

ACT Population Health Bulletin

Volume 4 Issue 3 August 2015

Contents	
Breaking News: Women Want to Know	2
Breaking News: Art In, Butt Out	2
Breaking News: Health Promotion Innovation Fund	3
Healthy eating initiatives in New York City, 2001-13	4
Promoting healthy food environments	8
Nutrition in the ACT - what the Australian Health Survey tells us	11
Marketing of unhealthy food and beverages to children in the ACT	13
Healthy food and drink choices at ACT Health	15
Are healthy diets in the ACT really more expensive than current unhealthy diets?	18
Promoting healthy eating to disadvantaged populations	20
Case Study: Healthy Futures: gardens, healthy eating and getting active	21
SKIP – Improving the health and wellbeing of children with overweight or obesity	23
Nutrition Support Service	24
The Health Star Rating - why Australia needs a new front of pack labelling system	26
Case Study: Front of pack labelling in other countries	28
The balancing act: Addressing acute food safety risks vs the risks of chronic poor nutrition	29
Fresh Tastes: healthy food at school	31
Case Study: ACT schools' experience implementing National Healthy School Canteen Guidelines	33
Good Habits for Life	36
Section Highlight: Public Health Nutrition	38
Notifiable Disease Report	39
Hot Issue: Electronic cigarettes, Medical Cannabis	41

<u>Upcoming Events</u>

- 24 August -18 September 2015 Fruit and Veg Month http://healthykids.com.au/teachers/fruit-veg-month/
- 11-17 October 2015 National Nutrition Week http://www.nutritionaustralia.org/
- 19 October 2015 Applications close for the Health Promotion Innovation Fund http://www.health.act.gov.au/healthy-living/health-promotion-grants-program.
- 2 6 November 2015 Ride Safe to School Week www.paf.org.au

©Australian Capital Territory, Canberra. August 2015

Produced by ACT Health, Population Health Division

Editorial committee: Dr Paul Kelly (Editor), Adam Duffy, Ros Garrity, Emily Harper, Dr Vanessa Johnston, Miranda O'Brien, Bridget O'Connor,

Lesley Paton, Brett Purdue, Rebecca Stones

Please address any correspondence to:

The Editor, ACT Population Health Bulletin

Population Health Division

GPO Box 825, Canberra City. ACT 2601

populationhealthbulletin@act.gov.au

www.health.act.gov.au

Any views or opinions expressed by contributors are their own and do not necessarily represent the views or policies of ACT Health.

Introduction

A message from the Chief Health Officer, Dr Paul Kelly

In this Issue of the Bulletin, the focus is on the importance of good nutrition for population health. Of course, food is essential for life and it has been known throughout the course of history that an adequate and varied diet made up of food which is free of toxins and microbes is important for human health. Food is also an important component of cultural expression and food distribution, preparation and consumption is an increasingly important component of the global and local economy.

However, not all foods are health promoting. We know that imbalances in food intake, in particular diets high in fat, sugar and salt and low in essential vitamins, minerals and fibre are strongly associated with obesity, diabetes, cardio-vascular disease and some cancers. These conditions can result in lowered quality of life and shorter life expectancy. With regards to obesity, the concept of "energy balance", that is ensuring that energy in = energy out, is important because kilojoules consumed in excess of those expended mean that weight is gained. Sustained but even small adjustments to food intake by individuals, particularly when combined with increased physical activity, can lead to large changes in the health profile of the community. This in turn leads to major savings in health care costs for the community as well as improved quality of life for individuals and enhanced productivity for business.

So, who should be responsible for dealing with this relatively new but pervasive issue of excessive consumption of particularly nutrient poor, energy rich food? An important source of information stems from New York City, where strong and sustained government leadership has led to measurable improvements in the food environment. This is starting to translate to changes in community food consumption and some health measures such as the childhood obesity rate.

What do we know about the diets of ACT residents compared with those consumed in the rest of Australia? Is a healthy diet actually more expensive than an unhealthy one in the ACT? What is currently happening in schools, ACT Government workplaces and the wider community? How are partnerships between government, non-government organisations and private businesses working to promote a healthier food environment in the ACT? All this and more is covered in this Issue.

Thanks to our Senior Public Health Nutritionist and guest editor for this Issue, Lesley Paton, and to all the contributors for their wide ranging coverage of this topic. Food for thought indeed.

Dr Paul Kelly ACT Chief Health Officer August 2015

Breaking News

Launch of 'Women Want to Know' project

The ACT Minister for Health, Simon Corbell, MLA launched the 'Women Want to Know' campaign at a function on 12 August 2015.



Photograph: Women Want to Know launch 2015. ACT Health file photo

The campaign encourages health professionals to start the conversation about alcohol consumption with women who are pregnant or planning a pregnancy. The Foundation for Alcohol Research and Education (FARE) will deliver the project with assistance from ACT Health's Health Promotion Innovation Fund. FARE is an independent, not for profit organisation committed to work in our community to reduce the harm caused by alcohol. Alcohol use during pregnancy can lead to babies being born with Foetal Alcohol Spectrum Disorders (FASD), which are preventable and potentially devastating developmental disabilities.

In launching the project, Minister Corbell noted that research shows that although 97 percent of women would like to talk to their doctor or midwife about alcohol, many health professionals are unsure how to broach the subject. The campaign, which includes a range of resources and online learning for health professionals, will help to get the conversation started and routinely provide women with advice consistent with national safe drinking guidelines.

"Children with FASD can experience behavioural problems, impaired growth and learning difficulties, to name just a few negative consequences and highlights just how important this initiative is," Mr Corbell said.

The ACT launch coincides with a national campaign developed by FARE to address this issue. This campaign also complements a 2014 campaign by FARE 'Swap the Pub for your Bub' which aimed to raise awareness about alcohol use in pregnancy directly with expectant mothers and their partners.



Photograph: Women Want to Know launch 2015. ACT Health

Year 8 students design anti-smoking campaign for Art in, Butt Out

On 19 August 2015 the ACT Minister for Health, Simon Corbell, MLA announced the winner of the 2015 Art In, Butt Out competition. The annual competition is an initiative of the Australian Medical Association (AMA) ACT Tobacco Task Force, which provides year 8 students with the opportunity to design an anti-smoking advertisement. The winning entry will appear on approximately 60,000 Canberra Milk cartons distributed across the ACT for a six week period commencing in September this year.

The event was attended by finalists from across the ACT, including the 2015 winner, Jack Witchalls, a student of Canberra High School. The Minister congratulated the students who took part, and commended the AMA and Canberra Milk for their ongoing commitment to the competition. The Minister emphasised the critical role that educating young people about the dangers of smoking has played in reducing the smoking rate among secondary school students from its 1996 level of around 20 percent, to under 6 percent in 2011.



Photograph: Art In, Butt Out Awards Ceremony 2015. ACT Health

The majority of smokers take up the habit during their teenage years. Art In, Butt Out uses the effectiveness of peer-to-peer messaging to raise awareness among young people of the harms associated with tobacco use. The competition gives students the chance to use their design and marketing skills in a real situation and have their public health message seen by a wide audience. Participation in Art In, Butt Out encourages young people to think about their own health and wellbeing, as well as how they can support their friends and family members to make healthy choices more broadly.

Tobacco control was the subject of Population Health Bulletin - Volume 3, Issue 4, a copy of which is available on the ACT Health website at www.health.act.gov.au/healthy-living/population-health.

Breaking News

Acronyms and Resources

Launch of Health Promotion Innovation Fund 2015 grant outcomes.

On 20 August 2015, ACT Minister for Health, Simon Corbell, MLA announced the successful recipients of the most recent Health Promotion Innovation Fund grants round, at a function at Lyons Early Childhood Centre. Since February 2015, thirteen grants to the total value of \$134,536 have been awarded to community groups and schools for projects to enhance the health of the ACT community.

The Minister noted that these grants are an opportunity for schools and community not-for-profit organisations to trial innovative projects to improve health outcomes for the ACT community. The successful applicants are:

- Foundation for Alcohol Research and Education Ltd -Women Want To Know (\$10,875)
- YWCA Canberra Food Time (\$8,624)
- Lyneham Primary School-Lyneham Pre-School Unit Healthy Lunchbox - Increasing fresh food in Lyneham Pre-School lunches (\$9,800)
- Anglicare NSW South, NSW West & ACT Franklin Early Childhood School Healthy Eating & Exercise Project (\$8,175)
- Lyons Early Childhood School Healthy Lifestyles at Lyons
- Canberra Two Day Walk Inc Canberra Walking Festival (\$10,650)
- Greening Australia Fitness, feathers, flowers & fur: Embracing the Bush Capital experience to a healthier lifestyle (\$8,500)
- Belconnen Community Service Cooking and Moving New Ways to Health and Happiness (\$15,000)
- Canberra Dance Theatre Great Sport! (\$13,280)
- CCCares @ Canberra College Better Health (\$13,632)
- Multiple Sclerosis Limited Be Better Balanced (\$15,000)
- Richardson Primary School Real Fit in Richardson (\$5,000)
- Triathlon ACT Incorporated Australian Schools Triathlon Challenge (\$7,000)

When launching these grants Minister Corbell also noted that almost two thirds of Canberra adults and approximately one in four children are overweight or obese. He stressed that unless we start taking action to reverse these concerning rates, there will be longterm health effects for Canberra's next generation. The projects highlight the way the ACT community is embracing the promotion of healthy lifestyles within schools and other environments.

The next round for the Health Promotion Innovation Fund is open until 19 October 2015. Information can be found at http://www. health.act.gov.au/healthy-living/health-promotion-grants-program.

Acronyms **ABA** American Beverage Association **ABS** Australian Bureau of Statistics ACTGHS ACT General Health Survey **ACTNSS** ACT Nutrition Support Service Australian Dietary Guidelines Australian Health Survey **ADG** AHS **AMA** Australian Medical Association CAN Change Attitudes Now

COPI-CANY Comparing Obesity Prevention Initiatives -

Canberra and New York

CURF Confidential unit record files **DET** Department of Education and Training DOH&MH

Department of Health and Mental Hygiene **EAR**

Estimated Average Requirement Foundation for Alcohol Research and Education **FARE**

FASD Foetal Alcohol Spectrum Disorders **FEIG** Food Environment Implementation Group

Forum on Food Regulation **FoFR FOPL** Front of pack labelling

FSA Food Standards Agency **GST** Goods and Services Tax HPS Health Protection Service **HSR** Health Star Rating

HWAP Healthy Weight Action Plan

INFORMAS International Network for Food and Obesity/

non-communicable diseases Research, Monitoring and Action Support

KSS Kingsford Smith School **NAACT** Nutrition Australia ACT

NHMRC National Health and Medical Research Council

NHS National Health Survey

NHSCG National Healthy School Canteen Guidelines

Nutrition Information Panel

NNPAS National Nutritional and Physical Activity

Survey

NRV Nutrient Reference Values

NYC New York City OOS Occasions of Service P&C Parents and Citizens SES Socio-economic

SKIP School Kids Intervention Program

WHO World Health Organization

UK United Kingdom %DI Percent Daily Intake

Resources

NIP

- Good Habits for Life https://goodhabitsforlife.act.gov.au/
- Fresh Tastes: healthy food at school http://www.health.act. gov.au/healthy-living/healthy-children-and-young-people
- Healthy Food@Sport http://www.health.act.gov.au/ healthy-living/healthy-children-and-young-people
- ACT Health Promotion Grants Program http://www.health. act.gov.au/healthy-living/health-promotion-grants-program
- Food Safety http://www.health.act.gov.au/public-information/businesses/food-safety-regulation
- School Kids Intervention Program (SKIP) www.health.act. gov.au/SKIP
- ACT Nutrition Support Service http://www.actnss.org/
- Nutrition Australia ACT http://www.nutritionaustralia.org/
- The Mixing Bowl cookbooks http://www.health.act.gov.au/ healthy-living/health-improvement
- Heart Foundation ACT http://www.heartfoundation.org.au/ Pages/default.aspx
- Healthy Food and Drink Choices Policy http://www.health. act.gov.au/sites/default/files/Healthy%20Food%20and%20 Drink%20Choices%20Policy.pdf
- Daily intake guide www.mydailyintake.net
- Health Star Rating http://www.healthstarrating.gov.au/ internet/healthstarrating/publishing.nsf/Content/651EE-FA223A6A659CA257DA500196046/\$File/HSR%20 Style%20Guide.pdf

Healthy eating initiatives in New York City, 2001-13

Dr Paul Kelly, Chief Health Officer, Population Health Division

To address the obesity pandemic, governments need to focus on effective and equitable interventions to influence the food environment. During Mayor Bloomberg's administration (2001-13), in addition to community and business engagement strategies and social marketing campaigns, New York City introduced or proposed innovative, multi-layered regulatory and legislative reforms aimed at making the healthy choice the easier choice in a range of settings.

Whilst most of the more controversial reforms either failed to be enacted or were challenged in the courts, there have been measurable positive changes in the food environment and consumption patterns, particularly in sugar sweetened beverage consumption. The New York City experience has important lessons for other cities, including those in Australia.

The administration of Mayor Bloomberg in New York City (NYC), from 2001 to 2013, identified obesity control and prevention as key priorities within their multi-pronged strategy to promote a healthier city.¹ During his three terms, Mayor Bloomberg, together with his health and other commissioners (equivalent to Directors-General in the ACT setting), led what has been described as a "golden era" for public health reforms to both the physical and the food environments in the city.² Whilst some have criticised his approach as being top down and at times lacking in community consultation, there is no doubting that he did substantially change the 'obesogenic environment' in NYC.⁴

In this article, the main regulatory and legislative reforms to the food environment which were proposed during the Bloomberg period are outlined. Many of these reforms have been in place for some years and are continuing to be enforced, some were never enacted due to a range of factors and others were overturned by the courts.

Nutrition and obesity

The link between nutrition and health is well established. Increasingly, especially in rich countries and in urbanised settings, it is excessive caloric intake (particularly when consumed in the form of energy dense, nutrient poor food) that is driving the epidemic of overweight and obesity. Sugar sweetened beverages are particularly implicated. Diets high in sugar, fat and salt are associated with many chronic diseases including diabetes, cardiovascular disease and some cancers. The countries are sugar, and the contribution of the countries of



Figure 1. New York City Department of Health social marketing campaign. Source: http://www.nyc.gov/html/doh/downloads/pdf/public/dohmhnews8-06.pdf

For these reasons, it is important to consider how governments can influence the food environment to promote healthy food choices to prevent and control obesity prevalence at the population level. Reforms in this space are the most contentious and most prone to accusations of 'nanny state-ism' because food choices are seen to be an individual decision.⁸

Ways of approaching the food environment

The Bloomberg administration adopted a multi-layered, highly innovative approach to public health reforms to influence the food environment.9 There were many programs aimed at individual behaviour change, such as the Bronx CAN (Change Attitudes Now) initiative, 10 alongside community-based programs which aimed to empower the local community to influence businesses to stock healthier food options, such as Shop Healthy. 11 There were also the more traditional, though often confronting, social marketing campaigns such as Pouring on the Pounds (see Figure 1). Importantly, the Bloomberg administration was unprecedented in its use of legislative and a range of non-legislative regulatory mechanisms to achieve changes in the food environment (see Table 1). Some of these mechanisms are peculiar to the United States (executive orders by the President, State Governors and City Mayors) and to the majority of US local health departments (Boards of Health with appointed, independent experts). 12 Despite this, the ideas themselves are worth examination and potential adaptation to the Australian context.

Reforms contentious and otherwise

On closer examination, almost all of the successful reforms could be classified as changing food offerings funded by government in government institutions such as schools and in government-owned buildings and increasing nutritional awareness via food labelling. Incentive programs in the commercial sector and engineering solutions to increase potable water availability were also highly successful. Even some of these less provocative reforms were opposed to a greater or lesser extent by private industry, local business owners, parent and various other advocacy groups.¹³⁻¹⁵

Of the most widely reported, controversial and restrictive proposals, only the trans fat ban, which was itself the subject of a legal challenge which led to amendments and then a second successful defence in the courts, survived these challenges. The food stamp restriction failed because it relied on Federal agreement which was withdrawn following pressure from advocacy groups including the National Association for the Advancement of Colored People and anti-hunger organisations. The sugar tax relied on agreement by the State legislature and was twice rejected after a concerted advocacy campaign by the American Beverage Association (ABA), an "astroturf" (i.e. false grassroots) organisation known as New Yorkers Against Unfair Taxes, various libertarian groups, and a former President of the American Dietetic Association. 3,18

The proposal to limit the maximum size of sugar sweetened beverages available for sale in food establishments licenced by the City, the so called 'portion cap' was vehemently opposed by industry groups (including another "astroturf" group, New Yorkers for Beverage Choice which was fully funded by the ABA, the peak industry body for soda manufacturers). The Board of Health received 38,000 written submissions (84 percent in favour) and a 90,530-signature petition in opposition, sponsored by the ABA. The regulation was passed by the Board of Health but was never enacted because of a legal challenge, again led by the ABA. ¹⁹ Interestingly, the court decision to overturn the Board's regulation, which was upheld on appeal, emphasised the principle of the separation of powers (arguing that the Board of Health implements but the City Council should lead on policy) and industrial fairness (not all purveyors of sugar sweetened beverages were affected equally) rather than any ruling related to undue government interference on personal freedom to choose. ^{9,20}

Healthy eating initiatives in New York City, 2001-13 (continued)

What the Bloomberg administration actually achieved, which in itself is remarkable, was to highlight the issue of food choices and sugar sweetened beverages in particular and to change the community conversation. The proposed reforms generated an intensive, sustained and free public debate in a range of forums including in the media. This has resulted in two major cultural changes. Firstly there has been a notably easier transition of similar proposals both locally in NYC as well as nationally and even internationally. These have included calorie labelling, which has been included in the President Obama health care reforms,²¹ nutritional standards for children's meals²² and sugar taxes in Mexico and Berkley, California.⁹ Secondly, despite the failure to influence sugar sweetened beverage consumption through legislative means, there has been a statistically significant decrease in sugar sweetened beverage consumption (see Figure 2).⁹

Lessons for Canberra

Of course, Canberra is very different from NYC and some of the mechanisms for reform in that context such as executive orders are not available here. Despite this, several of the New York initiatives have already been introduced in Canberra or are being introduced as part of the ACT Government's Healthy Weight Initiative (see Table 1). Additionally, there are lessons to be learned from the New York experience which are applicable to Canberra and other Australian cities

Firstly, innovative local solutions are required to choose the levers available to government to best influence the agenda without being seen, as occurred often in NYC during this period, to over-step the mandate of government. A particular challenge, not unique to nutritional issues, is to be able to gain and keep strong community support and to accurately measure that support over time. Finding new ways to engage with the local business community to become part of the solution for mutual benefit is clearly important in this regard.

Secondly, a bold agenda is possible with strong and consistent political leadership but these things take time – the Bloomberg administration lasted for 12 years and was focussed on obesity as a primary health agenda for over nine years. Patience and persistence is required.

Thirdly, there are strong and sometimes unpredictable opponents to change and governments need to be prepared for this and be able to communicate evidence-based and accessible health, moral, ethical and economic counter-arguments. Through this, community support for reform is achievable.

Finally, changing the community and media conversation about the need to tackle obesity through influencing the food environment is also achievable and a key to the sustainability of reforms. In this context, government action which may include regulation and legislation, can support the responsible choices and decision making of individual citizens, thereby enhancing personal freedom rather impinging upon it.8

Notes:

Executive orders:

The Mayor of the City of New York has the authority to issue orders to NYC agencies, offices, divisions, and bureaus. Generally, these orders concern the implementation of laws and/or mayoral policies. Executive orders may be amended, modified, or repealed by subsequent orders. NYC Dept of Records. http://www.nyc.gov/html/records/html/executive_orders/executive_orders.shtml accessed 24 July 2015

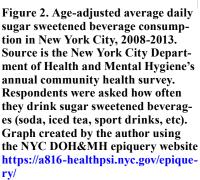
The NYC Board of Health:

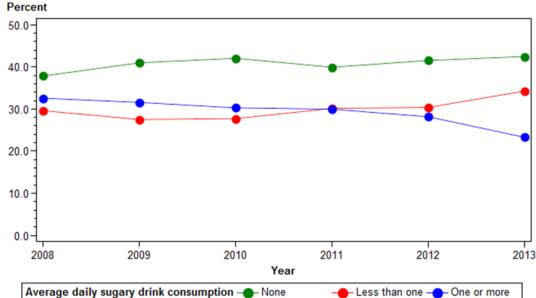
The NYC Board of Health held its first meeting in 1805 to respond to a yellow fever epidemic. In 1866, the New York State Legislature expanded the Board and insulated it from political influence by setting aside seats for physicians and scientists. The Board is chaired by the Commissioner for Health and the remaining 10 members are appointed by the Mayor with the consent of the City Council on 6-year terms. Each Board member is a recognised expert, from a broad range of health and medical disciplines. The Board oversees New York City's Health Code.

NYC Department of Health and Mental Hygiene (DOH&MH) http://www.nyc.gov/html/doh/html/about/boh.shtml accessed 24 July 2015

EpiQuery: New York City interactive health data

EpiQuery is a web-based, user-friendly system designed to provide users with health data from a variety of sources. The system offers prevalence and incidence estimates for a range of health indicators and risk factors with confidence intervals, trends over time, graphical displays and maps. https://a816-healthpsi.nyc.gov/epiquery/accessed 31 July 2015.





Healthy eating initiatives in New York City, 2001-13 (continued)

Setting	Intervention	Method	Year	Successfully intro- duced or enacted	Source
	Supplement to SNAP. \$2 coupons for				
Farmers' markets	each \$5 spent at farmers' markets	Waiver request to USDA	2006	Yes	23
Fast food restaurants	Trans fat ban	Health Code	2007	Yes	1
NYC facilities	All food purchased and served by City, including in schools, to meet nutrition standards**	Executive Order	2008	Yes	24
Chain food service establishments	Calorie labelling*	Health Code	2008	Yes	1
Street vendors (Green carts)	New mobile food permits that only vend fresh fruit and vegetables in precincts with low consumption rates and lack of access	City Council	2008	Yes	25
Supermarkets	Zoning and tax incentives for supermarket creation & expansion	Zoning text amendment & tax policies/ City Council	2009	Yes	26,27
Commercial buildings	Water bottle refilling stations	Plumbing code/City Council	2009	Yes	28
NYC schools	More stringent healthy food & beverage requirements than the 2008 Executive Order*	NYC DOE Chancellor Regulation	2009	Yes, but modified by City Council	29-31
Commercial beverage industry	Sugar sweetened beverage (SSB) tax	NY state legislature (proposed by State, supported by NYC)	2009 & 2010	No (proposed but not voted on as part of 2009 or 2010 budgets	18
SNAP vendors	Restrict use of SNAP benefits on SSB	Waiver request to USDA	2010	No (denied by USDA after hunger advocate/ industry opposition)	17
NYC schools	Water fountains*	Federal law (healthy hunger free act)	2010	Yes	32
New York City	Mandated annual report on food environment*	City Council	2011	Yes	33
Food service establishments regulated by DOH&MH	Portion cap on SSB	Health Code	2012	Yes, but overturned by courts	19,20
NYC licensed children's camps	Nutrition guidelines, including guidelines on beverages served	Health Code	2012	Yes	34

Table 1: Regulatory and legislative reforms affecting the food environmental in New York City, 2001-13.

DOH&MH = NYC Department of Health & Mental Hygiene. DOE = NYC Department of Education. NYC = New York City. SNAP = supplemental nutrition assistance program (also known as 'food stamps') administered by the United States Federal Department of Agriculture (USDA). SSB = sugar sweetened beverages.

Acknowledgements

This work is part of the Comparing Obesity Prevention Initiatives - Canberra and New York (COPI-CANY) study, funded through the ACT Health Private Practice Fund, which provided travel assistance and project expenses for a study tour to New York City in 2014. Thanks to the 41 interviewees for sharing their insights and experiences and to collaborators in both New York City and Canberra.

^{*} A similar program already in place in the ACT.

^{**} A similar program proposed under the ACT Government Healthy Weight Initiative.

Healthy eating initiatives in New York City, 2001-13 (continued)

- 1. Frieden TR, Bassett MT, Thorpe LE, et al. Public health in New York City, 2002-2007: confronting epidemics of the modern era. *Int J Epidemiol* 2008;37(5): 966-77.
- Dowell D, Farley TA. Prevention of non-communicable diseases in New York City. *Lancet*. 2012 Nov 17;380(9855): 1787-9.
- 3. Isett KR, Laugesen MJ, Cloud DH. Learning from New York City: a case study of public health policy practice in the Bloomberg administration. *J Public Health Management Practice* 2015;21(4): 313-322.
- 4. Freudenberg N, Atkinson S. Getting food policy on the Mayoral table: a comparison of two election cycles in New York and London. *Public Health* 2015;129: 295-302.
- Ludwig DS, Peterson KE, Gortmaker S. Relation between consumption of sugar-sweetened drinks and childhood obesity: a prospective, observational analysis. *Lancet* 2001;357(9255): 505–8.
- 6. Ruff RR, Akhund A, Adjoian T, et al. Calorie intake, sugar-sweetened beverage consumption, and obesity among New York City adults: findings from a 2013 population study using dietary recalls. *J Community Health* 2014 Dec;39(6): 1117-23.
- National Health and Medical Research Council. Australian Dietary Guidelines. Canberra: National Health and Medical Research Council, 2013. ISBN Online: 1864965754
- 8. Brownell KD. Personal responsibility and obesity: a constructive approach to a controversial issue. *Health Affairs* 2010; 29(3): 379-387.
- Kansagra SM, Kennelly MO, Nonas CA, et al. Reducing sugary drink consumption: New York City's approach. Am J Public Health. 2015 Apr;105(4): e61-4.
- Bronx CAN Health Initiative. http://www.bronxcan.com accessed 28 July 2015.
- 11. New York City Department of Health & Human Hygiene. Shop Healthy NYC. http://www.nyc.gov/html/doh/html/living/shophealthy.shtml accessed 28 July 2015.
- Gostin LO, Reeve BH, Ashe M. The historic role of boards of health in local innovation: New York City's soda portion case. *JAMA*, published online 15 September 2014. Doi: 10.1001/jama.2014.12498
- 13. Freudenberg N, McDonough J, Tsui E. Can a Food Justice Movement Improve Nutrition and Health? A Case Study of the Emerging Food Movement in New York City. *J Urban Health* 2011; 88(4): 623–636.
- Farley TA, Caffarelli A, Bassett MT, et al. New York City's Fight Over Calorie Labeling. A two-year struggle ultimately proves that innovation in food regulation is entirely possible at the local level. *Health Affairs* 2009; 28(6): w1098–w1109
- 15. Marx R. Parents and students hold bake-in at City Hall Park to protest City's bake-sale ban. The Village Voice, 19 March, 2010. http://www.villagevoice.com/restaurants/parents-and-students-hold-bake-in-at-city-hall-park-to-protest-citys-bake-sale-ban-6510816 accessed 31 July 2015.
- Barnhill A. Impact and Ethics of Excluding Sweetened Beverages from the SNAP Program. Am J Public Health 2011; 101(11): 2037–2043.
- 17. Letter from USDA to NY State. 19 Aug, 2011. www.foodpolitics.com/wp-content/uploads/SNAP-Waiver-Request-Decision.pdf accessed 5 December 2014
- 18. Hartocollis A. Failure of State soda tax plan reflects power of an antitax message. New York Times, July 2, 2010. www.nytimes.com/2010/07/03/nyregion/03sodatax.html accessed 5 December 2014.
- 19. Kansagra S. Memo to members of the Board of Health: Summary and response to public hearings and comments received regarding amendment of article 81 of the New York City code to establish maximum sizes for beverage offered and sold in food

- service establishments. September 6, 2012. http://www.nyc.gov/html/doh/downloads/pdf/boh/article81-response-to-comments.pdf accessed 14 November 2014.
- Joseph AX. Bloomberg's ban on big sodas is unconstitutional: appeals court http://www.reuters.com/article/2013/07/30/us-sodaban-lawsuit-idUSBRE96T0UT20130730 accessed 31 July 2015.
- 21. Rosenbloom S. Calorie data to be posted at most chains. New York Times. 23 March, 2010. www.nytimes.com/2010/03/24/business/24menu.html?_r=0 accessed 31 July 2015.
- Confessore N. How school lunches became the latest political battleground. New York Times. 7 October, 2014. http://www. nytimes.com/2014/10/12/magazine/how-school-lunch-became-the-latest-political-battleground.html accessed 31 July 2015
- 23. Baronberg S, Dunn L, Nonas C, et al. The impact of New York City's health bucks program on electronic benefit transfer spending at farmers markets, 2006-2009. *Prev Chronic Dis* 2013;10: E163. Doi:10.5888/pcd10.130113.
- Lederer A, Curtis CJ, Silver LD, et al. Toward a healthier city. Nutrition standards for New York City Government. Am J Prev Med 2014;46(4): 423-8.
- Leggat M, Kerker B, Nonas C, et al. Pushing produce: the New York City Green Carts initiative. J Urban Health 2012;89(6):937-8.
- FRESH Zoning text amendment, 2009. http://www.nyc.gov/ html/misc/pdf/fresh_zoning_text_amendment.pdf accessed 5 December 2014.
- 27. NYC Economic Development Corporation. http://www.ny-cedc.com/program/food-retail-expansion-support-health-fresh accessed 5 December 2014.
- NYC Local Law 55, 2010. http://www.nyc.gov/html/dob/downloads/pdf/ll55of2010.pdf accessed 5 December 2014
- 29. New York City Department of Health & Mental Hygiene (2011). Preventing non-communicable diseases and injuries: innovative solutions from New York City. New York: New York City Department of Health & Mental Hygiene.
- 30. NYC Council Resolution 2300-2009. Dept of Education to amend Chancellor's Regulation A-812, in order to repeal the City's ban on the sale of baked goods, cookies, and other "non-health" food items from schools, school yards, or school fundraisers. http://legistar.council.nyc.gov/LegislationDetail.aspx?ID=558545&GUID=C120305F-CCC8-45D2-89FD-D2 F9BB2BA458&Options=&Search= accessed 1 May 2015.
- NYC Department of Education. Revised Department of Education Regulation of the Chancellor A-812, February 25, 2010. (superceded original regulation dated June 29, 2009). http://schools.nyc.gov/NR/rdonlyres/381F4607-7841-4D28-B7D5-0F30DDB77DFA/78296/A812FINAL.pdf accessed 1 May 2015
- 32. Nonas C, Silver LD, Kettel Khan L, et al. Rationale for New York City's regulations on nutrition, physical activity and screen time in early child care centers. *Prev Chronic Dis* 2014;11:E182 doi:10.5888/pcd11.130435.
- City of New York. 2013 New York City food metrics report.
 http://www.nyc.gov/html/nycfood/downloads/pdf/ll52-food-metrics-report-2013.pdf accessed 5 December 2014.
- New York City Obesity Task Force: interim progress report. December 2013. http://www.nyc.gov/html/nycfood/downloads/pdf/obesity-task-force-scorecard-12-31-13-final.pdf accessed 21 November 2014.

Promoting healthy food environments

Patricia Byrne, Research and Evaluation, Population Health Division

Food choices are shaped by our environment, including shops, workplaces, schools and the media. Often these environments make it easy to choose unhealthy foods and can crowd out healthy food messages from other sources. Creating healthy food environments that make healthy choices the easy and appealing choices is needed to reduce rates of diet-related disease and obesity amongst the population. This article describes the ACT Government's work on creating healthy food environments.

Nutrition and Obesity in the ACT

Poor diet is the risk factor responsible for the greatest burden of disease in Australia, particularly cardiovascular disease, some cancers and type 2 diabetes. High body-mass index is the second leading risk factor.¹ There are some important gaps between the diets of Canberrans and dietary intakes recommended by the Australian Dietary Guidelines.² For example, only five percent of adults meet the recommendations for vegetable consumption.³ Canberrans obtain 33 percent of their energy from discretionary foods and drinks that are energy-dense and nutrient-poor⁴ and 20 percent of children in year six eat foods such as chips, lollies and cake every day.⁵ In addition, 63 percent of adults and 25 percent of children (in excess of 180 000 people) are overweight or obese.³ Changing dietary patterns in the population is a high priority to reduce rates of diet-related disease and obesity.



Photograph: Waist measurement. Witthaya Phonsawat. FreeDigital-Photos.net

The changing food environment and rising global obesity rates

The World Health Organization (WHO) has identified that individual behaviour change is more likely to be facilitated and sustained in an enabling environment. The ideal enabling environment is one that not only promotes but also supports and protects healthy living. Food environments, for example home, child care, schools, workplaces, sports venues, retail stores and restaurants, have a substantial impact on an individual's food choices. Currently, food environments are dominated by energy-dense, nutrient-poor processed food products which are widely available, relatively inexpensive and heavily promoted.

In order to reduce the prevalence of obesity and diet-related disease, there needs to be a focus on creating 'healthy food environments' that shift the population's diets, especially those of socially disadvantaged populations, towards diets that meet dietary guidelines.⁹

The proportion of adults overweight or obese (see notes on page 9) has increased worldwide over the past 30 years in both developed and developing countries. In 2008, an estimated 1.46 billion adults globally were overweight and 502 million were obese. ¹⁰ The simultaneous increases in obesity in almost all countries can be attributed mainly to changes in the global food system, which is producing more processed, affordable, and effectively marketed food than ever before. ¹¹

Governments can play an important role in influencing food environments to promote healthy food choices. Initiatives targeting the food environment have been implemented in some countries, for example, menu labelling regulations in New York, ¹² soft drink and confectionary taxes in Denmark ¹³ and television junk food advertising restrictions in the United Kingdom, ¹⁴ and Sweden. ¹⁵ Results of the statutory restrictions on television advertising in the United Kingdom suggest the outcome has been significant. By 2009, children were exposed to 37 percent fewer advertisements promoting products high in fats, sugars or salt compared to 2005. ¹⁶

Creating a healthier food environment in the ACT

The *Towards Zero Growth: Healthy Weight Action Plan* (HWAP)¹⁷ launched by the ACT Government in October 2013, aims to stabilise the growth in obesity in the ACT population. This is a whole of government approach with implementation groups leading actions across the following areas: food environments, schools, workplaces, urban planning, social inclusion and evaluation.

Dr Kelly's article on page 4 identifies some parallels between food environment interventions implemented in New York City (NYC) and in the ACT, such as energy labelling of food and beverages at point of sale, water refill stations in schools, nutrition standards and guidelines for food provision in the public sector including schools, and annual reporting on the food environment. Regulatory reforms in NYC were sometimes not enacted due to significant opposition from key business stakeholders.¹⁸

The ACT Government is implementing a number of policies to change the food environment and engage the business sector through trialling a range of voluntary actions.

Several policies have been implemented covering healthy food and drink provision in ACT government settings. The ACT Health Healthy Food and Drink Choices Policy¹⁹ was released in March 2014 and after a transition period became mandatory in March 2015 (see article on page 15). This policy has been a model for development of two whole-of-public-sector food provision policies. The ACT Public Sector Healthy Food and Drink Choices Vending Machine Policy²⁰ was released in December 2014 to increase the availability of healthy food and drinks in vending machines at ACT Government workplaces and facilities. An ACT Public Sector Healthy Food and Drink Choices Policy covering food outlets, catering and fundraising is expected to be implemented in 2015-2016 to increase the availability and promotion of healthy food and drink choices for staff, volunteers and visitors to all ACT Public Sector workplaces and facilities.



Photograph: Healthy catering ACT Health

Promoting healthy food environments (continued)

Childhood is a time when attitudes about food and eating behaviours are formed, and the school environment plays an important role in influencing children's food preferences. Recognising this, the ACT Public School Food and Drink Policy 2015²¹ has been developed as part of the Schools Implementation Group to promote a whole-school approach to the provision and sale of healthy food and drinks in schools. This will support children to develop healthy eating habits from an early age. The policy requires all public schools to implement the National Healthy School Canteen Guidelines²² in situations in schools that involve food and drink provision (not only in canteens).

An annual report card on the Healthy Weight Initiative²³ shows some additional achievements in the ACT food environment with the development and implementation of *Fresh Tastes: healthy food at school* (see article on page 31), healthy eating community programs, *Good Habits for Life* (see article on page 36), and the Heart Foundation ACT's *LiveLighter* Campaign.

In addition, the ACT has introduced kilojoule labelling in certain standard food outlets (chain food businesses selling standard food items) to provide consumers with information about the energy content of ready-to-eat food so they can make better informed dining choices.²⁴ This is increasingly important as people's diets are changing to be more reliant on "meals out and fast foods".²⁵

The HWAP Food Environment Implementation Group (FEIG) aims to make changes to the environments in which people make food choices such as shops, workplaces, sport, schools, restaurants and community settings. These environments can make it easy to choose unhealthy foods and can crowd out healthy food messages from other sources. The FEIG is focusing on actions to promote healthy foods, reduce the marketing of unhealthy foods, and improve the availability of free drinking water in public spaces.

The initial focus of FEIG was on drinking water. During 2014-15, the availability of free drinking water in public places was increased by the installation of six units in Canberra sporting fields and neighbourhood ovals. A further 24 units were installed in public spaces and parks managed by the ACT Government and a minimum of two water refill stations have also been installed in all ACT public schools. Each student was given a reusable water bottle that promotes water as the drink of choice and reduces plastic waste.



Photograph: Water on tap. ACT Government

To inform the marketing and promotion actions of FEIG, the ACT Government commissioned an audit of food marketing to children in the ACT. The audit, undertaken by the Heart Foundation ACT, found extensive marketing of food and beverages at a range of settings, 78 percent of which was marketing of unhealthy products²⁶ (see article on page 13).

Four priority settings have been identified for action by the FEIG:

- community;
- local businesses and industry (such as shopping centres, cinemas, clubs, supermarkets and other retail outlets);
- · sporting organisations and sporting sponsorship; and
- venues, events and property under ACT Government control (such as buses, bus stops and sporting venues.



Photograph: Bus Stop. ACT Health

Evidence from the WHO⁹ and studies by the International Association for the Study of Obesity,²⁷ show that working in collaboration with key stakeholders in the food environment gives the best chance of a sustained result. The ACT Government is considering a strategy for broad consultation with the community on potential actions. The ACT's work on creating healthy food environments will be reported on an ongoing basis as actions are piloted, implemented and evaluated.

Notes

For adults:

- Overweight is defined as body-mass index (BMI) of $25.0 25.9 \text{ kg/m}^2$; and
- Obese is defined as BMI of 30 kg/m² or more.

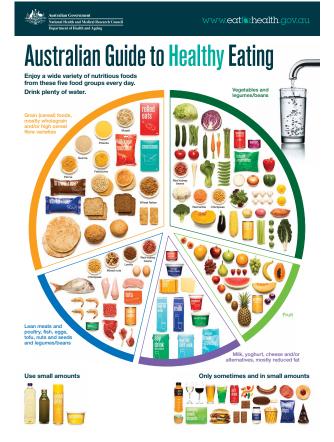
- Institute for Health Metrics and Evaluation. GBD Profile: Australia Global Burden of Diseases, Injuries, and Risk Factors Study, 2010. https://www.healthdata.org/sites/default/files/files/country_profiles/GBD/ihme_gbd_country_report_australia.pdf accessed August 2015.
- National Health and Medical Research Council. Australian Dietary Guidelines. Canberra: National Health and Medical Research Council, 2013. ISBN Online: 1864965754
- Australian Bureau of Statistics. Australian Health Survey: First Results, 2011-12. Canberra: Australian Bureau of Statistics, 2012. http://www.abs.gov.au/ausstats/abs@.nsf/Lookup/4364.0.55.009main+features12011-12 accessed August 2015.
- Australian Bureau of Statistics. National Nutrition and Physical Activity Survey: Key facts food and nutrients ACT, 2011-12. Canberra: Australian Bureau of Statistics, 2012. http://www.ausstats.abs.gov.au/ausstats/subscriber.nsf/0/A470730B601A76C2CA257E5F00160985/\$-File/4364055009 8 201112.pdf accessed August 2015.

Promoting healthy food environments (continued)

- ACT Health. Focus on Child Health 2015 report for year 6 children in the ACT, Nutrition. ACT Government, 2015. http://www.health.act.gov.au/research-publications/epidemiology-publications/focus-child-health accessed August 2015.
- World Health Organization. WHO Technical Report Series 916. Diet, nutrition and the prevention of chronic diseases. Geneva: Joint FAO/WHO expert consultation; 2003. Pg 138. http://www.who.int/dietphysicalactivity/publications/trs916/en/gsfao_strategic.pdf?ua=1 accessed August 2015.
- 7. Story M, Kaphingst KM, Robinson-O'Brien R et al. Creating healthy food and eating environments: policy and environmental approaches. *Annu Rev Public Health* 2008; 29: 253-72.
- 8. Swinburn BA, Sacks G, Hall KD et al. The Global Obesity Pandemic: shaped by global drivers and local environments *Lancet* 2011; 378: 804–814.
- World Health Organization. Global strategy on diet, physical activity and health. Geneva: World Health Organization, 2004. http://www.who.int/dietphysicalactivity/strategy/eb11344/ strategy_english_web.pdf?ua=1 accessed August 2015.
- 10. Finucane MM, Stevens GA, Cowan MJ et al. National, regional, and global trends in body-mass index since 1980: systematic analysis of health examination surveys and epidemiological studies with 960 country-years and 9·1 million participants. *Lancet* 2011; 377: 557–567.
- 11. Sassi F, Devaux M, Cecchini M et al. The obesity epidemic: analysis of past and projected future trends in selected OECD countries. Paris: Organisation for Economic Co-operation and Development (OECD), Directorate for Employment, Labour and Social Affairs, Health Committee, 2009.
- 12. Mello MM. New York City's war on fat. *N Engl J Med* 2009; 360(19): 2015–2020.
- The Danish Ministry of Taxation. Danish Tax Reform 2010. http://www.skm.dk/media/139042/danish-tax-reform_2010. pdf accessed August 2015.
- Ofcom. Television Advertising of Food and Drink Products to Children. Office of Communications, 2007. http://stakeholders.ofcom.org.uk/binaries/consultations/foodads_new/statement/statement.pdf accessed August 2015.
- 15. Jolly R. Marketing obesity? Junk food, advertising and kids. Research Paper no. 9 2010–11. Parliament of Australia, 2011. http://www.aph.gov.au/About_Parliament/Parliamentary_Departments/Parliamentary_Library/pubs/rp/rp1011/11rp09#_Toc282609525 accessed August 2015.
- World Health Organization. Protecting children from the harmful effects of food and drink marketing. 2014. http:// www.who.int/features/2014/uk-food-drink-marketing/en/ accessed August 2015.
- 17. ACT Government. Towards Zero Growth: Healthy Weight Action Plan. Canberra: ACT Government, 2013. http://www.health.act.gov.au/sites/default/files/Towards%20Zero%20Growth%20Healthy%20Weight%20Action%20Plan.pdfaccessed August 2015
- 18. Kansagra S. Memo to members of the Board of Health: Summary and response to public hearings and comments received regarding amendment of article 81 of the New York City code to establish maximum sizes for beverage offered and sold in food service establishments. September 6, 2012. http://www.nyc.gov/html/doh/downloads/pdf/boh/article81-response-to-comments.pdf accessed August 2015
- ACT Health. Healthy Food and Drink Choices Policy. Canberra: ACT Government, 2013. http://health.act.gov.au/sites/default/files/Healthy%20Food%20and%20Drink%20Choices%20Policy.pdf accessed August 2015.
- 20. ACT Government. ACT Public Sector Healthy Food and Drink Choices Vending Machine Policy. Canberra: ACT Government, 2014. http://www.cmd.act.gov.au/_data/assets/pdf_file/0012/667893/WHS-02-2014-Healthy-Food-and-Drink-Choices-Vending-Machine-Management.pdf accessed August

2015.

- ACT Government Education and Training. ACT Public School Food and Drink Policy. Canberra: ACT Government, 2015. http://www.det.act.gov.au/__data/assets/word_doc/0009/692289/Web-V-Final-ACT-Public-School-Food-and-Drink-Policy.doc accessed August 2015.
- 22. Australian Government Department of Health. National Healthy School Canteens: Guidelines for healthy foods and drinks supplied in school canteens. Canberra: Commonwealth of Australia, 2014. http://www.health.gov.au/internet/main/publishing.nsf/Content/5FFB6A30ECEE9321CA257BF-0001DAB17/\$File/Canteen%20guidelines.pdf accessed August 2015.
- 23. ACT Government. Healthy Living 2014-2105 Report. Canberra: ACT Government, 2015. http://www.act.gov.au/_data/assets/pdf_file/0003/756021/HWI-Annual-Report-14-15.PDF accessed August 2015.
- 24. ACT Parliamentary Counsel. ACT Food Act 2001. Canberra: ACT Government, 2015. http://www.legislation.act.gov.au/a/2001-66/current/pdf/2001-66.pdf accessed August 2015.
- 25. Australian Bureau of Statistics. 6530.0 Household Expenditure Survey, Australia: Summary of Results, 2009-10. Australian Bureau of Statistics. 2011. http://www.abs.gov.au/ausstats/abs@.nsf/Latestproducts/6530.0Main%20Features22009-10?opendocument&tabname=Summary&prod-no=6530.0&issue=2009-10&num=&view accessed August 2015.
- 26. Heart Foundation. Food and Beverage Marketing to Children in the ACT: Persistent, Pervasive, Persuasive. Canberra: Heart Foundation, 2015. http://www.heartfoundation.org.au/news-media/Media-Releases-2015/Documents/HF%20 Audit%20of%20Advertising%20to%20Children%20-%20 Final%20for%20March%202015%20launch.pdf accessed August 2015.
- 27. Shill J, Mavoa H, Allender S et al. Government regulation to promote healthy food environments A view from inside state governments. *obesity reviews* 2012; 13: 162–173.



Nutrition in the ACT - what the Australian Health Survey tells us

Bridget O'Connor, Epidemiology, Population Health Division

The Australian Health Survey (AHS), conducted by the Australian Bureau of Statistics (ABS) during 2011-2013, included the most detailed nutrition survey of the Australian population in over 15 years. State and territory level nutrition results from the 2011-12 National Nutrition and Physical Activity Survey (NNPAS) component of the AHS were released in June 2015. The NNPAS nutrition results provide measures of food consumption, energy and nutrients from a large sample and compared results for people in the ACT with all Australians. Key comparisons are made for consumption of fruit, vegetables, discretionary foods and alcohol, as well as intakes of energy and selected micronutrients such as sodium and calcium. This article outlines some key results for the ACT.

Good nutrition is necessary for healthy growth and development and also for maintaining good physical and mental health throughout the whole of life, including maintaining healthy weight, resistance to infection and protecting against some chronic diseases and premature death. The Australian Dietary Guidelines (ADG) provide evidence-based recommendations on the types and amounts of foods, food groups and dietary patterns that promote health and wellbeing, and which reduce the risk of chronic diseases and other diet-related conditions.

The AHS, conducted by the ABS during 2011-2013, was the largest health survey undertaken in Australia to date and includes data that can be used to monitor dietary patterns and nutrient intakes of the population against dietary guidelines and nutrient reference values. The AHS comprises two main surveys: the National Health Survey (NHS), which focuses on health status and conditions, and the National Nutrition and Physical Activity Survey (NNPAS), which focuses on nutrition and physical activity. In addition, there is a smaller National Health Measures survey that involves around a third of respondents from the combined NHS and NNPAS providing blood and urine samples for nutrient and chronic diseases markers.

The NNPAS results include detailed information on the 24 hour recall of food, beverage and supplement intakes of people two years of age and over as well as information on their usual intakes of nutrients and foods. The survey was conducted in person with data captured electronically. Parents/carers responded directly to questions on young children, whereas older children (from nine years of age) were encouraged to answer directly with parent/carer's assistance. Approximately 12,000 Australians participated in the NNPAS, including more than 1,000 people living in the ACT.2 The NNPAS used several methods to decrease the amount that people underestimated or under-reported their food intake. These included prompting people during the survey to recall their food and drink intake and making comparisons after the survey to identify the plausibility of each person's reported intake compared with each person's basal metabolic rate based on their age, sex and weight.² From detailed analyses, the ABS acknowledges that under-reporting of food intake occurs and has increased between 1995 and 2011-12 for males aged nine to 50, and to a lesser extent in females.^{2,3}

Key results for the ACT include consumption by amount of food, types of food groups, and consumption of energy and nutrients. Results are presented as weighted estimates (i.e. where the actual results from survey respondents have been adjusted to infer results of the whole population based on the probability of selection among respondents). The ACT results were then compared with national results, for adults and children. Adults were classified as people over 19 years to be consistent with the age groups specified in the National Health and Medical Research Council (NHM-RC) Nutrient Reference Values (NRVs). The full report of state and territory results of the 24 hour dietary recall from the 2011-12 NNPAS is available on the ABS website at http://www.abs.gov.au/AUSSTATS/abs@.nsf/ProductsbyCatalogue/5DC91B1BAFC-CBA58CA257E5F0016057C?OpenDocument

Food and Nutrient measure	Aust	ACT
Food Consumption (kg of food and beverages per person per day) (2 years and over)	3.1	3.1
Average energy intake (2 years and over)	8522	8498
adult males (kJ)	9954	9593
adult females (kJ)	7420	7626
boys (2-18 years) (kJ)	8636	9165
girls (2-18 years) (kJ)	7334	7031
Proportion of population meeting recommended vegetable intake (2 years and over) (%)	6.0	5.0
Proportion of population meeting recommended fruit intake (2 years and over) (%)	52.0	54.0
Proportion of total energy obtained from discretionary foods* (2 years and over)	35.0	32.9
adult males (%)	36.2	33.5
adult females (%)	32.6	31.7
boys (2-18 years) (%)	38.6	31.5
girls (2-18 years) (%)	38.4	36.6
Proportion of population consuming soft drink in the 24 hours prior to survey (2 years and over)	29.1	23.4
adult males (%)	32.9	24.8
adult females (%)	25.3	21.8
boys (2-18 years) (%)	31.0	28.1
girls (2-18 years) (%)	27.6	18.7
Mean daily sodium intake from salt naturally occurring in food as well as salt added during processing* (2 years and over) (mg)	2404	2443
adult males (mg)	2779	2713
adult females (mg)	2090	2229
boys (2-18 years) (mg)	2522	2733
girls (2-18 years) (mg)	2095	1939

Table 2. Selected Food and Nutrient Measures, Australia and ACT, Australian Health Survey 2011-13.

#discretionary foods are foods high in saturated fats, sugars, salt and/or alcohol

*excludes salt added to food during cooking and at the table

Data sources: Australian Bureau of Statistics (2015). Australian Health Survey: Nutrition - State and Territory results 2011-12. Australian Capital Territory Tables (catalogue no. 4364.0.55.009); Australian Bureau of Statistics (2014). Australian Health Survey: Nutrition First Results - Foods and Nutrients, 2011-12 Tables (catalogue no. 4364.0.55.007).

Foods

Although the amount of food consumed by adults and children in the ACT is similar to national figures, there are differences in the types of food consumed. People in the ACT were more likely than all Australians to consume cereals and cereal products, fruit products and dishes, yoghurt, soup and wine.³ People in the ACT were less likely than all Australians to consume soft drinks, beer, potatoes, cabbage, cauliflower and similar Brassica vegetables.³

Only a small proportion (five to six percent) of people aged two years and over in the ACT and in Australia are meeting the current recommended daily intake of vegetables.^{3,4} More people in the

Nutrition in the ACT - what the Australian Health Survey tells us (continued)

ACT (54 percent) and in Australia (52 percent) meet the current recommended daily intake of fruit than they do for the recommended daily intake of vegetables.^{3,4} Data from the ACT General Health Survey (ACTGHS) provides a comparison against these dietary guidelines and shows a marked difference by age: 90 percent or more of children aged two to 11 met fruit guidelines during 2007-2012 compared with only 15-25 percent of children aged 12-18 years.⁵ A similar pattern exists for vegetables however vegetable consumption by all age groups is substantially lower than fruit consumption.⁵

NNPAS results for Australia indicate that discretionary (energy-dense, nutrition-poor) food and drinks account for over a third of Australian's daily energy intake. However, people in the ACT obtain less energy from discretionary foods and drinks than Australians overall. Within the ACT population, girls aged two to 18 years consume the highest proportion of energy from discretionary foods.³ This is likely to be driven by girls aged nine to 18 years which is the peak age group shown in the Australian data.⁴ The contribution to energy obtained from discretionary foods and drinks decreases with age from the age of 18. The types of foods contributing to total energy consumed from discretionary foods and drinks include cereal-based products and dishes, followed by alcoholic and non alcoholic beverages for adults, and confectionery and meat products and dishes for children.³

Soft drink consumption is higher in males than females at all ages.^{3,4} Australian data shows that 51 percent of teenage males (aged 14-18 years) and 44 percent of young adult males (aged 19-30 years) had consumed soft drink on the day prior to the survey.⁴ Although the ACT was the jurisdiction with the lowest proportion of people who report drinking soft drink, the pattern of higher consumption in young males is also found in ACT results.

Food Insecurity

Around 3.6 percent of adults living in the ACT reported they had run out of food and couldn't afford to buy more food in the last 12 months, which is similar to Australia (four percent).³ In the ACT and in Australia, 1.5 percent of people reported going without food because they could not afford to buy more.³

Energy and Nutrients

The average energy intake for people in the ACT is similar to that of all Australians. There are also similar contributions to energy intake from macronutrients: carbohydrates 45 percent, fat 31 percent, protein 18 percent and dietary fibre two percent.³ Alcohol contributes approximately 5 percent for adults in the ACT and Australia.^{3,4} This is within the Acceptable Macronutrient Distribution Ranges and within the NHMRC recommended alcohol intake.

Boys and adult males in the ACT exceed the recommended upper level of sodium intake of 2,300mg per day which is a pattern seen in all states and territories.^{3,6} ACT boys aged two to 18 years on average have a similar intake of sodium as ACT adult males. This is similar to findings that compare usual intakes of nutrients (rather than directly from the previous 24 hours) for all Australians from the NNPAS where 76 percent of males compared to 42 percent of females aged two years and over exceed the upper level of sodium intake.⁷ The sodium intake measure (either from usual nutrient intake or from 24 hour recall) under-represents the sodium intake overall as it does not include any sodium from salt added to the food during cooking or at the table. Salt is reported to be added to food at the table either occasionally or very often by nearly a third (32.3 percent) of the Australian population.⁴

Girls and adult females in the ACT report intakes of calcium of less than the Estimated Average Requirement (EAR). The average daily intake of calcium for adult females in ACT is 781mg compared to the EAR of 840mg for 19-50 years and 1100mg for 51 years and over).^{3,6} This was also seen for all Australian women over the age of 19 years. ACT girls aged two to 18 years as a group have an average daily intake of 722mg which is less than the EAR of 800mg for girls aged nine to 11 years and 1050mg for girls aged 12-18 years.^{3,6} Australian data shows similar results for girls aged 12-18 years whereas the younger group of girls aged nine to 11 years is just meeting the recommendation.⁴

Discussion

This article shows some mixed results for the nutrition status of the ACT population. Although the ACT has lower levels of discretionary food and drink consumption when compared with Australia, the levels throughout the country, including in the ACT, remain unacceptably high. There are some particular concerns for young people including excess sodium intake by boys and inadequate calcium intake by girls, as well as their discretionary food and drink intake. There remains a need to encourage people to eat more fresh food, particularly vegetables, and less processed foods, particularly those with high salt content. In addition, females in the ACT need to be made aware of the importance of increasing their calcium intake from food to avoid low bone mineral density. The ACT Government will continue to work on promoting healthy eating in line with the Australian Dietary Guidelines through its health improvement programs and grants and through the Whole of Government Healthy Weight Initiative.

Notes:

The ADG define discretionary foods as "foods and drinks not necessary to provide the nutrients the body needs, but that may add variety. However, many of these are high in saturated fats, sugars, salt and/or alcohol, and are therefore described as energy dense. They can be included sometimes in small amounts by those who are physically active, but are not a necessary part of the diet. Foods in this category include cakes, biscuits; confectionery, chocolate; pastries, pies; ice confections, butter, cream, and spreads which contain predominantly saturated fats; potato chips, crisps and other fatty or salty snack foods; sugar-sweetened soft drinks and cordials, sports and energy drinks and alcoholic drinks."

- National Health and Medical Research Council. Australian Dietary Guidelines. Canberra: National Health and Medical Research Council, 2013. ISBN Online: 1864965754
- Australian Bureau of Statistics. Australian Health Survey Users' Guide. 2011-13 (catalogue no. 4363.0.55.001) 2013. http://www.abs.gov.au/AUSSTATS/abs@.nsf/Lookup/4363.0.55.001Main+Features12011-13 accessed July 2015.
- Australian Bureau of Statistics. Australian Health Survey: Nutrition State and Territory results 2011-12. (catalogue no. 4364.0.55.009) 2015. http://www.abs.gov.au/ausstats/abs@. nsf/Lookup/4364.0.55.009main+features12011-12 accessed July 2015.
- Australian Bureau of Statistics. Australian Health Survey: Nutrition First Results – Foods and Nutrients, 2011-12 (catalogue no. 4364.0.55.007) 2014. http://www.abs.gov.au/ausstats/abs@.nsf/Lookup/4364.0.55.001main+features12011-1 accessed July 2015.
- ACT Health. ACT General Health Survey data collection, 2007-2012. Unpublished.
- National Health and Medical Research Council. Nutrient Reference Values for Australia and New Zealand, Canberra: National Health and Medical Research Council, 2006. http://www.nrv.gov.au/nutrients/accessed July 2015.
- Australian Bureau of Statistics. Australian Health Survey: Usual Nutrient Intakes 2011-12 (catalogue no. 4364.0.55.008) 2015. http://www.abs.gov.au/ausstats/abs@.nsf/Lookup/ by%20Subject/4364.0.55.008~2011-12~Main%20Features~Key%20findings~100 accessed July 2015.

Marketing of unhealthy food and beverages to children in the

Lesley Paton, Research and Evaluation, Population Health Division

In March 2015, the Heart Foundation ACT delivered a report to the ACT Minister for Health that highlighted extensive marketing of unhealthy food and beverages to children in local Canberra settings. The report provided a snapshot of marketing at a point in time at shopping centres, supermarkets, bus shelters, sports venues, hospitals, radio, cinemas, on buses and in close proximity to schools. Examples of corporate sponsorship of sporting organisations was also reported.

Poor diet is harmful to children's growth and development and can contribute to overweight and obesity. Marketing of unhealthy food and beverages can influence children's food preferences, purchase requests, consumption, diet, and diet-related health outcomes including overweight and obesity.

The ACT Government is committed to exploring ways of reducing children's exposure to marketing of unhealthy food and beverages as part of its implementation of the *Towards Zero Growth: Healthy Weight Action Plan.* Surveys have found strong support amongst the Canberra community for action to reduce unhealthy marketing to children.

Heart Foundation report on food marketing to children in Canberra

The Heart Foundation ACT report, funded by ACT Health, provides a point in time snapshot of food and beverage marketing in a range of local ACT settings. These settings were selected based on their potential for local action to reduce children's exposure to unhealthy marketing, and were: major shopping centres, suburban shopping centres, supermarkets, bus shelters, buses, sports venues, hospitals, areas in close proximity to schools, radio and cinemas. Corporate sponsorship of sporting organisations was also included. Marketing via television, the internet and social media was not included.

A sample of sites was selected to provide a spread across Canberra based on geography and other factors. For example, the selection of supermarkets sought to ensure a range of geographic locations and included large chains, independent supermarkets and supermarkets in town centres and in outer suburbs.

The report provides information about the extent and types of marketing of unhealthy products at the selected sites. 'Unhealthy' products were defined as those classified as 'Red' according to the National Healthy School Canteen Guidelines' used by ACT schools.

Key findings

The report² found that 78 percent of food and beverage marketing at the 61 sites audited was for unhealthy products (i.e. products high in salt, fat, sugar and/or kilojoules (energy)):

- at the six sporting venues audited, 66 examples of food and beverage marketing were recorded, of which 86 percent were for unhealthy foods and beverages;
- at the major shopping centres, 80 percent of the food and beverage marketing was for unhealthy products;
- at supermarkets, 77 percent of the food and beverage marketing was for unhealthy products. Only four of the 13 supermarkets audited provided one or more confectionary-free checkouts, and of a total of 140 checkouts included, only six were confectionary-free; and
- marketing of unhealthy food and beverages was found to occur within close proximity (200 metres) to seven of the 16 schools selected for the audit.

Nine ACT sports organisations were interviewed and five indicated that their major sponsors were food/beverage companies.
 Four of these were associated with unhealthy food and drink products.

The percentage of marketing of unhealthy food and drinks found at the ACT's two public hospitals was high (95 percent). However, this is already being addressed through ACT Health's Healthy Food and Drink Choices Policy, which restricts marketing of unhealthy food and drinks at ACT Health facilities and functions (see article on page 15). A corresponding ACT Public Sector Healthy Food and Drink Choices Policy, is planned for implementation in the second half of 2015.

The types of marketing found included billboards, sandwich boards, posters, prominent product placement, advertising, sponsorships (of sports teams and venues), point of sale displays and prominent branding (including on vending machines).

The report highlights some of the techniques used in marketing unhealthy food to children, including the use of bright, colourful, vibrant designs and child friendly themes. Placement of marketing in locations frequented by children was common, such as:

- close to schools;
- in cinema advertisements at films rated for child viewing;
- next to children's play areas in shopping centres;
- at junior sporting clubs;
- on school bus route shelters; and
- in supermarkets and shopping centres.



Photograph: ACT shopping centre. Heart Foundation ACT

Why is marketing of unhealthy food to children of concern?

Most food marketing is for products high in total kilojoules (energy), salt, sugar and/or fat.²⁻⁴ Marketing of unhealthy food and beverages is of concern because it can influence children's food preferences, purchase requests, consumption, diet, and diet-related health outcomes including overweight and obesity.³⁻⁵

Marketing of unhealthy food and beverages to children in the ACT (continued)

Good nutrition is essential for normal growth and development of children, as well as for maintaining healthy weight and protecting against ill health. Over-consumption of foods high in energy, saturated fat, sugars or salt, and/or under-consumption of nutrient-dense foods including vegetables, fruit and wholegrains can lead to ill health and excess weight.



Photograph: Supermarket checkout areas. Heart Foundation ACT

ACT Government Healthy Weight Action Plan

The ACT Government is committed to exploring ways of reducing the marketing of unhealthy food and beverages to children, as part of its *Towards Zero Growth: Healthy Weight Action Plan* (HWAP). Launched in October 2013, the HWAP is a whole of government initiative aimed at halting the growing rates of obesity and overweight in the ACT community. The HWAP is being implemented across six focus areas: food environment, workplaces, schools, social inclusion, urban planning and evaluation. Actions to reduce marketing of unhealthy food and beverages and promote healthy choices are included within these focus areas.



Photograph: ACT sports stadium. Heart Foundation ACT

Next steps

Newspoll surveys conducted in 2014 found strong support amongst the Canberra community for action to reduce marketing of unhealthy food and beverages to children. Following receipt of the Heart Foundation report, the ACT Government is considering consulting the community on potential actions to increase the promotion of healthy food and drinks and reduce the promotion of unhealthy food and drinks.

- Australian Government Department of Health. National Healthy School Canteens: Guidelines for healthy foods and drinks supplied in school canteens. Canberra: Commonwealth of Australia, 2014. http://www.health.gov.au/internet/main/ publishing.nsf/Content/5FFB6A30ECEE9321CA257BF-0001DAB17/\$File/Canteen%20guidelines.pdf accessed August 2015.
- Heart Foundation ACT. Food and beverage marketing to children in the ACT: Persistent, Pervasive, Persuasive. A snapshot of Food and Beverage marketing to Children in the Australian Capital Territory: Audit and Synthesis prepared for and funded by ACT Health. Canberra: Heart Foundation, 2015. http://www.heartfoundation.org.au/news-media/Media-Releases-2015/Documents/HF%20Audit%20of%20Advertising%20to%20Children%20-%20Final%20for%20March%20 2015%20launch.pdf accessed July 2015.
- McGinnis JM, Gootman JA, Kraak VI. Food marketing to children and youth: threat or opportunity? Washington DC: Institute of Medicine of the National Academies, 2005.
- World Health Organization (2010) Set of recommendations on the marketing of foods and non-alcoholic beverages to children. http://whqlibdoc.who.int/publications/2010/9789241500210_ eng.pdf accessed July 2015.
- Cairns G, Angus K, Hastings G, et al. Systematic reviews of the evidence on the nature, extent and effects of food marketing to children. A retrospective summary. *Appetite* 2013; 62: 209-215.
- National Health and Medical Research Council. Australian Dietary Guidelines. Canberra: National Health and Medical Research Council, 2013. ISBN Online: 1864965754
- ACT Government. Towards Zero Growth: Healthy Weight Action Plan. Canberra: ACT Government, 2013. http://www. health.act.gov.au/sites/default/files/Towards%20Zero%20 Growth%20Healthy%20Weight%20Action%20Plan.pdf accessed July 2015.

Healthy food and drink choices at ACT Health

Lesley Paton, Research and Evaluation, Population Health Division

This article describes the development and implementation of a Healthy Food and Drink Choices Policy for ACT Health, which aims to increase the availability of healthy food and drink choices provided to staff and visitors via food outlets, vending machines, catering and fundraising activities. The article highlights challenges and lessons learnt.

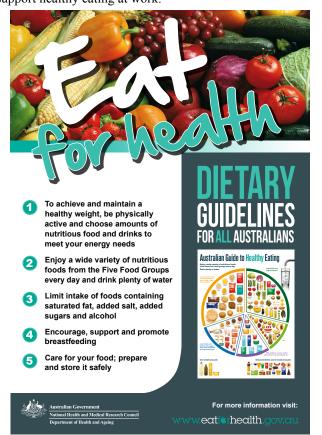
Through this Policy, ACT Health is leading the provision of healthy food choices across the ACT Government. The Policy has provided the model for development of an ACT Public Sector healthy food and drink choices policy, an action of the ACT Government's *Towards Zero Growth: Healthy Weight Action Plan*.

Background

In December 2011, ACT Health decided to develop a policy aimed at increasing the availability of healthy food and drink choices for staff and visitors through food outlets, vending machines, catering and fundraising activities within ACT Health. Several factors led to this decision.

Overweight, obesity and poor diet are major causes of chronic disease and disability in the ACT. In working to address this health problem, ACT Health recognised the need to show leadership by implementing a policy on the provision of healthy food choices to staff and visitors. This initiative has the potential to also reach a significant proportion of the wider ACT population through flow on effects to families and other social networks.

Surveys of staff and ACT Health visitors identified a desire for greater availability of healthy food and drinks. A 2010 survey of staff, visitors and patients at the Canberra Hospital campus identified concerns about the range and types of food and beverages available on the campus and at community health centres, in particular the lack of healthy food options. A 2011 ACT Health Staff Health and Wellbeing Survey identified a desire by staff for healthier food and drink choices to be available at work and for initiatives to support healthy eating at work.



Policy development

The Population Health Division led the development of the ACT Health Healthy Food and Drink Choices Policy³ (the Policy) with support from a Steering Committee of representatives from key areas of ACT Health. Policies already in place in other jurisdictions influenced the content of the Policy.

Baseline data was collected before there was broad communication about the development of the Policy. A survey of staff knowledge, attitudes and behaviours regarding healthy food and drinks at work was conducted in late 2012. In early 2013, baseline audits of all food outlets and vending machines were conducted. Food and drink items were counted and classified according to their nutritional content in order to determine the proportions of food and drinks falling into each of three traffic light classifications. A description of the traffic light system classifications is provided in Table 3 and further information about the traffic light system is provided in the Policy. Across all ACT Health sites, the baseline average proportions of food and drinks in vending machines were 10 percent Green, 21 percent Amber and 69 percent Red. In food outlets, 18 percent were classified as Green, 17 percent Amber and 65 percent Red. Photographic evidence of product placement was also captured to assess placement and promotion of items.

	Description	Provision
GREEN	 Contribute a wide range of nutrients. Generally low in saturated fat, sugar and salt. 	 Best choices. Should always be available, displayed prominently and actively promoted.
AMBER	 Contribute some valuable nutrients. Contribute considerable amounts of saturated fat, added sugar and/or added salt. May provide excess kilojoules. 	 Selected carefully for inclusion on the menu. Should not dominate the menu or displays. Large serves should be avoided.
RED	 Low in nutritional value. May be high in saturated fat, added sugar and/or salt. May provide excess kilojoules. 	 Not recommended. Inclusion on the menu should be limited.

Table 3: Traffic Light System classifications - descriptions and provision

A consultation was conducted from March to May 2013 with staff and stakeholders, who were invited to attend workshops and make written submissions. In total, 61 responses were received, including 16 responses from the public and/or stakeholder groups and 24 written submissions. There was general support for the aims, objectives and scope of the Policy, for having water available free of charge, and for ACT Health sponsorships being associated with only Green food and drink items. Some concerns were expressed about the financial impact of not using Red items in fundraising. In general, the traffic light system was viewed as easy to use and understand. There was strong support for new commercial contracts to comply with the Policy and for the development of communication tools and resources to support implementation.

Healthy Food and Drink Choices at ACT Health (continued)

The final Policy was endorsed in December 2013 and released on 5 March 2014. The Policy is available at http://www.health.act.gov.au/sites/default/files/Healthy%20Food%20and%20Drink%20 Choices%20Policy.pdf

Food outlets and vending machines	 The majority of foods and drinks sold shou be GREEN. GREEN and AMBER foods and drinks should form at least 80 per cent of products available. 			
Catering, fund- raising, rewards, incentives, gifts, prizes and give- aways	The majority of foods and drinks GREEN. AMBER foods and drinks may be small quantities only. RED category foods and drinks n supplied.	e provided in		
Advertising, promotion and placement	Only GREEN foods and drinks stadvertised or promoted. RED or AMBER foods and drink be advertised, promoted or placed nent areas. The ACT Health logo should not alongside RED or AMBER categand drinks.	as should not in promi-		
Alcohol	In addition to the ACT Public Sec agement Standards 2006, alcohol provided or used by ACT Health fundraising, rewards, incentives, g or give-aways.	is not to be for catering,		
Water provision	Tap water should always be available volunteers and visitors free of characteristics.			
Sponsorships	ACT Health sponsorships should with GREEN foods and drinks on The ACT Health logo should not alongside RED or AMBER foods or logos or advertisements for REBER foods and drinks.	nly. be used s and drinks		

Table 4: Policy Nutrition Standards

A formal process was developed to allow staff to apply for an exemption for fundraising or catered events, with strict criteria to be met to guide the decision making process.

Implementation

A one-year transition period (March 2014-February 2015) allowed time for staff, food outlets and the vending supplier to make the changes necessary for compliance with the Policy. A suite of resources was developed to support staff and businesses. Nutrition Australia ACT (NAACT) was contracted to provide support for staff, including via a healthy catering helpline and catering information sessions. NAACT was also funded to provide support to food outlets on assessing and adapting recipes and menus, and to the vending supplier on products for healthy vending options. A Communication Strategy kept staff informed and supported during the transition period. An Implementation Committee with representation across ACT Health supported the Policy implementation during this transition. On 1 March 2015, at the end of the transition period, compliance with the Policy became mandatory.

Challenges and lessons learnt

There are challenges in ensuring all staff are aware and compliant with any new policy. While many staff welcomed the Policy, there was resistance from others. Some staff were concerned that there would be a reduction in their ability to exercise personal choice with regard to food and beverages.

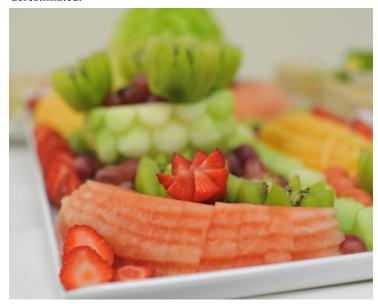
Fundraising is seen as a positive activity, and using Red food to raise funds for the Canberra Hospital or charities is a frequent and popular activity. Removing Red foods from fundraising proved controversial, and there was concern about the potential financial impact.

A key challenge has been the complexity of the changes required and the time needed to make these changes. Despite initial feedback during the consultations that the traffic light system was simple and easy to understand, its interpretation and implementation has not been simple. Development of detailed instructions for the classification of food and drink items has been necessary to provide consistency and rigour for evaluation purposes. There is no nationally implemented set of nutrition criteria or methodology for assessing food and drinks, therefore suppliers who work in more than one jurisdiction must adapt to each jurisdiction's individual requirements.

Sourcing a sufficient range of Green products to suit existing vending machines has been challenging. This has resulted in the need to explore different types of machines or delivery systems that are capable of vending a wider range of Green products.

The expert support and resources available to businesses was not well utilised. The main focus of this support was on changing menus and recipes, however more support on managing the business impacts may have resulted in greater progress, including managing the perceived negative financial impact of food outlets moving to 'healthy foods'. Continued support for businesses will be needed as food outlets progress with Policy implementation. Building ongoing partnerships with food providers is critical.

Ongoing efforts are needed to engage staff in understanding and supporting the Policy. Active support and leadership by senior managers across the organisation is crucial to achieving compliance with the Policy, for example when organising catering and fundraising and managing contracts with food outlets and vending machines. The importance of leaders and champions cannot be underestimated.



Photograph: Healthy Catering. ACT Health

Healthy Food and Drink Choices at ACT Health (continued)

Evaluation

Evaluation of the Policy and its implementation has commenced and the findings will guide next steps.

Towards a whole of government healthy food and drink choices policy

The ACT Health Healthy Food and Drink Choices Policy is leading the way on healthy food provision across the ACT public sector. As part of the ACT Government's *Towards Zero Growth - Healthy Weight Action Plan*⁴ a similar whole of ACT Public Sector policy is being developed, based on the ACT Health Policy. The ACT Public Sector Healthy Food and Drink Choices – Vending Machine Management Policy⁵ was released on 1 December 2014. An ACT Public Sector Healthy Food and Drink Choices Policy covering food outlets, catering and fundraising is expected to be implemented in 2015-16 to increase the availability and promotion of healthy food and drink choices for staff, volunteers and visitors to all ACT Public Sector workplaces and facilities. Support for these policies will be available as one element of a recently established Nutrition Support Service, funded by the ACT Government and delivered by Nutrition Australia ACT.

Notes

In 2011-12, 63 percent of ACT adults and around one quarter of children (aged five to 17) were overweight or obese⁶ and only five percent of people aged two years and over met the recommended usual daily intake of vegetables.7

- ACT Health. Unpublished survey data 2010.
- ACT Health. Staff Health & Wellbeing Survey, unpublished
- ACT Health. Policy: Healthy Food and Drink Choices. Canberra: ACT Government, 2013. http://www.health.act.gov.au/sites/default/files/Healthy%20Food%20and%20Drink%20 Choices%20Policy.pdf accessed August 2015.
- ACT Government. Towards Zero Growth: Healthy Weight Action Plan. Canberra: ACT Government, 2013. http://www. health.act.gov.au/sites/default/files/Towards%20Zero%20 Growth%20Healthy%20Weight%20Action%20Plan.pdf accessed July 2015.
- ACT Government. ACT Public Sector Healthy Food And Drink Choices - Vending Machine Management. Canberra: ACT Government, 2014. https://actgovssc.custhelp.com/app/ answers/detail/a id/2060 accessed August 2015.
- Australian Bureau of Statistics. Australian Health Survey: First Results, 2011-12 (catalogue no. 4364.0.55.001)



Are healthy diets in the ACT really more expensive than current, unhealthy diets? A new project is underway to find out...

Prof. Amanda Lee, School of Public Health and Social Work and School of Exercise and Nutrition Sciences, Queensland University of Technology

Food prices and affordability are important determinants of diet and health. Targeted food pricing policies may improve population diets, but comparable data to inform policy decisions are lacking in Australia and globally.

Our aim is to develop nationally standardised tools and protocols for assessing the price, relative price and affordability of healthy (recommended) and current (unhealthy) diets.

Methods follow the optimal approach proposed by the International Network for Food and Obesity/non-communicable diseases Research, Monitoring and Action Support (INFORMAS), using recent Australian data. Draft tools and protocols have been developed and piloted.

Results show that households spend more on current (unhealthy) diets than required to purchase healthy diets; the majority of the food dollar is spent on discretionary choices, including take-away foods. Findings suggest that healthy diets can be more affordable than current (unhealthy) diets in Australia. Factors such as taste/ desirability, convenience and advertising may be as important as price in determining food choices.

Methods will be refined further and applied in the ACT later this

Introduction

The Australian Dietary Guidelines are based on robust science.1 But less than seven percent of Australians currently consume diets consistent with these guidelines; at least 35 percent and 40 percent respectively of the energy intake of adults and children is derived from unhealthy 'discretionary' food and drinks high in saturated fats, added sugar, salt and/or alcohol.^{1,2} Given this, it is not surprising that unhealthy diets are now the major preventable risk factor contributing to the burden of chronic disease in Australia.³

The main drivers of poor diets are food environments that encourage unhealthy eating. 4,5 Globally, the International Network for Food and Obesity/non-communicable diseases Research, Monitoring and Action Support (INFORMAS) is working to benchmark and monitor food environments - the collective physical, economic, policy and sociocultural surroundings, opportunities and conditions that influence people's food and beverage choices.⁴ Our work with INFORMAS highlights that the perception that healthy foods are expensive can be a major barrier to healthy eating and a key determinant of diet-related health inequities. ^{1,6}

Greater total spending on food tends to be associated with more nutritious dietary patterns.⁶ Households with the lowest incomes are most vulnerable to high food prices, as they spend less per person on food, but a greater proportion of their disposable income on food.6,7

A range of complex factors influence food prices, including political, economic, socio-cultural and environmental factors at the local, national and international levels. 5,6,8 Food prices may be manipulated through a range of complex policy approaches. Three potential pricing strategies at a state or national level are:

- taxes on specific foods ('fat taxes'), e.g. on sugar sweetened beverages;
- exemption of selected goods from a goods and services or value added tax; and
- subsidies such as agricultural and transport subsidies, or voucher systems targeted to high-risk groups.

In Australia, available, non-comparable time series data from Queensland and Western Australia suggest that, despite basic healthy foods not incurring goods and services tax (GST), the cost of healthy food has increased more rapidly than unhealthy food over the last 15 years. 9,10 This is one reason why health groups 11,12 are concerned about potential changes to the Australian taxation system.¹³ However 'real life' comparable data to inform relevant debates are lacking.^{6,14} For example, despite several studies, it is not clear whether healthy dietary patterns are necessarily more expensive than current, less healthy diets. One reason for this is the lack of policy-relevant standardised methods. Presently in Australia, there are more than 10 different methods used to estimate the price of 'healthier' foods/diets and very few studies have attempted to assess the cost of current diets.6,7

From a health policy perspective we need robust information about the factors that can help move the whole population from our current diet to a healthy diet consistent with dietary recommendations.¹ With respect to food price and affordability, the key policy question⁶ is "what is the difference in price and affordability of healthy and current (unhealthy) diets, and how would these change under

different scenarios?"



Photograph: bplanet. FreeDigitalPhotos.net

This project aims to develop standardised national tools, survey protocols, data collection and analysis systems to investigate the price and household affordability of current (unhealthy) and healthy (recommended) diets in select locations in Australia including the ACT to help inform fiscal and health policy decisions.

Methods

In December 2013 a teleconference was convened with the 18 key government, academic and non-government stakeholders active in food price monitoring in Australia; all provided support-in-principle for the development of standardised Australian methods consistent with the optimal INFORMAS approach.6

Draft fortnightly diet baskets have been developed for five different household structures reflecting healthy (recommended) diets based on the National Health and Medical Research Council (NHMRC) Foundation Diets¹⁵ and reflecting current (unhealthy) diets, based on the early nutrition results of the Australian Health Survey (AHS) 2011-12.2 During the pilot study in Brisbane in late 2014, these tools were used to collect the price of healthy and current diets from major supermarkets, take-away outlets and liquor stores in a high and a low socio-economic (SES) area.

The median household disposable income and the indicative income of low income families in both areas were calculated using published government data¹⁶ and on-line estimators.¹⁷ The prices of the healthy and current (unhealthy) diet baskets were tallied and compared. The results were used to model price impacts under potential fiscal policy changes.11

Are healthy diets in the ACT really more expensive than current, unhealthy diets? A new project is underway to find out... (continued)

Results

The pilot study has been submitted to a peer reviewed journal, so it is therefore not possible to provide the full results in this publication at this time. The draft tools performed well at household level, but the accuracy of the current (unhealthy) diet basket tool at individual level should be able to be improved by using the dietary confidential unit record files (CURFs) now available from the AHS 2011-12.²

In summary, the findings of the pilot study suggested that, at both high and low SES areas in Brisbane, households spend more purchasing current (unhealthy) diets than required to purchase healthy (recommended) diets. Worryingly, the majority of the food dollar (up to 58 percent in some households) is being spent on discretionary choices, with a high proportion on take-away foods and alcoholic drinks (around 16 percent and 14 percent respectively). The pilot study showed that, depending on household structure of low income families, a healthy diet (i.e. a diet consistent with the Australian Dietary Guidelines) currently costs between 20 and 31 percent of the disposable income of low income families; however under the proposed changes to extend the GST to basic healthy foods, a healthy diet would become unaffordable for many low income households.

Pilot results suggest that more could be done to communicate that healthy diets can be less expensive than current (unhealthy) diets in Australia. However results also suggest that factors such as taste/desirability, convenience, advertising, accessibility and availability may be as important as price in determining current food choices.



Photograph: Food markets. Visit Canberra

Next steps

Methods will be refined using the AHS 2011-12 CURFs and tested further. Then a workshop with all interested national stakeholders will be held to seek agreement on the adoption of standardised methods

Standardised tools and protocols will be used to collect food price data in the ACT later this year. Results will be made available to policy makers.

Acknowledgements

This research is supported by The Australian Prevention Partnership Centre through the NHMRC partnership centre grant scheme (Grant ID: GNT9100001) with the Australian Government Department of Health, NSW Ministry of Health, ACT Health, HCF, and the HCF Research Foundation. Thank you to Sarah Kane, Elizabeth Good, Mathew Dick and Rebecca Ramsay for their assistance during the pilot study.

- National Health and Medical Research Council (2013) Australian Dietary Guidelines. Canberra: National Health and Medical Research Council. ISBN Online: 1864965754
- Australian Bureau of Statistics (ABS 2014) Australian Health Survey: Nutrition First Results - Foods and Nutrients, 2011-12. http://www.abs.gov.au/ausstats/abs@.nsf/Lookup/4364.0.55. 007main+features22011-12 accessed July 2015
- 3. Institute for Health Metrics and Evaluation. Global Burden of Disease Country Profile Australia, 2013. https://www.health-data.org/sites/default/files/files/country_profiles/GBD/ihme_gbd_country_report_australia.pdf accessed July 2015.
- Swinburn B, Sacks G, Vandevijvere S et al, INFORMAS (International Network for Food and Obesity/non-communicable diseases Research, Monitoring and Action Support): overview and key principles. *Obesity Reviews*, 2013; 14 (Suppl 1): 1-12.
- 5. Roberto C, Swinburn B, Hawkes C et al. Patchy progress on obesity prevention: emerging examples, entrenched barriers, and new thinking. *Lancet* 2015.
- Lee A, Mhurchu CN, Sacks G, et al. Monitoring the price and affordability of foods and diets globally *Obes Rev* 2013;14 (Suppl 1):82-95.
- Barosh, L, Friel, S, Engelhardt, K et al. The cost of a healthy and sustainable diet - Who can afford it? ANJJPH 2014; 38:7-12.
- 8. Thow AM, Downs S, Jan S. A systematic review of the effectiveness of food taxes and subsidies to improve diets: understanding the recent evidence. *Nutr Rev.* 2014:72: 551-565.
- 9. Harrison M, Lee AJ, Findlay M et al. The Increasing Cost of Healthy Food, *ANZJPH* 2010; 34 (2): 179-186.
- Pollard CM, Savage V, Landrigan, T et al. Food Access and Cost Survey 2013 Department of Health, Perth, Western Australia, 2015. http://www.public.health.wa.gov.au/cproot/4115/2/ Food%20Access%20and%20Costs%20Survey%202010.pdf accessed July 2015.
- 11. Sachs G. Adding GST to fresh food is a recipe for poor health, *The Conversation* 27 May 2014 http://theconversation.com/adding-gst-to-fresh-food-is-a-recipe-for-poor-health-27120 accessed July 2015.
- Dietitians Association of Australia Vulnerable groups at risk if a GST on fresh food goes ahead http://daa.asn.au/wp-content/ uploads/2011/03/Vulnerable-groups-at-risk-if-GST-on-freshfoods-goes-ahead-FINAL.pdf accessed July 2015
- 13. Australian Government. Re:think, Tax discussion paper. Better tax system, better Australia. March 2015 http://bettertax.gov.au/publications/discussion-paper/accessed July 2015.
- 14. Hawkes C. Food taxes: what type of evidence is available to inform policy development? *Br Natl Found Nutr Bull* 2012; 37: 51–56.
- 15. National Health and Medical Research Council, A Modelling System to Inform the Revision of the Australian Guide To Healthy Eating. Canberra: National Health and Medical Research Council, 2011. https://www.eatforhealth.gov.au/sites/ default/files/files/public_consultation/n55a_dietary_guidelines_food_modelling_111216.pdf, accessed July 2015.
- Australian Bureau of Statistics. Household income and income distribution Australia. http://www.ausstats.abs.gov.au/ausstats/subscriber.nsf/0/B0530ECF7A48B909CA257B-C80016E4D3/\$File/65230 2011-12.pdf accessed July 2015.
- 17. Australian Department of Family Services. On line rate estimators http://www.humanservices.gov.au/customer/enablers/online-estimators accessed July 2015.

Promoting healthy eating to disadvantaged populations

Rosemary Urquhart, ACT Health Promotion Grants Program, Population Health Division

Although the ACT has a high overall level of socioeconomic advantage, there are disadvantaged groups that are more likely to have poorer nutrition due to their disadvantage. These groups include culturally or linguistically diverse communities, Aboriginal and Torres Strait Islanders, socioeconomically disadvantaged groups and people living with chronic disease.

The reasons for poorer nutrition are diverse and can include financial pressures, time poverty and environments that do not support healthy lifestyles.^{3,4}

Whole of population programs and campaigns can be expected to still impact positively on disadvantaged groups. Nevertheless, for disadvantaged groups, nutrition education activities are more likely to be successful when they include opportunities for practical application and are delivered in a familiar environment among peers.⁵

The ACT Health Promotion Grants Program (the Program) enables the government to work in partnership with the non-government sector to respond to the needs of those whose health is poorest and who are most likely to miss out on opportunities to be healthy. The Program enables support to be provided to groups that work directly with disadvantaged populations, to develop and deliver tailored programs to meet the needs identified by individual groups.

The following pages include two case studies of programs that work to promote healthy eating to disadvantaged populations:

The case study from Companion House is an excellent example of this type of approach where the needs of the community have shaped the resulting program.

The School Kids Intervention Program (SKIP) case study illustrates the development of a specific strategy to manage the very complex problem of obesity in children. It addresses the varied needs of those families, which include some of the most disadvantaged in our community.

- Tieleman L. Health and nutrition in Australia. Future Directions International, 10 June 2014 http://www.futuredirections.org.au/publications/food-and-water-crises/1733-health-and-nutrition-in-australia.html accessed July 2015.
- ACT Health. Australian Capital Territory Chief Health Officer's Report 2014, Canberra: ACT Government, 2014.
- 3. Darmon N, Drewnoski A. Does social class predict diet quality? *Am J Clin Nutr* 2008; 87(5): 1107-17.
- Rosier K. Food insecurity in Australia: What is it, who experiences it and how can child and family services support families experiencing it? Australian Institute of Family Studies, 2011 https://aifs.gov.au/cfca/publications/food-insecurity-australia-what-it-who-experiences-it accessed July 2015.
- Bateup K, Brown L, Elliston L et al. Delivering nutrition education activities within defined ACT communities. Nutrition Australia, ACT Division. http://www.nutritionaustralia.org/sites/default/files/Delivering%20Nutrition%20Education%20Activities%20within%20 Defined%20ACT%20Communities.pdf accessed July 2015.



Healthy Futures: gardens, healthy eating and getting active

In 2014, Companion House received a grant from the ACT Health Promotion Grants Program, to carry out three years of health promotion work with communities on nutrition and keeping active. Companion House works with refugees and asylum seekers, survivors of torture and trauma, and those who have fled persecution in their home countries. We provide this support through medical and counselling services, community development, health promotion, training, capacity building and migration advice services.

Consultations conducted over the 2012-2014 period with community members identified a number of challenges. These challenges included engaging children in sport, increasing parents' capacity to engage in physical activity, developing healthy family routines, and improving understanding of nutrition and food in the Australian context.

Clinical evidence from the Companion House medical service identified: high levels of social isolation of families who care for multiple children; postnatal depression; inadequate diets of young children who are siblings of newborn babies; excessive screen time among children; and a lack of physical activity. Clinical evidence had also identified increasing rates of diabetes and obesity in target communities.

To address these issues, the three year project "Healthy Futures: Gardens, Healthy Eating and Getting Active" has four focus areas.

The Happiness Garden

The Happiness Garden aims to increase exercise, access to fresh and healthy food and social connections. In consultations, we found gardening a successful strategy for promoting health in communities from Myanmar, many of whose members come from rural areas. Most have experienced traumatic displacement and many have subsequently lived in refugee camps for years. After migrating to Australia, they now live in a city environment without land to grow food and lack knowledge about cultivating plants in the Canberra climate.

Companion House leases plots from Flamen Nominees at Pialligo on an annual basis, with 28 families currently securing garden plots. These families come from diverse Burmese communities (Mon, Karen, Chin, Rakhine and Kachin/Burmese). The project includes training sessions on composting, gardening, watering and using machinery. Rodney's Plants at Pialligo have supported the project with donation of seeds.

One benefit of the project is that participants can have fresh vegetables to eat and share with other community members. It also allows people to gain fitness by working in the garden. In addition, the project fosters family and community cohesion. Parents and grandparents bring children to the garden, and families from different communities, language and faith backgrounds mix happily together. Several families have reported that meeting with other community members has been an important motivator to join the gardening project. As well as participating in regular meetings with the project worker and trainers, participants can access their plots at any time during the day. As one of them put it: "I am happy to be in the garden, when I am worried, I come to the garden and work and I feel happy and good."

Photographs: Gardening. Fresh Tastes Strategy, ACT Health and Public Health Image Library





Men's activities

Companion House has developed a men's exercise program, targeting men from Tamil speaking communities, but including others as well. This program has gained momentum over time, with activities increasing from fortnightly to weekly at the request of participants.

Activities have included swimming, cricket, badminton, tennis, and bushwalking. Cricket and badminton are culturally familiar to many in the group and have been very popular. Tennis was a new activity for most, but proved very popular when it was offered weekly over a ten week period. Tap water is used at all activities and reference is made to its benefit as opposed to other drinks, and fruit and other healthy food choices are made available.

There are 23 men registered to the program, with more people having indicated interest. Some participants have gone on to join community cricket teams; others regularly borrow Companion House cricket equipment for their own use.

The program makes time at the end of each session for discussion. All participants report that they have increased their activity levels since starting the program. Several participants report other important incidental benefits related to social connection and mental wellbeing: "my mind has relaxed," "I am happy to come to see other people" "I also improve my English".

Case Study

Healthy Futures: gardens, healthy eating and getting active (continued)

Parents' Groups

Following wider community consultations, parents' groups have also been established. Small groups provide a supportive setting for open discussion of challenges involving exercise or nutrition. One parents' group, for example, included five women from Iran and Afghanistan. They combined sessions in a gym on Friday afternoons (with crèche at gym, and an instructor in each class) with discussions on health and nutrition for themselves and their children.

These were opportunities for talking about basic strategies for keeping active in a daily setting, and the benefits for physical and mental health and stress management. The nutrition discussion using resources from Nutrition Australia and the Red Cross, focused on topics such as what to put in children's lunch boxes, and maximising consumption of fruit and vegetables. Parents looked at sugar content of commonly consumed drinks and food, and shared challenges they faced.

Women's activities

In consultations, mothers and daughters, who attend Companion House, indicated they would like to swim together. A total of 35 women and girls registered and participated in ten weekly sessions, including swimming lessons and water safety. Participating in this program was a big step for many of these women; many reported it was the first time they had been in a pool. Some women reported feeling safer in the water, and many reported that they could now swim with more confidence. Women reported that they would like to continue swimming as a lifestyle choice now they had discovered it and had learned how to swim safely. The participating pool indicated it will now open for a women's only time for the first time.

In addition to these activities, Companion House is starting the third year of another ACT Health funded health promotion program, Nutrition and Exercise. This is a complementary program that includes new mothers' groups, nutrition and exercise classes, family activities and women's activity groups across a range of communities.



Case Study

SKIP – Improving the health and wellbeing of children with overweight or obesity

One in four ACT children aged 5 to 17 years is overweight or obese,¹ presenting a serious challenge for the ACT Government. Childhood obesity has been linked with wide-ranging physical, social and psychological consequences. Physical complications include increased risk of cardiovascular dysfunction, endocrine issues including Type 2 diabetes, and pulmonary, gastroenterological, neurological and orthopaedic complications.²⁴ Obesity has been linked with feelings of sadness, loneliness and nervousness.⁵ Obesity is also associated with undesirable stereotyping including perceptions of poor hygiene, low intellect and laziness^{6,7} and difficulty with social interactions.⁸ Attitudes toward individuals who are obese have been labelled "the last socially acceptable form of prejudice".⁹

In 2011-12, ACT Health's Obesity Service Redesign Project undertook an extensive review of current best practice and existing services provided by Canberra Hospital and Health Services for people with obesity. The review concluded that there was no specialist-led multi-disciplinary obesity service, no public psychology service, and limited ACT Health exercise programs for larger children. Although there were some discipline-specific services for overweight and obese children, a need was identified for a more coordinated approach to integrate existing services.

There is evidence that multi-component behavioural lifestyle interventions can lead to reductions in overweight and obesity in children and adolescents. The School Kids Intervention Program (SKIP) commenced in February 2015 and is designed to address the gap in childhood obesity management in the ACT through the provision of an integrated, multidisciplinary service for overweight and obese children aged four to 12 years and their families. Client care is delivered in two phases. Phase One is a 12-week intensive program and Phase Two is a maintenance program provided between three and 12 months. Children are eligible for SKIP if they have a Body Mass Index (BMI) over the 95th percentile for age and gender, or BMI greater than the 85th percentile with comorbidities.

SKIP is guided by the evidence and principles outlined in the National Health and Medical Research Council Clinical Practice Guidelines for the Management of Overweight and Obesity in Adults, Adolescents and Children in Australia. In particular, it is family-centred, culturally appropriate and includes frequent contact with a team of skilled health professionals including a paediatric specialist or registrar, dietitian, exercise physiologist and psychologist. The key focus is lifestyle modification, not weight loss or maintenance. The program targets eligible children at increased risk of obesity including Aboriginal and Torres Strait Islander people, socioeconomically disadvantaged groups and individuals born overseas.

Evaluation data is being collected on: SKIP referral numbers; occasions of service (OOS); key medical, dietary and exercise parameters; and client satisfaction. Between February and May 2015, SKIP received 27 referrals through various referral pathways, including from paediatricians (52 percent), general practitioners (four percent), health professionals (15 percent), schools (seven percent) and families (22 percent). To date, SKIP has seen 10 families and registered 84 OOS. There are currently 16 families on the SKIP waiting list. Of total referrals, 19 percent of families are known to Care and Protection Services, 11 percent identify as Aboriginal and Torres Strait Islander and 33 percent are from a culturally and linguistically diverse background.

Treating childhood obesity is a major strategy for reducing mortality and morbidity later in life. Actions to reduce obesity have the capacity to improve the health of the community and reduce the demand on ACT public health services in the future. Preliminary data indicates a strong demand for a child obesity service in the ACT. Further data collection is required to demonstrate service effectiveness.

SKIP is run by ACT Health, Women, Youth and Children Division and is based at Belconnen Community Health Centre every Thursday.

Referrals are accepted from health professionals, community agencies, schools and families. Further information can be found at www.health.act.gov.au/SKIP or by contacting the SKIP Clinical Coordinator at SKIP@act.gov.au.

- ACT Health. Australian Capital Territory Chief Health Officer's Report 2014, Canberra: ACT Government, 2014.
- 2. Waters E, De Silva-Sanigorski A, Hall BJ et al. Interventions for preventing obesity in children. *Cochrane Database of Systematic Reviews* 2011; Issue 12.
- 3. Lobstein T, Bauer L, Uauy R. Obesity in Children and Young People: a crisis in public health. *Obesity Reviews*, 2004; 5 (Suppl 1): 1-104.
- 4. Wadden TA. Brownell KD, Foster GD. Obesity: Responding to the global epidemic. *Journal of Consulting and Clinical Psychology* 2002; 70 (3): 510-525.
- 5. Strauss, R. Childhood obesity and self-esteem. *Paediatrics* 2000;105: e15.
- 6. Hill A, Silver E. Fat, friendless and unhealthy 9 year old children's perception of body shape stereotypes. *International Journal of Obesity and Related Metabolic Disorders* 1995; 19: 423-430.
- 7. Wardle J, Cooke L. The impact of obesity on psychological wellbeing. *Best Practice and Research Clinical Endocrinology and Metabolism* 2005;19(3): 421-440.
- 8. Smallfield S & Anderson AJ. Using afterschool programming to support health and wellness: a physical activity engagement program description. *Early Intervention Special Interest Section Quarterly* 2009;16(3); 1-4.
- 9. Stunkard A, Sorensen T. Obesity and socioeconomic status a complex relation, *New England Journal of Medicine* 1993; 329: 1036-1037
- 10. Yaxley J, Dugdale P. Canberra Hospital and Health Services Obesity Service Redesign Issues Paper. ACT Health, Canberra 2011.
- 11. Luttikhuis HO, Baur, L, Jansen, H et al. Interventions for treating obesity in children, *Cochrane Database of Systematic Reviews* 2009 Jan 21;(1):CD001872. doi: 10.1002/14651858.
- 12. National Health and Medical Research Council. Clinical Practice Guidelines for Management of Overweight and Obesity in Adults Adolescents and Children in Australia. Melbourne: National Health and Medical Research Council, 2013.

Nutrition Support Service

Romy Doherty, Nutrition Australia ACT

The ACT Nutrition Support Service (ACTNSS) was launched in March 2015. It aims to encourage a sustainable change towards the provision and promotion of healthy food across programs and services in the ACT community.

The ACTNSS website serves as a hub of nutrition information for individuals and organisations, providing a range of nutrition related resources, such as recipes, meal planning ideas, and fact sheets. Individuals and organisations can also subscribe to weekly and quarterly nutrition e-newsletters.

Free access to nutrition advice is available via email or phone to individuals and organisations. In addition, organisational staff that subscribe to the service are offered the opportunity to attend free nutrition professional development sessions.

Targeted community events are used to promote good nutrition and healthy cooking as well as promoting and encouraging use of the service. The success of the program will be measured by evaluating changes in the promotion of nutrition and healthy foods within programs and services of organisations and individuals that have accessed ACTNSS.

Introduction

The ACT Nutrition Support Service (ACTNSS) is a three-year project to support healthy eating across the ACT. It has been developed by Nutrition Australia ACT (NAACT) and funded by the ACT Health Promotion Grants Program.

Aligning with the ACT Government's *Towards Zero Growth: Healthy Weight Action Plan*, the ACTNSS aims to improve health outcomes for the ACT population through the implementation of food and nutrition policies, programs and education. Specific objectives are to:

- increase the capacity of identified sector-specific organisations to promote healthy food choices, including within their respective food outlets;
- implement evidence-based healthy nutrition policies and guidelines; and
- increase capacity, knowledge and skills regarding the provision and promotion of healthy food and drinks within their settings.

Target sectors

The ACTNSS will, over time, target six sectors:

- non-government and community organisations;
- non-government workplaces;
- early childhood services and outside school hours care;
- primary and secondary schools;
- · disability support services; and
- senior support services.

Services provided

Website

A website has been developed to provide a user friendly hub of information - http://www.actnss.org/. It includes fact sheets, healthy recipes and practical meal planning ideas and serves as a one-stop-shop for the ACT community by providing general consumer nutrition information in a user-friendly format. The website also houses information about local food and nutrition-related news and events, including staff professional development opportunities within each of the target sectors.

Organisations and individuals within the target sectors can access resources such as menu planning and nutrition policy templates to help implement healthy eating practices within their areas of operation.

Subscription

Organisations and individuals that subscribe to the ACTNSS receive free weekly e-newsletters *News Bites* containing general nutrition information. Sector specific e-newsletters *Better Bites* are distributed quarterly providing guidance on healthy food choices and management of nutrition issues.

Helpline

General nutrition advice is offered to individuals and organisations via an email and phone helpline. The ACTNSS also provides recommendations and a referral path for access to nutrition presentations, cooking demonstrations or training for groups.

Professional development

Professional development is offered to organisations with the aim of improving the nutrition knowledge and skills of staff in the target sectors. Emphasis is placed on the importance of implementing a food and nutrition policy within programs and services, to encourage and promote a healthy eating environment. These sessions are complimentary to ACTNSS subscribers.

Community events

The ACTNSS also provides cooking demonstrations and nutrition information at targeted community events. These events are further methods for promoting and encouraging use of the service, and nutrition as a priority in the ACT community.

The service does not offer ad hoc nutrition sessions to individual groups or organisations, or personalised dietary treatment plans.



Photograph: Homepage of the ACT Nutrition Support Service. Nutrition Australia

Nutrition Support Service (continued)

Achievements

The ACTNSS and website were launched by the ACT Minister for Health, Simon Corbell MLA on 12 March 2015. In launching ACTNSS, Minister Corbell said "by providing a one-stop-shop for community organisations and individuals to access evidence-based nutrition advice, the Nutrition Support Service will help to address the prevalence of overweight and obesity within the ACT."



Photograph: Romy Doherty, Leanne Elliston, Minister for Health Simon Corbell MLA and Lyn Brown at the ACT Nutrition Support Service Launch on 2 March 2015. Nutrition Australia

Since the launch, ACTNSS has received approximately 700 hits to the website each month and, as of 13 August 2015 has over 130 subscribers. Organisations and individuals that subscribe to the ACTNSS receive a weekly e-newsletter - News Bites, containing topical general nutrition information. A range of topics has been included so far, such as: sugar, caffeine, healthy eating behaviours, fibre, legumes, eggs, and the importance of breakfast. Sector specific e-newsletters Better Bites in... (e.g. workplaces) are distributed quarterly, with the childcare and disability sectors being the first sectors to have received their newsletters. The feedback on the usefulness of these e-newsletters has been positive, with a fellow community organisation, Good Sports ACT, promoting the ACTNSS and e-newsletters through its FacebookTM page.

Attendance at community events has been used to promote ACTNSS within the ACT community. Cooking demonstrations and nutrition stands have been held at the 2015 Lifestyle and Retirement Expo, Partners in Recovery Pop-up events and the ACT Council of Social Services Gulanga Program. The Service is also continually promoted through other NAACT programs and services.



Photograph: Cooking demonstration at the ACT Retirement and Lifestyle Expo. Nutrition Australia

Future opportunities for promotion include ongoing advocacy amongst local community organisations and exploring opportunities for working in partnership with a range of like-minded community organisations.

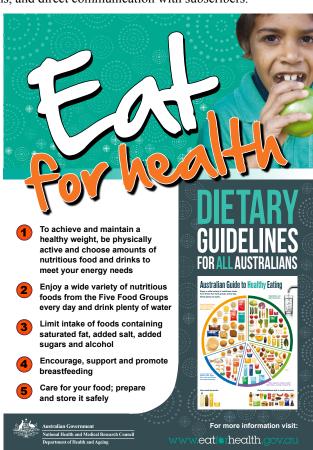
Childcare and disability organisations have received targeted emails promoting the service and encouraging subscription uptake. The response to these emails has had the desired effect of increasing subscription rates. Further targeted emails are planned for the other sectors.

The ACTNSS delivered two free staff professional development sessions in July for the childcare and disability services sectors. These sessions focused on meeting food and nutrition requirements according to relevant national and ACT standards, addressing food and nutrition concerns and developing effective nutrition policies. The feedback from both sessions was resoundingly positive, with all attendees agreeing that the information presented was relevant and useful and provided an opportunity to discuss and receive advice on common nutrition issues.

Since its launch, the ACTNSS has received enquiries via email and phone from the general public and community organisations. Examples of enquiry topics are: suitable snack provision in childcare, suitability of certain food and drinks on the menu, and fundraising food ideas. ACTNSS has also received a large number of enquiries requesting access to nutrition presentations, cooking demonstrations or training for groups.

Evaluation

The success of the program will be measured at the end of the funding period, by evaluating changes in the promotion of healthy eating and the provision of healthy foods within programs and services of organisations and individuals that have accessed ACTNSS. This information will be collected through online surveys, feedback forms, and direct communication with subscribers.



The Health Star Rating – why Australia needed a new front of pack labelling system

Kate Martin and Rebecca Stones, Environmental Health Policy and Projects, Population Health Division

Front of pack labelling (FOPL) is a way of providing easy to understand information on the nutrient content of packaged foods to enable consumers to make better and more informed food purchasing decisions. ^{1,2} A number of countries (e.g. the USA, Canada, Australia, United Kingdom, Sweden) have adopted FOPL systems, with the style, information and scope of application varying considerably.

It is hoped that a flow-on effect of initiatives like FOPL (in conjunction with broader public health messaging and initiatives) will be a general improvement in the population's health and a reduction in the impact of diet-related illness.² This article looks at pre-existing nutrition labelling in Australia and the introduction of the new Health Star Rating FOPL system.

Pre-existing nutrition labelling

In Australia, most packaged food has long been required to have a nutrition information panel (NIP). The requirements for NIPs are detailed in Standard 1.2.8 – Nutrition Information Requirements of the Australia New Zealand Food Standards Code.³ While there are varying requirements for the information that must be displayed on NIPs, standard features include the food's fat, sugar, protein, sodium and energy contents. These must be displayed per 100 grams (or 100 millilitres for fluids) and may also be provided for a serve of the food (a 'serve' being an amount selected by the manufacturer that may not necessarily reflect likely consumption of the product).

NIPs are usually found on the back of packaged foods. NIPs can, however, be difficult to locate. They are often surrounded by a lot of other information (e.g. ingredient lists, allergen statements, health claims, country of origin information, bar codes, etc). Sometimes the NIP is obscured by packaging seams (e.g. under the seam on a chocolate bar wrapper) or is so small it is difficult to read.

The 2011 Labelling Logic review of food labelling law and policy (commissioned by the Australia and New Zealand Food Regulation Ministerial Council) found that, 'while some consumers regularly use the mandated nutrition information on food labels, many consumers either ignore the information or find it difficult to interpret'.⁴ Given the issues outlined above, it is not difficult to see why consumers would struggle to gain meaningful information from NIPs. In this context, it is also important to consider that the consumers at greatest risk of nutrition-related chronic illness (e.g. those of low socio-economic status, the elderly, Aboriginal and Torres Strait Islander people, and people from other culturally or linguistically diverse communities) may be least likely to use, or able to use, the NIP to inform their food choices.⁴

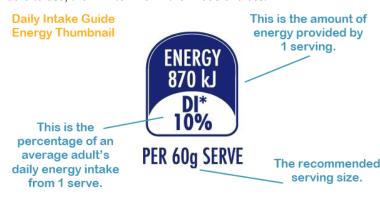


Figure 3: Daily intake Guide Energy Thumbnail. My Daily Intake - www.mydailyintake.net

Industry's FoPL initiative: The %DI System

In November 2006, the Australian Food and Grocery Council launched an industry-developed voluntary FOPL system (known as the Daily Intake Guide, Percent Daily Intake or %DI) with the stated aim of assisting consumers to make better informed food choices. The %DI system uses thumbnail images with information on the amount of energy (kJs) and nutrients (i.e. protein, carbohydrate, sugars, fat, saturated fat and sodium) in a serving of a product, as well as the percentage of daily intake these amounts represent for an 'average' person.

The amount of information provided by the %DI system has been criticised for being visually and numerically complex, and misleading or unrealistic in terms of its suggested serving sizes.³ The %DI system has also been criticised on the basis that many consumers are not the 'average' consumer that the system's percentages reference. As such, the ability of the system to achieve its aim of assisting consumers to 'see the relationship between a serve of food and their daily requirements' has been repeatedly questioned, even by some in the food industry.^{3,4,6}

The Health Star Rating system

For many years, Ministers at the state and federal level with responsibility for health and food matters have recognised the problem of a lack of clear nutrition labelling in Australia. On 4 June 2012, these Ministers agreed through the Australia and New Zealand Ministerial Forum on Food Regulation (FoFR) to develop a FOPL scheme for Australia. This agreement was preceded by the 2011 Labelling Logic review report, which made various recommendations about FOPL, including that the system use traffic light colouring to quickly and simply indicate the healthiness of food. 4

The Ministers' response supported the general premise of FOPL, but not necessarily in the form of a traffic light system. The response stated that, "[g]iven the divergence and passion of views regarding FOPL, the FoFR considers that government is best placed to lead a collaborative process that brings polarised views together to build on existing common ground". In line with this, research and development work for a FOPL system was progressed by the Australian, state and territory governments in collaboration with industry, public health and consumer groups.

On 27 June 2014, the resulting Health Star Rating (HSR) system officially commenced operation. The HSR is a voluntary system that applies to all ready for sale packaged, manufactured or processed foods, with the following exemptions:

- alcoholic beverages:
- formulated products for infants and young children (the content requirements for which are already strictly regulated by the Food Standards Code);
- non-nutritive condiments or foods (e.g. vinegar, herbs, tea, coffee, etc); and
- single ingredient foods not consumed on their own (e.g. flour, gelatine).

Unpackaged foods, such as fresh fruit and vegetables are also exempt.

The HSR system rates the nutrient content of packaged food and assigns it a rating from half a star to five stars. HSRs aim to provide the consumer with a quick and easy way to compare packaged foods, with more stars indicating a healthier choice.⁸

The Health Star Rating – why Australia needed a new front of pack labelling system (continued)



Figure 4: Health Star Rating. Taken from the Health Star Rating System Style Guide, last updated 17 February 2015. http://www.healthstarrating.gov.au/internet/healthstarrating/publishing.nsf/Content/651EEFA223A6A659CA257DA500196046/\$File/HSR%20 Style%20Guide.pdf

The number of stars assigned to a product is determined using the HSR calculator, which assesses positive and 'risk' nutrients in the food. The HSR calculator is based on an algorithm that awards a star rating based on the quantity of specific food components within the product. These components are: energy; saturated fat; sugar; sodium; protein; dietary fibre; fruit, vegetables, nuts and legumes; and for some products, calcium. The star rating for all products is calculated on 100 grams or 100 millilitres of a product, allowing for similar products to be easily compared. 9

The HSR system is not intended to assist consumers to compare different 'types' of food. Rather, it allows a quick comparison to determine the healthier choice among similar food products. For example, the HSR system would allow a comparison between two different milk drinks, but not between a milk drink and a breakfast cereal.

The HSR system also aims to educate consumers about claims on products. For instance, products with a 'low fat' claim often reduce their fat content by increasing their sugar content - the HSR display should be able to indicate the healthfulness of such products in a way that is quick and easy to understand. Previously, the only way to check whether a 'low fat' product was in fact a better choice, was to check the product's NIP (which as previously explained, can be a difficult task for many consumers).

Is the HSR system working?

It is too early to assess the effectiveness of the HSR system. There are limitations to all FOPL systems, and the HSR is no exception. As the HSR system is voluntary, not all companies display HSRs on their products. Over time it is expected that there will be an increase in the number of companies and products that display HSRs. While one of the aims of FOPL is to encourage product reformulation so as to achieve a higher rating, some products (e.g. biscuits, chips, sweetened breakfast cereals) will never be able to significantly improve their rating, and are thus unlikely to use HSRs. Ultimately, only a mandatory system could guarantee comprehensive usage of FOPL on packaged foods.

Despite these issues, the system appears to have been received positively by consumers. An April 2015 survey of 1011 people found a third were aware of the HSR. Two thirds of respondents said they would like to see HSRs on more products and nearly half said they would be highly likely to use HSR if it was displayed on most products. As at the end of June 2015, more than 1000 products in Australia displayed the HSR; this is an increase from around 200 products in January 2015¹⁰ (but a small proportion of the 25,000+ product lines generally stocked by major supermarket chains). In

Members of the Ministerial Forum on Food Regulation have agreed that the Health Star Rating system be reviewed after two years. Monitoring and evaluation of the Health Star Rating system will address three areas:

- label implementation and consistency with the HSR system Style Guide
- consumer awareness and ability to use the HSR system accurately
- nutrient status of products carrying a HSR label. 12

The outcomes of this evaluation should indicate whether or not the system is having its intended impact.

- PriceWaterhouseCoopers. Health Star Rating System Cost Benefit Analysis. May 2014. http://www.health.gov.au/internet/main/publishing.nsf/Content/CF7E670597F383AD-CA257BF0001BAFF5/\$File/Health%20Star%20Rating%20 Cost%20Benefit%20Analysis%20Report.pdf. accessed June 2015.
- World Health Organisation information meeting on Frontof-Pack Nutrition Labelling. http://www.who.int/nutrition/ events/2013_FAO_WHO_workshop_frontofpack_nutritionlabelling_presentation_L'Abbe.pdf accessed 23 June 2015.
- Australian Food News. Leading consumer group slams cereal makers. April 29 2009. http://ausfoodnews.com. au/2009/04/29/daily-intake-guide-criticism-misleading-afgc. html. accessed June 2015.
- Blewett, N, Goddard, N, Pettigrew, S et al. Department of Health. Labelling Logic: Review of Food Labelling Law and Policy. January 2011. http://www.foodlabellingreview.gov.au/internet/foodlabelling/publishing.nsf/content/48C0548D80E715BCCA257825001E5DC0/\$File/Labelling%20Logic 2011.pdf accessed June 2015.
- Australian Food & Grocery Council. Daily Intake Labelling. http://www.afgc.org.au/key-projects/daily-intake-labelling/accessed June 2015.
- Saxelby, C. 2013. %DI Labelling what does it mean? http:// foodwatch.com.au/blog/additives-and-labels/item/di-labelling-what-does-it-mean.html accessed June 2015.
- Legislative and Governance Forum on Food Regulation. Response to the Recommendations of Labelling Logic: Review of Food Labelling Law and Policy (2011). http://www.food-labellingreview.gov.au/internet/foodlabelling/publishing.nsf/content/ADC308D3982EBB24CA2576D20078EB41/\$File/FoFR%20response%20to%20the%20Food%20Labelling%20Law%20and%20Policy%20Review%209%20December%202011.pdf accessed July 2015.
- Department of Health. Australia and New Zealand Food Regulation Ministerial Council Front of Pack Labelling Policy Statement.
 October 2009. http://www.health.gov.au/internet/main/publishing.nsf/Content/5B22CD801E3B06F0CA257B-F0001C6BC8/\$File/Policy-Statement-Front-of-Pack-Labelling.pdf accessed
- Commonwealth of Australia, Health Star Ratings Frequently asked questions. http://healthstarrating.gov.au/internet/healthstarrating/publishing.nsf/Content/frequently-asked-questions-industry accessed June 2015.
- Commonwealth of Australia. Australia and New Zealand Ministerial Forum on Food Regulation Communique. http://www.health.gov.au/internet/main/publishing.nsf/Content/foodsecretariat-communiqu%C3%A9s-15_3Jul accessed July 2015.
- Australian Competition & Consumer Commission, Report of the ACCC inquiry into the competitiveness of retail prices for standard groceries. https://www.accc.gov.au/system/files/ Grocery%20inquiry%20report%20-%20July%202008.pdf accessed July 2015.
- 12. Commonwealth of Australia. Health Star Rating System Frequently Asked Questions What Monitoring activities will be taking place? http://healthstarrating.gov.au/internet/healthstarrating/publishing.nsf/Content/frequently-asked-questions-consumers accessed July 2015.

Front of pack labelling in other countries

The United Kingdom

In 2005, the United Kingdom (UK) Food Standards Agency (FSA) Board agreed to develop new ways of helping consumers to understand food safety and protect public health. Following community consultation and research, companies began displaying nutritional information in a front of pack display. Different display formats were used by different companies, which made assessing the nutritional information difficult for consumers.

In 2013, in response to this labelling problem, the UK Department of Health announced a consistent front of pack labelling scheme for the UK.² The consistent system combines red, amber, green colour-coding (i.e. traffic lights) and nutritional information to show how much fat, saturated fat, salt and sugar, and calories are in food products. The system is voluntary, however if a food business wishes to use Front of Pack labelling (FoPL), it must comply with the FSA's system.³

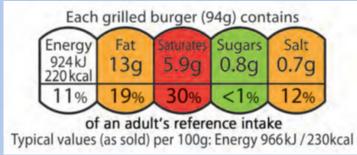


Figure 5: Front of Pack labelling - United Kingdom. Taken from Food Standards Agency, Guide to creating a front of pack nutrition label for pre-packaged products sold through retail outlets http://www.food.gov.uk/sites/default/files/multimedia/pdfs/pdf-ni/fop-guidance.pdf

The Nordic Keyhole

The Keyhole has been used for 25 years in Sweden as a symbol to indicate foods that contain less fat, sugar and salt, and more dietary fibre than similar foods without the symbol.⁴ The Keyhole is marketed as an easy to understand system that allows consumers with minimal knowledge about nutrition to make healthier choices. Use of the Keyhole has now extended beyond Sweden to Norway, Denmark and Iceland.



Figure 6: The Nordic Keyhole. Norway. Nordic Council http://www.norden.org/en

The aim of the symbol is to encourage consumers to identify and make healthier food choices, and to encourage businesses and industry to reformulate foods to meet Keyhole criteria. All fresh fruits, vegetables, fish and lean meat must display the Keyhole.⁵ For other foods, the system is voluntary. However, any food carrying the Keyhole must meet certain criteria with respect to the amount of fibre, salt, sugar, fat and saturated fat that may be present in their food groups.⁶ Foods containing artificial sweeteners are ineligible to display the Keyhole.⁷

- 1. British Market Research Bureau, Citzens' forums on Food: Front of Pack (FoP) Nutrient Labelling. http://webarchive.nationalarchives.gov.uk/20131104005023/http://www.food.gov.uk/multimedia/pdfs/citforumfop.pdf accessed June 2015.
- Department of Health, United Kingdom. Final design of consistent nutritional labelling system given green light. June 2013 https://www.gov.uk/government/news/final-design-of-consistent-nutritional-labelling-system-given-green-light accessed June 2015.
 Food Standards Agency, United Kingdom. Guide to creating a front of pack nutrition label for pre-packaged products sold through
- Food Standards Agency, United Kingdom. Guide to creating a front of pack nutrition label for pre-packaged products sold through retail outlets. 2013. https://www.gov.uk/government/uploads/system/uploads/attachment_data/file/300886/2902158_FoP_Nutrition 2014.pdf accessed July 2015.
- 4. The Nordic Council of Ministers, About the Keyhole. http://www.norden.org/en/nordic-council-of-ministers/council-of-ministers/nordic-council-of-ministers-for-fisheries-and-aquaculture-agriculture-foodstuffs-and-forestry-mr-fjls/keyhole-nutrition-label/about-the-keyhole accessed June 2015.
- 5. The Nordic Council of Ministers. Keyhole Milestones. http://www.norden.org/no/tema/nordic-nutrition-recommendation/keyhole-nutrition-label accessed June 2015.
- 6. The Norwegian Food Safety Authority and The Norwegian Directorate of Health, Keyhole Factsheet, 28 April 2010, http://www.nokkelhullsmerket.no/frontpage_en/article427.ece/binary/Fact%20sheet%20about%20the%20Keyhole accessed June 2015.
- 7. Lagestrand Sjölin, K. Nordic keyhole Experience and challenges Sweden, Norway, Denmark, Iceland. 2013. http://www.who.int/nutrition/events/2013_FAO_WHO_workshop_frontofpack_nutritionlabelling_presentation_Sjolin.pdf accessed July 2015.

The balancing act: Addressing acute food safety risks vs the risks of chronic poor nutrition

Kate Martin and Rebecca Stones, Environmental Health Policy and Projects, Ingrid Coote, Health Promotion, Population Health Division

The ACT has recently implemented significant legislative changes to the way non-profit community organisations selling food for fundraising are regulated under the *Food Act 2001* (the Food Act).

Such organisations are now, in most cases, completely removed from the operation of the Food Act. In opting for such a bold deregulatory path, policy makers had to consider the acute risk that is posed by foodborne illness and balance this against the long-term risks of a food environment with limited healthy options. This article explains the changes that have come into effect, the rationale behind them, and the impact they are beginning to have on the community sector. It also describes efforts aimed at striking the balance between encouraging the consumption of healthy food and ensuring food safety.

Food safety in the ACT is governed by the *Food Act 2001* the Food Act), the Food Regulation 2002 and the Australia New Zealand Food Standards Code. Together, these laws aim to ensure that food sold in the ACT is safe and suitable for consumption.

Food safety versus healthy options

Prior to November 2013, community organisations wishing to sell food that required temperature control (e.g. salads, rice, dairy) were required to register with the Health Protection Service (HPS) and appoint a trained food safety supervisor to provide food safety advice and oversight to the organisation. Anecdotal feedback indicated that these requirements resulted in many community organisations choosing not to sell such food, instead opting to sell pre-packaged food items that did not incur such regulatory burden. Those that did choose to sell food that requires temperature control found it financially and administratively challenging to meet the regulatory requirements.

Based on feedback from these organisations on the impacts of the laws, an exemption from the food safety supervisor requirement was given in November 2013 to community organisations that sold food immediately after thorough cooking (e.g. barbequed foods such as sausages, steaks and skewer kebabs). The reason these foods qualified for an exemption is that they are sold directly after thorough cooking, thereby minimising the risk of foodborne illness.



Photograph: Barbecue. tiverylucky. FreeDigitalPhotos.net

Providing an exemption from the food safety supervisor requirement minimised the burden on these community organisations while increasing the types of food they could sell. However, the criteria for qualifying for the food safety supervisor exemption also inadvertently encouraged the sale of nutritionally poor foods. This outcome conflicted with various ACT Government policies aimed at increasing the availability and consumption of healthy foods (in particular the *Towards Zero Growth: Healthy Weight Action Plan*).¹

Cutting the red tape

To address this policy conflict, the health promotion and regulatory areas of ACT Health met to discuss options for balancing the acute risks of food safety with the long-term risks of poor nutrition. After much debate, research and consultation, the policy decision was made to remove non-profit community organisations selling food for fundraising purposes from the operation of the Food Act. In April 2015, amendments to the Food Act commenced, bringing this change into effect. It should be noted that the exemption from the Food Act does not apply to community organisations that operate on a commercial scale or primarily sell food as a service. For example, school canteens that are run to provide a service to students and staff are still covered by the Food Act and are required to have a food safety supervisor.

In practical terms, the changes mean eligible community organisations are no longer required to register their food business or have a food safety supervisor. There are also no restrictions on the types of food they can sell.

But what about food safety?

During the development of the new laws, concerns were raised that such deregulation may increase foodborne illness associated with unsafe food handling. In response to this concern, it was argued that while eligible organisations would no longer be subject to regulation under the Food Act, they would still be responsible for ensuring the safety of their food. If they were to sell unsafe food, the organisation may be responsible for serious illness or death and may be charged under criminal law.

As an additional safeguard, however, the Minister for Health was given the power to declare certain events to be regulated. This would require anyone selling food at a declared event to be registered under the Food Act. The intent of this clause was to enable the regulation of food sold at large public gatherings (such as the National Multicultural Festival) where the potential impacts of unsafe food handling are significant.

To assist community organisations to provide safe food to the community, the HPS has developed a variety of food safety resources, such as posters on hand washing and safe food handling. Additionally, all community organisations are encouraged to utilise free online food safety training that provides general food safety knowledge and practices for safe food handling.



Photograph: Hand washing. FrameAngel. FreeDigitalPhotos.net

The balancing act: Addressing acute food safety risks vs the risks of chronic poor nutrition (continued)

The impact of deregulation on the *Healthy Food@Sport* Initiative

In 2011, the *Healthy Food@Sport* initiative commenced to increase the availability of healthy food and beverages at sporting club canteens, as one response to the rising levels of obesity in the community. The initiative was a partnership between ACT Health, Sport and Recreation Services, and Nutrition Australia ACT, and focused on supporting canteens run by community sports clubs/organisations to increase healthy food and drink choices.

On commencement of the initiative, non-profit community organisations not registered as food businesses were only permitted to sell pre-packaged foods or foods that did not require temperature control. This limited the types of food sporting canteens could sell, making it difficult for canteens to provide healthier options. Most healthy food options, such as fruit salad or sandwiches, require temperature control to keep them safe and were not permitted to be sold by these food businesses. After the exemption for community organisations from certain Food Act requirements was announced in 2013, the canteens were able to sell food directly after cooking. This provided more options for the canteens but still limited the food types able to be sold.

Changes to the Food Act in 2015 allowed sporting canteens to sell any type of food, enabling the preparation and sale of healthier food choices, such as fruit salad and salad sandwiches. The *Healthy Food@Sport* initiative also encouraged sporting canteens to swap packaged foods for healthier options, such as from soft drink to water and from chips to fruit. Participating clubs were provided with food safety information as part of the nutrition support and resources available through *Healthy Food@Sport*, and were referred to the HPS for further information. Sport and Recreation Services arranged for HPS to conduct inspections at a range of ACT Government sportsground canteens to identify upgrades that may be required to ensure compliance with the Food Act.

ACT sporting canteens involved in *Healthy Food@Sport* adopted the National Healthy School Canteen Guidelines (NHSCG)² used by ACT school canteens to help identify and provide an increased range of healthy choices, including meals and snacks made from fresh ingredients. The NHSCG use a traffic light system based on the Australian Dietary Guidelines (Australia's evidence-based recommendations about healthy eating) to classify food and drinks according to their nutritional content. Food and drinks are classified into one of three categories:

- Green (always on the menu) are high in nutrients and low in sugar, fat, salt and kilojoules (energy).
- Amber (select carefully) have some valuable nutrients but considerable amounts of sugar, fat, salt and/or kilojoules.
- Red (not recommended) are low in nutritional value and high in sugar, fat, salt and/or kilojoules.

The *Healthy Food@Sport* initiative has encouraged sporting canteens to promote green foods and reduce the amount of red foods available for sale. During the initiative, a regular newsletter was distributed to sporting clubs to provide information on the provision of healthier options in canteens and included recipes to encourage the consumption of healthy foods.

The *Healthy Food@Sport* initiative ended in 2014. Evaluation of the project showed all ten participating clubs reported positive changes to their menus after their first year of involvement. Three large pilot clubs experienced substantial positive changes over the life of the project. The club experiencing the most positive change had a 56.2 percent reduction in red foods and a 33.1 percent reduction in red drinks (an overall 44.7 percent reduction in red items). No club reported decreases in either customer numbers or canteen profits over the life of the project. Smaller, seasonal clubs and those with regular changes in office bearers experienced more challenges in implementing healthier canteens.³ A number of recommendations for further action have been developed.

The work of *Healthy Food@Sport* is continuing under the Good Sports ACT program run by the Australian Drug Foundation and

funded by the ACT Health Promotion Grants Program. Good Sports ACT will promote healthy food and drink within sports clubs, as well providing support to reduce risks related to alcohol and tobacco use.

Photograph: Healthy Food@Sport menu board. ACT Government



- ACT Government. Healthy Living. http://www.act.gov.au/ healthyliving accessed June 2015.
- 2. Australian Government Department of Health. National Healthy School Canteens: Guidelines for healthy foods and drinks supplied in school canteens. Canberra: Commonwealth of Australia, 2014. http://www.health.gov.au/internet/main/publishing.nsf/Content/5FFB6A30ECEE9321CA257BF-0001DAB17/\$File/Canteen%20guidelines.pdf accessed August 2015.
- 3. ACT Health: Evaluation Report Healthy Food at Sport (Draft). Unpublished, 2015.



Fresh Tastes: healthy food at school

Nicole Coyles, Helen Skeat, Ingrid Coote, Health Promotion, Population Health Division

Australian children aged five-16 years consume 32 percent of their total energy needs during school hours through meals, snacks and drinks. Schools are therefore an important setting for the supply of healthy food and drinks and for promoting healthy eating.

The ACT Government has supported schools to provide students with healthy food for many years. This support has broadened over time from an initial accreditation system for school canteens to a whole of school approach. The current ACT Health *Fresh Tastes: healthy food at school* (Fresh Tastes) service was developed to support all ACT primary schools to help make healthy food and drink part of everyday life. The Fresh Tastes service is in much demand with over forty primary schools having joined so far. Early results indicate schools are achieving positive changes in their food and drink environment.

A cross government partnership between ACT Health and the Education and Training Directorate under the ACT Government's Healthy Weight Initiative has resulted in the development of the ACT Public School Food and Drink Policy 2015, which requires schools to apply the National Healthy School Canteen Guidelines across the whole school. Fresh Tastes supports schools to implement this new Policy.

Introduction

Australian children aged 5-16 years consume 32 percent of their total energy needs during school hours through meals, snacks and drinks. Schools are therefore an important setting for the provision of healthy food and drinks and for promoting healthy eating. Support for schools, including canteens, to provide a healthy food and drink environment for students is now at its highest ever level in the ACT. Supporting action in schools to promote good nutrition is a priority for the ACT Government. Over the past two years, this has resulted in a number of cross government initiatives and community partnerships that are influencing the food and drink environment in schools – with ACT Health playing a key role.

Supporting canteens

In the past, support for schools to promote good nutrition focused predominantly on school canteens. Under the 2007 ACT Department of Education and Training (DET) School Canteens policy, public schools worked towards gold, silver and bronze canteen accreditation through the DET School Canteens Accreditation system. In 2008-09, ACT Health and DET worked with the ACT School Canteens Association, Nutrition Australia and the Canberra Institute of Technology to develop a training program for school canteen managers based on the emerging traffic light system for classifying food and drink according to its nutritional content. In 2011, the then Chief Minister, Katy Gallagher, announced that all ACT school canteens were to follow the newly released National Healthy School Canteens: Guidelines for healthy foods and drinks supplied in school canteens (NHSCG).3 ACT Health began to fund and actively work with Nutrition Australia ACT to deliver the Healthy Food@School program which provided support to all ACT school canteens to implement the NHSCG.

Internal evaluation outcomes for *Healthy Food@School* in 2013⁴ indicated that focusing on school canteens alone would not make a substantial difference to children's health, as students' food and drinks come from a range of sources, not just canteens. A whole of school approach to food and drink was therefore required.

A whole of school approach

Healthy Food@School was consequently expanded beyond the school canteen to a service called Fresh Tastes: healthy food at school (Fresh Tastes). Fresh Tastes, developed by ACT Health, is a free ACT Government service that supports primary schools to implement a whole of school healthy food and drink culture. This is

done by working with schools across five action areas:

- · food for sale;
- · classroom learning;
- growing food;
- · cooking food; and
- food from home.

Fresh Tastes was launched in February 2014 by the former ACT Chief Minister alongside an announcement to phase out sugary drinks in ACT public schools by the end of 2014.

Over 40 schools currently access the Fresh Tastes service with more coming on board each term. Many ACT schools already teach students about nutrition, work on increasing the proportion of healthy food available on their canteen menus, and use school gardens to give students hands-on growing and cooking experiences. Fresh Tastes supports schools to build on these activities.

Fresh Tastes focuses on primary schools because the evidence for effecting change is strongest in the primary years. When *Healthy Food@School* expanded to Fresh Tastes, high schools and college canteens continued to access support through Fresh Tastes to implement the NHSCG. From 2015-16 all schools will be supported by a new ACT Nutrition Support Service being established as part of the ACT Government's Healthy Weight Initiative. This will be delivered by Nutrition Australia ACT as an additional component of the existing Nutrition Support Service described on page 24.

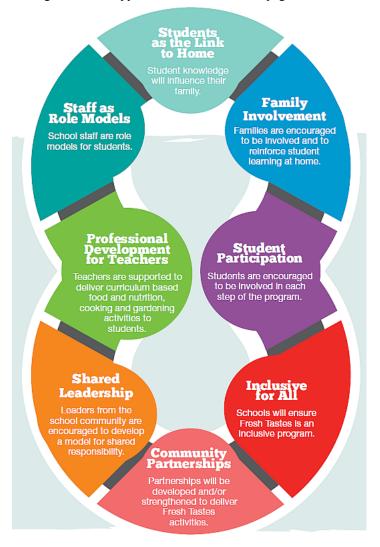


Figure 7: The 8 Fresh Tastes Principles

Fresh Tastes: healthy food at school (continued)



Photograph: Gardening. Fresh Tastes Strategy, ACT Health Partnerships and policy

Fresh Tastes has a strong focus on government, community and business partnerships. It is managed by ACT Health in partnership with the ACT Education and Training Directorate (ETD) and the Catholic Education Office. Local businesses and community organisations have been brought on board to provide services such as training and discounted goods to assist schools to embed a healthy food and drink culture. Partners also help to take Fresh Tastes beyond schools and into the community and students' homes.

A significant milestone this year has been the introduction of the ACT Public School Food and Drink Policy 2015, which has been key to developing a supportive environment to underpin the healthy food work of individual schools. The *Towards Zero Growth: Healthy Weight Action Plan*² provided a framework for a cross-government partnership between ETD and ACT Health during the development of the policy, which drew on the previous work with school canteens.

Through Fresh Tastes, public schools are being supported to implement the ACT Public School Food and Drink Policy 2015. The policy uses the traffic light food classification system developed for the NHSCG. Training is available through Fresh Tastes for school communities to understand and apply the traffic light system to the provision of healthy food and drinks. Canteens are supported to assess and 'green' their menus and schools are encouraged to apply the NHSCG to all school activities involving the provision of food and drinks.

Fresh Tastes also provides support for implementation of relevant parts of the Australian Curriculum. Three of the five Fresh Tastes action areas - Growing Food, Cooking Food and Classroom Learning - provide schools with professional learning for teachers and resources mapped to the Australian Curriculum.

Fresh Tastes continues to support school canteens through the Food for Sale action area. Although canteens are only one source of students' food and drink, they can set the tone for the whole school. Fresh Tastes is developing a guide to assist canteens to implement the NHSCG and other sustainable models for school food services are also being investigated. Other Fresh Tastes action areas also support canteens by educating families and students about good nutrition which can help to increase demand for healthy food and drinks at the canteen.

Positive changes

As part of the Fresh Tastes evaluation, schools are using a reporting matrix that examines shifts in the elements of school culture that influence healthy food and drink practice – such as leadership, readiness for change, communication, environment, knowledge building, partnerships and community involvement. A range of other qualitative evaluation tools are also being used, including regular reviews, case studies and reflective diaries. Fresh Tastes schools complete an audit of their food and drink environment at the beginning of their involvement in the program and will repeat this at the end of their three year term to quantify changes across their school.

Fresh Tastes schools are beginning to see the impact of taking a whole of school approach to improving their food and drink culture. Analysis of menu assessments shows canteens are having success in implementing the NHSCG. Nutrition Australia has reported that in the 50 school canteens that have undergone two menu reviews, 'red' menu items have decreased by 33 percent, while 'green' items have increased by 11 percent. Radford College, Kingsford Smith School, Garran Primary School and Mt Rogers Primary School are Fresh Tastes schools that have developed innovative ways to promote the sale of healthier menu items including taking a staged approach, adjusting pricing to make healthy items more attractive, and providing free tastings of new healthy dishes. More information about their experiences can be found in the case studies on the following pages.

- Department of Health and Ageing: 2007 National Children's Nutrition and Physical Activity Survey – Main findings. Australian Government, 2008. http://www.health.gov.au/internet/main/publishing.nsf/Content/8F4516D5FAC0700ACA257B-F0001E0109/\$File/childrens-nut-phys-survey.pdf accessed July 2015.
- ACT Government: Towards Zero Growth Healthy Weight Action Plan. Canberra: ACT Government, 2013. http://www. health.act.gov.au/sites/default/files/Towards%20Zero%20 Growth%20Healthy%20Weight%20Action%20Plan.pdf accessed July 2015.
- Australian Government Department of Health. National Healthy School Canteens: Guidelines for healthy foods and drinks supplied in school canteens. Canberra: Commonwealth of Australia, 2014. http://www.health.gov.au/internet/main/ publishing.nsf/Content/5FFB6A30ECEE9321CA257BF-0001DAB17/\$File/Canteen%20guidelines.pdf accessed August 2015.
- 4. ACT Health. Evaluation report: Healthy Food@School, Phase One: March 2011 to June 2012. Unpublished, 2013.
- National Health and Medical Research Council. Clinical Practice Guidelines for Management of Overweight and Obesity in Adults Adolescents and Children in Australia. Melbourne: National Health and Medical Research Council, 2013.

Case Study

ACT schools' experience implementing National Healthy School Canteen Guidelines

Since the release of The National Healthy School Canteen Guidelines (NHSCG)¹ in 2011, ACT schools have been making steady improvements to make their canteen menus healthier. ACT Health has worked in partnership with Nutrition Australia ACT (NAACT), Healthy Kids Association and the ACT Council of Parents and Citizen's (P&C) Associations to provide advice and support to school canteens over the past four years.

Canteens run by P&C Associations have been financially supported to join the Healthy Kids Association, which provides them with menu and business advice. They have also received free installation of an online ordering system, FlexiSchools, which can increase canteen sales and efficiencies.

NAACT has played a key role to help ACT schools implement the NHSCG through Canteen Fresh, a canteen support service funded by the ACT Government. Canteen Fresh is one component of *Fresh Tastes: healthy food at school*, and its services include:

- training opportunities for canteen managers, staff and volunteers;
- visits to school canteens to provide individualised advice;
- menu assessments based on the NHSCG with recommendations on making menus healthy;
- regular newsletters;
- resources to supporting healthy food choices in the canteen, including menu display boards, recipes, fact sheets, competitions and incentive programs;
- annual ACT School Canteen Expo bringing canteens together to share experiences and motivate healthy changes; and
- free advice and support for all canteens via a canteen advisory service.

NAACT will continue to provide Canteen Fresh support to schools through a new ACT Nutrition Support Service (ACTNSS), funded by the ACT Government. The ACTNSS web site is http://www.actnss.org/. The following case studies provide an overview of four ACT schools' experience in making healthy changes to their canteen menu.

Garran Primary School

Garran Primary School has around 500 students with a canteen (named "Garralicious") managed by the Parents and Citizen's Association (P&C) committee. The Garran P&C employs a canteen manager to run the canteen five days per week. The Garran Primary School began their healthy canteen journey in 2012 driven primarily by the P&C President who was unhappy with the food being sold at the canteen and was keen to see some healthy improvements to the menu.

In a 12 month period from 2012 – 2013, the percentage of Green menu items increased from 24 percent to 36 percent whilst Red menu items fell from 18 percent to zero red items. This made Garran Primary School one of the first schools in the ACT to successfully remove Red items from the menu.

Some key aspects to the success of Garran Primary School's healthy menu are as follows:

- keeping an open mind to challenges;
- open communication within the school community (students, staff and parents) for menu ideas. This has also contributed to greater community participation;
- acknowledging that the canteen plays a role in supporting the health of the students and their learning;
- welcoming parental support for nutritious and affordable food options;
- introducing attractive packaging and display of healthy menu items;
- offering seasonal variety based on availability of fresh produce;
- taking advantage of NA ACT canteen services including attending workshops, expos and using resources to support healthy canteen choices; and
- receiving several hours of nutrition advice including initial site visit, phone calls and emails that has included recipe nutrition analysis to help develop recipes that meet the nutrient criteria set by the NHSCG.



Photograph: Healthy food options. Garran Primary School

"NAACT really tweaked our interest as to how we can change things from our original menu review"

Garralicious Canteen Manager

ACT schools' experience implementing National Healthy School Canteen Guidelines (continued)

Radford College Junior School - Taste testing for canteen success

Getting everyone on board to support a healthier canteen has resulted in a popular, nutritious range of options for the students at Radford College's Junior School canteen.

After signing up to Fresh Tastes in 2014, Radford's canteen staff attended a menu planning workshop with Nutrition Australia ACT, and investigated ways to market healthier options effectively. They then developed and introduced a new canteen menu – with no Red items.

The Fresh Tastes team sought feedback from families via a parent survey.

"We had our first menu assessment undertaken by Nutrition Australia ACT with good feedback on ways to improve our menu," said Linda Oakman, manager of the Radford Canteen.

Now the school offers a broader range of Green items and limits the number of days on which the Amber items are available.



Photograph: Healthy Lunchboxes display. Radford College

The school found that the changes needed to be supported by other actions, including displaying posters to help educate students about healthy choices. The canteen also deliberately displays the food and drink options in a colourful and attractive way.

"When we introduce a new menu item, such as soup, we endeavour to provide free tastings for students, which has been a successful way to get them to come back to buy that product," said Linda.

"We also deliberately put small healthier items into a cheaper price bracket so it encourages students to purchase these items rather than less healthy options."

Offering Green and Amber categorisation on both the online ordering system, Flexischools, and the hard copy menu has helped to further embed the traffic light system with students, staff and parents.

The canteen now makes most of their food products from scratch without pre-prepared sauces and their freshly-made hot meal options are proving very popular.

The healthy options are increasingly being provided to teachers at staff morning teas and at school events like the Mother's Day breakfast and cross country carnival.

While it takes commitment, patience and time to make the changes, Radford's Junior School has deemed their Fresh Tastes approach a success

"It is a worthwhile service and you receive the support you need," said the Radford Fresh Tastes Action Group.

Kingsford Smith School

Kingsford Smith School (KSS) has over 900 students from Preschool to Year 10 with a school canteen managed by the school's P&C committee. A canteen manager and kitchen hand are employed by the P&C to run the canteen five days per week. As a preschool to year 10 school, Kingsford Smith (KSS) has the added challenge of catering for a wide range of age groups. It was one of the first schools to embrace the NHSCG in 2011 with a view to making gradual changes towards creating a healthy menu. This began with removing all sugar-sweetened drinks from the menu.

Over the past four years, KSS successfully removed all Red items from its menu, which previously comprised 23 per cent of food and drinks provided. Initially, the removal of the Red products saw a drop in the canteen's profit margin. However, with some clever changes (mentioned below) in association with a healthier menu, the KSS canteen is now proud to report that its profit margin has returned and it now continues on its path to financial growth.

Some key aspects to their success are:

- more canteen-made, freshly prepared menu items which have increased sales and are now driving greater profits;
- infrastructure improvements to enhance the canteen's capacity to create and display healthier options. This included installation of a large oven and cook top, creating greater bench space, installing a display fridge and warming cabinets. The cost of these improvements was met by the P&C and their fundraising activities;
- attractive packaging to promote over-the-counter sales of healthy options for high school students;
- engaging with students to help create a vibrant and fun canteen environment, such as designing murals for the area;
- regular specials to the menu which are dependent on seasonal variation; and
- promoting and increasing sales of healthy choices amongst school staff. This has helped staff to role model healthy food choices within the school.

"Our canteen is better than it has ever been and I have no hesitation in ordering catering for our school events which always impresses." Principal, Kingsford Smith School.

Republished with permission from Kingsford Smith School

ACT schools' experience implementing National Healthy School Canteen Guidelines (continued)

Mount Rogers Primary School - Greening the canteen menu

After signing up to the ACT Government's Fresh Tastes service in mid-2014, Mount Rogers Primary School in Melba launched a brand new, and nutritious, canteen menu early in 2015.

"We are slowly phasing out the less healthy options in our canteen as both the school and the parents want to promote healthier options to the children," said Casey-Anne Langler, kindergarten teacher and the school's coordinator for the Fresh Tastes program.

As with most successful school canteens, Mount Rogers relies on a regular roster of willing volunteers to make things run smoothly, and with the help of the Fresh Tastes program, the canteen team has put in the extra effort to review the nutritional value of the food and drink options.

"Luckily, we have a well-balanced team of parents and canteen staff dedicated to ensuring the canteen moves to healthier options," said Casey-Anne. "They have been the ones coming up with the ideas and implementing the changes."

With training for canteen staff through the Healthy Kids Association and the drive of parents, Mount Rogers Primary School assessed the canteen items against the National Healthy School Canteen Guidelines' traffic light system. Interestingly, they found that just changing a brand helped to align some of their items with the Green and Amber indicators.

"We also did a survey directly with the children to see what they would want and what they may be willing to try.

"We are testing and refining this term by introducing new food options at special events to assess how they go," said Casey-Anne.

This approach will allow for a phasing out of the less nutritious options while the healthier choices are introduced.

The new menu, along with Water on Tap drink bottles for all students to keep on their desks, newly installed water refill stations available in the playgrounds, a vegetable garden and linkages to the work of the school's Green Team, is helping to bring Mount Rogers' healthier food and drink culture alive.

"Staff are also receiving traffic light training through Nutrition Australia ACT so there aren't any mixed messages and everyone is clear across the school about our expectations."

Mount Rogers regularly shares plans and ideas about their Fresh Tastes activities throughout the school community on their FacebookTM page, via newsletters and at their weekly 'Fruit and Fitness' sessions for the whole school.

"We are making a big shift in how we approach all activities to make sure healthier options are available," said Casey-Anne.

References

1. Australian Government Department of Health. National Healthy School Canteens: Guidelines for healthy foods and drinks supplied in school canteens. Canberra: Commonwealth of Australia, 2014. http://www.health.gov.au/internet/main/publishing.nsf/Content/5FFB6A30ECEE9321CA257BF0001DAB17/\$File/Canteen%20guidelines.pdf accessed August 2015.



Good Habits for Life

Sommer Sherwood, Miranda O'Brien and Susie Leydon, Health Promotion, Population Health Division

The *Good Habits for Life* social marketing campaign aims to increase engagement of Canberra parents and carers of children aged eight years and under in healthy lifestyle behaviours. The campaign focuses on physical activity, healthy eating and social connectedness and was informed by a literature review and qualitative and quantitative testing with the Canberra community. *Good Habits for Life* was developed by the ACT Health Population Health Division and launched in November 2014. This article describes the campaign and provides some preliminary evaluation results.

What is the Good Habits for Life campaign?

Good Habits for Life is a locally developed social marketing campaign, which uses commercial marketing techniques to positively influence behaviour change in the target audience.

The *Good Habits for Life* campaign was developed to increase understanding of the need for healthy eating, physical activity and social connectedness and their links to improved wellbeing in children and families and to encourage them to make positive behaviour changes.

The objectives of the campaign are to:

- increase awareness of the importance of parents role modelling healthy habits to their children;
- increase understanding of the need for healthy eating, physical activity and social connectedness and their links to improved wellbeing among ACT parents of children aged eight and under.
- advise parents and carers about where they can go to for help and support in making changes; and
- galvanise parents to make these changes in their families.

Good Habits for Life's target audience is parents and carers of children aged eight years and under living in the ACT.

What is the campaign based on?

The campaign is based on an internally conducted literature review of evidence-based health promotion campaigns, and research with Canberra families. The literature review included research from the New Economics Foundation, which is the United Kingdom's leading think tank promoting social justice. The New Economics Foundation developed five concepts for evidence-based actions to improve personal wellbeing: Connect, Be Active, Take Notice, Keep Learning and Give¹, which were tested for their salience with an ACT audience and refined accordingly.² The literature review demonstrated the importance of addressing physical and mental health and wellbeing in promoting healthy lifestyles in the target audience.

ACT Health commissioned qualitative research with Canberra families to test campaign messages. A key finding in responses towards social marketing messages showed that parents were more likely to be influenced by healthy lifestyle messages based on whether they identified as having a weight issue and the age of their children.³

Quantitative testing was undertaken to refine campaign messaging, to ensure strong links with settings-based programs delivered by ACT Health.⁴

The literature review and qualitative and quantitative testing show that parents and carers have the most control over what their children eat and how they spend their time before they reach secondary school. However, they lack the tools, strategies and confidence to implement healthy lifestyle behaviours within their family.¹⁻⁴ De-

signing a behaviour change campaign in response to the increasing rates of overweight and obesity in the ACT therefore needed to recognise the importance of embedding healthy lifestyle behaviours in the early years.

Key messages

The Good Habits for Life campaign is based around three central messages – eat well, move more and get into life. It provides the target audience with tips and links to resources and programs designed to help them teach their children "good habits instead", by showing an illustration of a child depicting a negative lifestyle behaviour which they have copied from the adults around them. These campaign resources are aligned with the Australian Dietary Guidelines⁵ and the National Physical Activity and Sedentary Behaviour Guidelines.⁶



Figure 8: Good Habits for Life poster. ACT Health

Campaign implementation

Good Habits for Life was launched on 11 November 2014. The campaign aligns with the ACT Government's Healthy Weight Initiative, which aims to stabilise the growth in rates of overweight and obesity in the ACT population.

The launch campaign included TV, radio, cinema and online advertising to encourage the target audience to visit the campaign website www.act.gov.au/goodhabitsforlife. The website features an online quiz, a simple program of tips and challenges and resources

Good Habits for Life (continued)

such as recipes, a shopping list planner and guides on seasonal fruit and vegetables. It also includes links to information about locally developed programs running in ACT children's settings including Fresh Tastes: healthy food at school, Ride or Walk to School, Kids at Play Active Play and resources developed under the former Healthy Food@Sport program.

The second phase of the campaign ran in May and June 2015 and included TV advertising and a range of activity across digital and social media channels which championed the "good habits for life" message and encouraged the target audience to visit the central campaign website. The target audience was offered a cookbook developed in collaboration with the Australian Red Cross, The *Mixing Bowl: Healthy Recipes for Families*, as an incentive to register on the website, as well as a personalised healthy lifestyle program for their family.

Early results

Early results from the campaign impact evaluation surveys⁷ are positive:

- 42 percent of parents recognised the description of the TV ad. Of these parents, 96 percent said that the most positive feature of the ad was 'ease of understanding';
- some actions by parents as a result of seeing the campaign advertising included thinking/talking about it with partner and family and being reminded to be a better example/role model for their children;

Analysis of the digital activity shows between 11 November 2014 to 30 June 2015:

- 30,074 unique page views of the website;
- #Goodhabitsforlife reached 29,038 users on TwitterTM (cumulative);
- 102,559 video views delivered on FacebookTM; and
- 7,772 clicks to the Good Habits for Life website from social media channels.

Where to next?

Once final results from the campaign impact evaluation surveys become available, these will be used to further strengthen the *Good Habits for Life* campaign into the future. Planned enhancements of resources and campaign messages include substantial additions to the website to better cross-promote other Population Health Division programs such as *Fresh Tastes: healthy food at school*, as well as further use of innovative social media strategies to improve campaign reach.



Let's feach fhem good habits instead

Next time, instead of the drive thru, why not stop at the shops and pick up ingredients for fresh and healthy homemade burgers?
When we eat well, they will too.
For great recipes and useful tips to help your family enjoy a healthier lifestyle, visit www.act.gov.au/goodhabitsfortife

Fart of the ACT Government's Healthy Weight toitations, supporting a healthy, active and productive community.

Figure 10: Good Habits for Life poster. ACT Health

- New Economics Foundation. Five Ways to Wellbeing. http:// www.neweconomics.org/projects/entry/five-ways-to-well-being accessed 15 July 2015.
- 2. Market Attitude Research Services, Testing of the salience of the "New Economics Foundation (nef)" concepts with the broader Canberra community, April 2011. Unpublished.
- 3. Colmar Brunton: Social Research qualitative research with Canberra families. December 2012. ACT Government, 2012. Unpublished.
- 4. TNS Social Research: Quantitative research of creative concepts, February 2014. ACT Government, 2014. Unpublished.
- National Health and Medical Research Council (2013) Australian Dietary Guidelines. Canberra: National Health and Medical Research Council. ISBN Online: 1864965754
- Department of Health. Australia's Physical Activity and Sedentary Behaviour Guidelines. http://www.health.gov.au/internet/main/publishing.nsf/content/health-publith-strateg-physact-guidelines accessed 15 July 2015.
- AMR Research: Good Habits for Life post report, August 2015. ACT Government 2015. Unpublished.

Section Highlight

Public Health Nutrition

The public health nutrition function sits within the Research and Evaluation Section in the Health Improvement Branch. It has a small team of two staff - a public health nutritionist and a Healthy Weight Initiative (HWI) food environment project officer.

The Senior Public Health Nutritionist provides policy and program support and advice on a wide range of population health nutrition issues for ACT Health as well as input on territory and national public health nutrition issues. A key role is the provision of public health nutrition input to the implementation of *Towards Zero Growth: Healthy Weight Action Plan* (HWAP), the ACT's whole of government plan for reversing the rising rates of obesity. The HWAP is being implemented by six cross-government implementation groups: food environment, schools, workplaces, social inclusion, urban planning and evaluation.

The Food Environment Implementation Group (FEIG) is chaired by the Executive Director, Health Improvement Branch and is working to create healthier food environments in the ACT. The Senior Project Officer Food Environment provides project support and secretariat services to the FEIG.



Photograph: L-R: Lesley Paton, Patricia Byrne

Notifiable Disease Report

	YTD 2015	1st QTR 2015	2nd QTR 2015	YTD Average 2010-2014	Ratio YTD:YTD average	Annual Total 2014	Annual Average 2010-2014
VACCINE PREVENTABLE CONDITIONS							
CHICKEN POX*	42	15	27	11.6	3.6	63	11.6
INFLUENZA A	159	72	87	69.4	2.3	1167	69.4
INFLUENZA B	55	13	42	13.0	4.2	97	13.0
MEASLES*	2	1	1	0.6	3.3	7	0.6
MENINGOCOCCAL DISEASE (INVASIVE)*	1	1	0	1.2	0.8	2	1.2
MUMPS	1	1	0	0.8	1.3	2	0.8
PERTUSSIS*	224	88	136	204.6	1.1	233	204.6
PNEUMOCOCCAL DISEASE							
(INVASIVE)	6	1	5	10.2	0.6	15	10.2
RUBELLA*	1	0	1	0.6	1.7	0	0.6
VARICELLA (UNSPECIFIED)	54	28	26	60.6	0.9	177	60.6
VARICELLA-ZOSTER INFECTION (SHINGLES)*	84	40	44	18.6	4.5	92	18.6
GASTROINTESTINAL DISEASES	01	10		10.0	1.0	02	10.0
CAMPY LOBACTERIOSIS	250	122	128	249.8	1.0	507	481.4
CRYPTOSPORIDIOSIS	10	4	6	17.6	0.6	30	22.6
GIARDIA	69	42	27	66.6	1.0	148	116.2
HEPATITIS A *	2	1	1	1.6	1.3	5	3.6
SALMONELLOSIS	125	93	32	129.6	1.0	225	223.4
TY PHOID	1	0	1	0.8	1.3	1	2.2
YERSINIOSIS	12	5	7	3.0	4.0	13	5.6
SEXUALLY TRANSMITTED INFECTIONS							
CHLAMYDIA	670	337	333	638.0	1.1	1197	1234.2
GONOCOCCAL INFECTION	84	42	42	56.2	1.5	119	101.8
VECTORBORNE & ARBOVIRUS							
BARMAH FOREST VIRUS INFECTION	2	2	0	2.0	1.0	1	3.0
DENGUE FEVER	8	8	0	9.8	8.0	16	16.0
MALARIA	3	2	1	5.8	0.5	10	10.6
ROSS RIVER VIRUS INFECTION	8	6	2	7.4	1.1	5	10.0
RESPIRATORY CONDITIONS							
TUBERCULOSIS #	10	5	5	8.2	1.2	30	19.0

[#] All Diseases except Tuberculosis are reported by onset date or closest known test date. Tuberculosis is reported by notification date.

For the relevant year, Q1 refers to 1 January to 31 March, Q2 refers to 1 April to 30 June, Q3 refers to 1 July to 30 September, Q4 refers to 1 October to 31 December.

YTD refers to 1 January to 30 June.

N.B. Data reported are the number of notifications received by ACT Health. Data are provisional and subject to change.

The number of notifications received for all notifiable diseases in the ACT is available at http://www.9.health.gov.au/cda/source/cda-index.cfm

HIV data are reported annually by the Kirby Institute: http://www.kirby.unsw.edu.au/surveillance/Annual-Surveillance-Reports

^{*} This condition includes cases that meet the probable and confirmed case definitions. Both probable and confirmed cases are nationally notifiable.

Notifiable Disease Report

Number of notifications of selected notifiable diseases received in the Australian Capital Territory between 1 January and 30 June 2015

Notes on notifications

This report highlights notifications of infections acquired by people who had travelled overseas received by ACT Health between 1 April and 30 June 2015. Prior to departure, travellers should visit a health professional for advice on how to keep healthy whilst overseas. Many infections acquired overseas are preventable through vaccination, as well as maintaining good practices for mosquito control and food safety.

Measles is a highly contagious acute viral illness that causes fever, rash, cough, runny nose and sore eyes. This quarter, a case of measles was notified in a child too young to be immunised who acquired their infection whilst travelling with family in Central Asia. The Health Protection Service undertook contact tracing of approximately 150 people in relation to this case, with no secondary cases identified. On average in the last five years, there have been six cases of measles notified each year.

Rubella is a contagious viral illness that causes a fever, rash and swollen lymph glands. Infection in early pregnancy may cause miscarriage or birth defects. This quarter, ACT Health received notification of rubella in an adult male who recently returned from Southern Asia. The case was not born in Australia and reported an unknown vaccination history. His close contacts were vaccinated or immune. Rubella is rarely reported, with only 1 case on average reported in the ACT in the last five years.

Where-ever possible, travellers should ensure they have received two measles containing vaccines prior to going overseas. In Australia, immunisation against rubella and measles is achieved using the MMR (measles-mumps-rubella) and MMRV (measles-mumps-rubella-varicella) combination vaccines. Two doses are required to provide the highest level of immunity. Australia's National Immunisation Program includes MMR at 12 months of age and MMRV at 18 months of age. Travellers should be aware that it is possible to vaccinate infants from 9 months of age and that it is recommended that people born after 1966 should receive two doses of MMR.

A number of gastrointestinal illnesses notifiable in the ACT are not usually acquired in Australia, including hepatitis A and typhoid. ACT Health was also notified this quarter of a child co infected with typhoid and hepatitis A, acquired while travelling in Southern Asia. The Health Protection Service provided household contacts with hepatitis A vaccination to prevent spread. The case was also treated with antibiotics to ensure recovery from typhoid and to reduce the likelihood of further spread.

Typhoid infection is caused by a bacterium called Salmonella enterica serotype Typhi (S. Typhi). The main symptoms of typhoid fever are fever, chills, and abdominal pain. Less common symptoms include diarrhoea or constipation, headache, cough, and intestinal bleeding. Transmission usually occurs when faecally-contaminated food and water are ingested. Typhoid is more common in less developed countries with poor sanitation and untreated drinking water. Safe and effective vaccines against typhoid should be offered to travellers going to most developing countries.

Hot Issues

Electronic cigarettes

Electronic cigarettes are devices that heat liquid to produce a vapour that the user inhales. They are also known as personal vaporisers, e-cigarettes and electronic nicotine delivery systems, among other names. Electronic cigarettes come in a variety of shapes, sizes and styles. Some look like tobacco cigarettes, cigars or pipes, whereas others resemble items such as pens and lipsticks.



Figure 11: Electronic Cigarettes. ACT Health

Electronic cigarettes typically contain a battery, a liquid cartridge and a vaporisation system. Although the composition of liquids varies, most contain flavouring agents and solvents. Electronic cigarettes may or may not contain nicotine, and the label may not accurately reflect their nicotine content. The risks and benefits of electronic cigarettes are the subject of considerable debate. Some advocate the potential of electronic cigarettes to reduce tobacco-related harm, while others suggest their use will undermine efforts to denormalise smoking.

The National Health and Medical Research Council (NHMRC) acknowledges there is "currently insufficient evidence to conclude whether e-cigarettes can benefit smokers in quitting, or about the extent of their potential harms". The World Health Organization (WHO) has raised similar concerns and flagged the need for measures to prevent the initiation of electronic cigarette use by non-smokers and youth, and protect bystanders from exposure to electronic cigarette emissions.

The ACT Government is keen to ensure that any harms to the community from electronic cigarettes are minimised and, in late 2014, consulted publicly on options to:

- prevent the uptake of electronic cigarettes by non-smokers, including children; and
- prevent the renormalisation of smoking and protect the public from second-hand vapour.

The consultation attracted widespread interest, with 242 submissions received from individuals, businesses and public health organisations. A summary of consultation outcomes and all non-confidential submissions are available on the ACT Health website at http://health.act.gov.au/public-information/public-health/electronic-cigarettes-community-consultation.

While the responses to the consultation were mixed, there is concern within the community about the possible health risks to users and bystanders of electronic cigarettes, and support for greater protections. However, the consultation also suggested that some Canberrans are using electronic cigarettes to help quit smoking, despite the devices not being approved for this purpose by the Therapeutic Goods Administration.

The ACT Government is currently considering its response to the consultation alongside recommendations from the NHMRC and WHO to minimise potential harms to the community from electronic cigarettes. For further information on electronic cigarettes, visit http://health.act.gov.au/public-information/public-health/electronic-cigarettes

- 1. National Health and Medical Research Council. NHMRC CEO Statement: Electronic cigarettes (e-cigarettes), Canberra: National Health and Medical Research Council, 2015. https://www.nhmrc.gov.au/guidelines-publications/ds13 accessed 31 August 2015
- 2. World Health Organization, Conference of the Parties to the WHO Framework Convention on Tobacco Control, Sixth session, Mosow, 2014. http://www.who.int/fctc/cop/en/accessed 31 August 2015

Medical Cannabis

On 21 July 2014 ACT Greens Minister, Mr Shane Rattenbury MLA, released an exposure draft of the Drugs of Dependence (Cannabis Use for Medical Purposes) Amendment Bill 2014 (the Draft Bill) and a related discussion paper. The Draft Bill and discussion paper were referred to the Standing Committee on Health, Ageing, Community and Social Services (the Committee) for inquiry. The Committee presented its Report to the ACT Legislative Assembly on Thursday 13 August 2015.

A number of recommendations were made in the Committee's Report, including that the ACT Legislative Assembly reject the proposed Drugs of Dependence (Cannabis Use for Medical Purposes) Amendment Bill 2014.

Other recommendations related to further consideration being given to the availability and affordability of synthetic cannabis pharmaceuticals such as Sativex and Marinol, exploring the possibility of the ACT participating in medicinal cannabis clinical trials and supporting a national approach to medicinal cannabis. The full report can be found at <a href="http://www.parliament.act.gov.au/in-committees/standing_committees/Health,-Ageing,-Community-and-Social-Services/inquiry-into-exposure-draft-of-the-drugs-of-dependence-cannabis-use-for-medical-purposes-amendment-bill-2014-and-related-discussion-paper?inquiry=624651.