a number of jurisdictions; statutory health promotion agencies in Victoria and

Western Australia; mechanisms to incorporate health in all policies in South Australia; and systems to assist schools in providing healthy foods in Victoria.

At the national level, there are two large-scale policies to improve diets – the Health Star Rating system and the Healthy Food Partnership – as well as the *Girls Make Your Move* campaign to increase physical activity amongst younger females.

Food labelling – Health Star Rating system

Interpretive front-of-pack labelling complements mandatory nutrition labels and provides information that is easy to interpret at a glance.⁸⁷ Interpretive food labels can improve awareness and understanding of nutrition information and encourage healthier food choices.^{88,89} Small individual dietary changes due to nutrition labelling have the potential to result in meaningful change on a population level.⁹⁰

The Australian and New Zealand Health Star Rating system aims to improve consumer awareness and understanding of nutrition information and encourage healthier food choices. Since its inception, the Health Star Rating system has made positive progress and it is displayed on an increasing number of products. Evaluations indicating growing consumer awareness, influence on purchasing decisions and confidence in the system.⁹¹

However, there are some concerns. A recent analysis found that 17% of products' star ratings do not align appropriately with the Australian Dietary Guidelines.⁹² While the majority of products receive appropriate ratings, the misalignment of some discretionary products has generated media and some consumer concerns about the system.

Further, the Health Star Rating system is being voluntarily implemented by industry. Uptake is variable across product ranges and by manufacturers. At the 2-year progress review, only 14% of products in the nominated database of eligible foods were displaying the ratings.⁹³ And some manufacturers are inconsistent in the application of ratings to foods, choosing only to add ratings to their highest-scoring products. Making the system mandatory would remove these inconsistencies and enable consumers to make meaningful product comparisons.

Dietary choices are influenced by a range of factors and a food-systems response can have a powerful impact as products are reformulated by manufacturers.⁹⁴ Many international labelling schemes have led to product reformulation as they become widespread or mandatory, including labelling programs in the Netherlands, South Korea, Canada, USA, and New Zealand.

The 2017 Health Star Rating progress review noted examples of 'changing product formulations in order to obtain a higher star rating. Reformulation actions include reducing sodium, sugars and saturated fat and, in some cases, increasing the content of ingredients with nutritional benefits such as fibre.'⁹⁵

Recommendation

ACDPA recommends that the Health Star Rating system be: amended to improve alignment with the Australian Dietary Guidelines, mandated at the 5-year review to facilitate meaningful product comparisons, and promoted through education campaigns and in-store advertising to enhance consumer awareness and encourage uptake.

Reformulation – Healthy Food Partnership

Food reformulation to reduce risk nutrients in products has been shown to be a cost-effective and cost-saving preventive health measure in the Australian context.⁹⁶ The World Health Organization also supports the reformulation of foods as a ‘best buy’ to reduce unhealthy diets and their impact on chronic disease.⁹⁷

The Healthy Food Partnership was established by the Australian Government to work with industry and public health to encourage reformulation by manufacturers, as well as generate improvements to nutrition by food services and changes to portion sizes.

Evaluations of earlier work by the initiative (formerly the Food and Health Dialogue) indicate that the voluntary reformulation targets were partially achieved in some food categories – for example, almost 90% of breads were meeting the salt reformulation target by August 2015.⁹⁸ However, there was wide variation between products, and some food categories had a much smaller proportion of products meeting the targets, such as simmer sauces with only 45% meeting the target by June 2015.

The Healthy Food Partnership Reformulation Working Group is in the process of establishing targets for the Australian context. It is important to ensure that targets build on existing work and progress is monitored, with manufacturers held accountable for meeting targets and timeframes.

Recommendation

ACDPA recommends that new targets and timeframes for food reformulation be set by the Healthy Food Partnership with co-regulation from government to encourage timely and meaningful reformulation to enhance the healthiness of products.

Social marketing campaigns - Girls Make Your Move

Mass media can be effective in increasing awareness and setting a community agenda around physical activity.⁹⁹ It has the potential to inform, remind, motivate and support health-related changes, when based on sound theory and research and combined with community activities.

The *Girls Make Your Move* campaign is designed to encourage girls to be active and enjoy the health benefits of physical activity. Evaluation found that the campaign has encouraged young women to be more active and positive about sport and physical activity.¹⁰⁰ Similarly, the VicHealth campaign *This*

Girl Can is designed to empower girls and women to be active and is based on the UK campaign of the same name.

Recommendation

ACDPA recommends sustained, funded and well-researched mass media campaigns to increase physical activity and improve nutrition.

f. Evidence-based measures and interventions to prevent and reverse childhood obesity, including experiences from overseas jurisdictions;

In 2017, the Obesity Policy Coalition and the Global Obesity Centre (GLOBE) published *Tipping the Scales – Australian obesity prevention consensus*.¹⁰¹ The report provides a set of evidence-based policies to address the obesity epidemic in Australia, based on national and international evidence and developed in consultation with an expert advisory group, including ACDPA. The consensus statement and its recommendations were further endorsed by more than 30 community, public health, medical and academic groups.

A comprehensive national obesity prevention strategy, including funding, implementation plan, responsibilities, timeframes, monitoring and accountability, is a priority to address the prevalence of adult and childhood obesity in Australia. This would encompass policies to improve the food environment and enhance nutrition, as well as policies to improve the physical environment and encourage people to be more active.

ACDPA endorses the policies identified in *Tipping the Scales* to improve diets and reduce obesity in the Australian context:

1. Legislation to implement time-based restrictions on exposure of children (under 16 years of age) to unhealthy food and drink marketing on free-to-air television up until 9:30pm.
2. Setting clear reformulation targets for food manufacturers, retailers and caterers with established time periods and regulation to assist compliance if not met.
3. Make adjustments to improve the Health Star Rating System and make mandatory by July 2019.
4. Developing and funding a comprehensive national active travel strategy to promote walking, cycling and use of public transport.
5. Funding high-impact, sustained public education campaigns to improve attitudes and behaviours around diet, physical activity and sedentary behaviour.
6. Placing a health levy on sugary drinks to increase the price by 20%.
7. Establishing obesity prevention as a national priority with a national taskforce, sustained funding, regular and ongoing monitoring and evaluation of key measures and regular reporting around targets.

8. Developing, supporting, updating and monitoring comprehensive and consistent diet, physical activity and weight management national guidelines.

The report details the evidence base and national and international precedents in support of these recommendations.

The food system is an interconnected network of producers, industry, institutions and individuals. Government policies can support healthy food preferences, and encourage food system and individual changes.¹⁰² The UK childhood obesity plan aims to halve childhood obesity by 2030 and contains a range of actions: sugar reduction including the Soft Drinks Industry Levy, calorie labelling and reduction programs, updating marketing restrictions to children, and working with local areas and schools.¹⁰³ The Soft Drinks Levy, for example, has already reduced the sugar content of soft drinks, with most manufacturers reformulating soft drinks to lower the sugar content before the Levy came into effect in 2018.

Recommendation

ACDPA recommends that a national obesity strategy be prioritised to reduce the impact of childhood and adult obesity in Australia, including other initiatives recommended in the *Tipping the Scales* consensus report to improve food and physical environments.

g. The role of the food industry in contributing to poor diets and childhood obesity in Australia; and

The food industry has a clear imperative to increase consumption of its products, however food producers should also consider the health of individuals and population.

Marketing unhealthy foods to children

The World Health Organization reports that there is “unequivocal evidence that the marketing of unhealthy foods and sugar-sweetened beverages is linked to childhood obesity” and recommends reducing the exposure and influence of marketing of unhealthy foods as part of a comprehensive, integrated approach to address childhood obesity.¹⁰⁴

Marketing across all types of media consistently influences children's food preferences, choices and consumption,¹⁰⁵ and is likely to contribute to poor diet, weight gain, obesity and negative health outcomes.^{106,107} Food products high in sugar, fat and salt are promoted more than healthier foods, and persuasive marketing techniques are used to create brand loyalty and lasting consumer relationships.¹⁰⁸

Exposure to food advertising is shown to increase children's food intake.¹⁰⁹ Children are particularly vulnerable because they lack the cognitive ability to recognise the persuasive intent of advertising and cannot critically evaluate advertising content.¹¹⁰ Children are targeted by marketers due to: their purchasing habits (with pocket money often spent on discretionary foods), their influence over family

purchases, and the potential for establishing brand loyalty that continues into adulthood.^{111,112}

Parents and caregivers are also increasingly targeted by marketing of unhealthy foods intended for their children.¹¹³

Australian children are exposed to vast amounts of unhealthy food marketing across a range of media platforms, including television, digital media (websites, social media, email, text messages, apps, branded games),¹¹⁴ print, radio, cinema, outdoor media, direct marketing, product packaging, sports sponsorship, point of sale promotions, and embedded marketing. Food companies spend large amounts on food and drink advertising, with an estimated \$402 million spent on food advertising in Australia in 2009 and a further \$149 million spent on non-alcoholic drink advertising.¹¹⁵ In a single year, Australian children would be likely to watch 800 junk food advertisements on free-to-air television, if they watched 80 minutes of television per day.¹¹⁶

The food industry recognises that children are increasingly competent and frequent users of digital media.¹¹⁷ However, industry self-regulation of digital marketing is limited, with apps excluded from current voluntary industry initiatives.¹¹⁸ Digital marketing may have a particularly large impact on children, due to interaction with food and beverage brands, online peer endorsement and content sharing, and opportunities for product purchases.¹¹⁹ Online marketing can also be difficult for children to identify or recognise as advertising, due to the lack of explicit advertising cues and embedded content.¹²⁰

A 2016 World Health Organization Europe report on digital food marketing to children recommends independent, comprehensive regulation of digital marketing across social media, websites, games and apps, with the flexibility to incorporate new and evolving mediums.¹²¹ The recommendations are based on children's "right to participate in digital media" and "right to protection of their health and privacy and not to be economically exploited".

Existing industry self-regulation is insufficient

Two Australian Food and Grocery Council self-regulatory initiatives are intended to reduce the advertising of unhealthy foods and beverages - the Responsible Children's Marketing Initiative (RCMI) and Quick Service Restaurant Initiative for Responsible Advertising and Marketing to Children (QSRI). While both codes have been expanded beyond traditional media to include internet sites, exclusions apply to advertising via apps, product packaging and labelling, word-of-mouth and point-of-sale material.¹²² The industry self-regulatory codes have significant limitations (including loopholes), compliance is not monitored and there are no meaningful sanctions for breaches.

A 2011 Australian Communications and Media Authority monitoring report identified ongoing community concerns and concluded that there was insufficient evidence that self-regulatory industry codes had any effect on food marketing to children.¹²³ Although many of the largest food and beverage companies are signatories to the voluntary codes, self-regulation has failed to reduce children's exposure to unhealthy food marketing by both signatories and non-signatories to the codes.¹²⁴

Restricting marketing of unhealthy food to children is modelled to be one of the most cost-effective and feasible obesity-prevention interventions, saving an estimated \$38 for every \$1 invested.¹²⁵ Restricting television advertising appears to be extremely cost-effective in reducing unhealthy weight gain in children. The intervention was estimated to save \$300 million in future health sector costs, with a minimal cost of \$3.70 per disability-adjusted life year (DALY) saved.¹²⁶ While the effects may be small on an individual level, there can be a large impact at the population-level due to the number of children affected and low cost of the intervention.

Australia is significantly lagging behind global best practice in implementing marketing restrictions on the advertising of unhealthy foods to children, and this has been identified as a priority area for action.^{127,128}

Recommendation

ACDPA recommends that the Australian Government protect children by restricting the marketing of unhealthy food and beverages (i.e. energy-dense, nutrient-poor food and beverages). This includes:

- **Legislating to implement time-based restrictions on unhealthy food marketing on free-to-air television when the greatest number of children are likely to be watching, independent of whether the programs are designated as children's programs.**
- **Drawing on existing legislation, regulation and regulatory agencies to restrict unhealthy food marketing to children in all other media, including digital media (websites, social media, email, text messages, apps, branded games), print, radio, cinema, outdoor media, direct marketing, product packaging, sports sponsorship, point of sale promotions, and embedded marketing, which is directed at children or to which a high number of children are likely to be exposed.**
- **Developing independent and consistent nutrient criteria to determine which foods are classified as unhealthy.**
- **Establishing independent, clear and transparent monitoring and enforcement processes with meaningful penalties to deter companies from breaching regulations.**

Sponsorship and endorsement

ACDPA is also concerned about the prevalence of unhealthy food, beverage and alcohol sponsorship of Australian sport at the national and State/Territory levels, and its impact on children.¹²⁹ Children are exposed to vast amounts of unhealthy food, beverage and alcohol marketing through elite and community sports sponsorship. Brand advertising is not covered by industry self-regulation; therefore much sponsorship of children's sport is not considered as marketing to children. The 2011 House of Representatives Standing Committee report *Reclaiming Public Space* recommended that industry self-regulatory initiatives should include sports sponsorship as a form of advertising.¹³⁰

Research indicates that children can match sports with food sponsors¹³¹ and recall sponsors of their favourite elite sports.¹³² Many elite athletes believe they should not promote unhealthy foods, but are concerned that sponsorship restrictions could impact funding.¹³³ In children's sports development programs, around 90% of food and beverage sponsors are classified as unhealthy (e.g. McDonald's, Schweppes, and Milo).¹³⁴ While food and beverage companies contribute a relatively small proportion of total junior sports club funding (less than a quarter of overall income), food company support or sponsorship can encourage brand loyalty towards products from a young age.¹³⁵ Evidence shows that food marketing to children generates positive beliefs about the advertised products, and influences food preferences, purchasing requests and consumption, as well as dietary habits and health statuses.^{136,137,138}

Regulatory guidelines should be established to protect children by limiting sports sponsorship by companies promoting unhealthy food, beverage and alcohol products.¹³⁹ A sports sponsorship replacement fund could be established through government or industry contributions to provide monetary incentives for sporting organisations to establish relationships and transition to other sponsors.¹⁴⁰

The Western Australian Government program Healthway provides an example of good practice. Established to fund health-promoting activities, especially for young people, Healthway provides sponsorship support for sport and active recreation programs and events where there is a significant opportunity to increase the participation of priority population groups and change behaviours and environments to improve health.¹⁴¹

h. any other related matters.

Fiscal policies to fund prevention of obesity and chronic disease

In recognition of limited budgets, there are opportunities for government to generate revenue and improve health through changes to the taxation of unhealthy products, including a health levy on sugar-sweetened beverages and volumetric taxation of all alcoholic beverages.

Price influences purchasing decisions. Currently, basic foods such as fresh fruit and vegetables are not subject to the GST, and it is important that this exemption is maintained. Additionally, a recent Australian study has examined the cost-effectiveness of combining taxes on unhealthy foods and subsidies on healthy foods.¹⁴² The combination of the taxes and subsidies could avoid as many as 470,000 disability-adjusted life years in the Australian population, at a net cost-saving of \$3.4 billion to the health sector. The largest gains in health were achieved by a sugar tax. A fruit and vegetable subsidy has also been considered to be cost-effective when added to a package of taxes.¹⁴³

A health levy on sugar-sweetened beverages is supported by the public¹⁴⁴ and estimated to generate revenue of \$400-\$500 million each year while reducing consumption by 12-15%.^{145,146} There is strong public support (84%) for revenue from a health levy on sugar-sweetened beverages being used to fund initiatives encouraging children's sport.¹⁴⁷

Introducing a volumetric tax (i.e. based on alcohol volume) across all alcoholic beverages at the existing rate for spirits could reduce alcohol consumption by 24% and increase taxation revenue by more than \$3 billion.¹⁴⁸ Alternatively, replacing the existing Wine Equalization Tax with a volumetric tax on wine could increase revenue by \$1.3 billion per year and reduce alcohol consumption by 1.3%.¹⁴⁹ Around 45% of Australians support increasing alcohol taxation to pay for health, education, and the cost of treating alcohol related programs.¹⁵⁰ The World Health Organization recommends increased alcohol taxation as a “best buy”, meaning it is a cost-effective and feasible intervention,¹⁵¹ and adjustments to alcohol taxation in Australia are modelled to be highly cost-effective and even cost-saving.¹⁵²

Added sugars

There is strong public interest and concern regarding the consumption of sugars, particularly free sugars.

In its 2015 guideline on sugars intake for adults and children, the World Health Organization defines free sugars (commonly referred to as added sugars) as “sugars added to foods and beverages by the manufacturer, cook or consumer, and sugars naturally present in honey, syrups, fruit juices and fruit juice concentrate.”¹⁵³ The guideline strongly recommends reducing free sugar intake to less than 10% of total energy intake, or 5% for the greatest health benefits. This is based on increasing evidence that high intake of free sugars is associated with weight gain due to excess energy intake, and dental caries.

In 2011-12, more than half of Australians usually exceeded the recommendation to limit free sugar intake to 10%.¹⁵⁴ There was wide variation in the amounts of free sugars consumed, with older children and teenagers most likely to exceed the recommendation. On average, Australians consumed around 60 grams of free sugars each day (around 14 teaspoons).

A levy on sugary drinks is one approach proposed to reduce the overconsumption of free sugars and subsequent effects on unhealthy weight gain. The identification of added sugars on product labels has also been proposed for consumers to understand when sugars have been added to products.

Comprehensive approach

It is essential to recognise that no single solution is sufficient to reverse obesity and reduce its impact on chronic disease in Australia.

A sustained and multifaceted approach is required to improve dietary intake and reduce overweight and obesity amongst children. Multi-component interventions (e.g. combining food labelling, fiscal policies, promotion, reformulation, trade) are more effective than single interventions in improving diet.¹⁵⁵ The Australian Chronic Disease Prevention Alliance supports a comprehensive approach to improve dietary intake and encourage physical activity at the population level, including through

standardised food and menu labelling, fiscal policies, marketing restrictions, reformulation and education campaigns.

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