

Cancer Council Australia pre-budget submission, 2012-13

Costs for advanced bowel cancer will not be sustainable as our population ages – we must invest now in detecting more early-stage cancers

- Australians are dying unnecessarily – right now
- Health system costs to treat advanced bowel cancer: \$66,000; to detect and remove precancerous polyps: less than \$2000
- Faecal occult blood testing: the low-cost, publicly acceptable way to screen Australia for our No.2 cancer killer
- New evidence demonstrates unrealised benefits of limited NBCSP
- Screening investment stagnates, Medicare and PBS costs escalate
- Australian Government a leader in cancer control – so why the delays in the most urgently needed national program?
- FOBTs should be in the Men's Sheds – 2,200 Australian men die of bowel cancer annually
- Delayed screening investment passes on bowel cancer costs to states
- NBCSP should be part of Government's \$470 million e-health initiative
- Only \$15 million to add 60 and 70-year-olds to the NBCSP from 2012-13: the best cancer control investment available to the Australian Government – extraordinary good value as a public health investment

Australian are dying unnecessarily – right now

At this moment thousands of Australians aged 50 and over have an undetected early-stage bowel cancer or precancerous polyp that will kill them prematurely, but their lives could be saved by a fully implemented National Bowel Cancer Screening Program (NBCSP).¹

Most of these Australians are healthy individuals displaying no symptoms of the cancer that will take their lives. Before their death they will be transformed from economic contributors to terminal cancer patients, most costing the health system around \$66,000^{2,3} to fight an unsuccessful battle against bowel cancer – one of the easiest and least expensive cancers to treat if detected early.

Think of the human cost of their experience and that of their families – impossible to quantify – then consider evidence, outlined in this submission, that shows increased funding for bowel cancer screening is among the most cost-effective public health investments available to the Australian Government.⁴

The National Health and Medical Research Council advises that all Australians aged 50 and over should be screened biennially for bowel cancer. Yet the NBCSP only targets people turning 50, 55 and 65, with a one-off test.

The unrealised potential of our underfunded National Bowel Cancer Screening Program means lives are lost unnecessarily and at a substantial scale – simply because investment in the inevitable is continually deferred.

Why is investment in a full program inevitable? Because the Australian Government has been on record since 2008 confirming its commitment to screen all Australians aged 50 and over every two years for bowel cancer.⁵ It is more than 10 years since successful screening pilots began in Australia and seven years since both the Labor and Coalition parties committed to phase in the program.

So why are we still waiting for program expansion, when the returns on investment in cost-effectiveness and social benefits are so impressive?

There is a compelling case to add 60 and 70-year-olds to the NBCSP from 2012-13 (specific analysis summarised under final heading) based on the rationale that follows.

¹ Michael P Pignone, Kathy L Flitcroft, Kirsten Howard, Lyndal J Trevena, Glenn P Salkeld and James B St John, Costs and cost-effectiveness of full implementation of a biennial faecal occult blood test screening program for bowel cancer in Australia, Medical Journal of Australia, Feb 2011

² Tran et al, A preliminary analysis of the cost-effectiveness of the National Bowel Cancer Screening Program – Demonstrating the potential value of comprehensive real world data, Journal of Internal Medicine, 2011.

³ S. Kosmider, K. M. Field, S. Ananda, P. F. Gibbs, Escalating costs of treating colorectal cancer (CRC) and cost effectiveness of faecal occult blood test (FOBT) screening, presented at 2009 Gastrointestinal Symposium, available at: http://www.asco.org/ascov2/Meetings/Abstracts?&vmview=abst_detail_view&confID=63&abstractID=10494

⁴ Ibid

⁵ Correspondence received from Government MPs

FOBT: the low-cost, acceptable way to screen for No.2 cancer killer

Australian Government research, including comprehensive pilot studies, has shown that faecal occult blood testing – performed in the home using a simple test kit – is the most publicly acceptable and affordable screening tool for reducing the social and economic costs of bowel cancer in Australia.⁶

The cost-effectiveness of FOBT has been further demonstrated in a number of independent studies, including an analysis published by the Cancer Institute NSW that showed an FOBT-based screening program would only marginally increase the overall taxpayer costs of bowel cancer in Australia⁷ while preventing up to 30% of bowel cancer deaths among the screening cohort.

At an estimated \$36,080 per healthy life year saved, this is extraordinarily good value; the agreed benchmark for quality investment in public health is between \$50,000 and \$60,000 for healthy life year saved.⁷

A more recent study, prepared for the Commonwealth Department of Health and Ageing and published in the *Medical Journal of Australia* in 2011, estimated the net costs of a full NBCSP to be lower than previous estimates, based on cost offsets elsewhere in the health system.⁸

Importantly, neither of these studies takes into account the increased treatment costs expected to be incurred by Australia's ageing population and the associated growth in bowel cancer incidence, nor the PBS listing of high-cost pharmaceutical for treating advanced disease.⁹

Bowel cancer is the second-largest cause of cancer death in Australia, but one of the easiest cancers to treat if detected early.¹⁰

New evidence shows benefits but lost opportunities

At an international gastroenterology conference in Sweden in October 2011, new evidence was presented that showed downstaging in bowel cancer diagnoses were the direct result of Australia's National Bowel Cancer Screening Program.¹¹

Downstaging refers to diagnosing cancers at an earlier stage, when they are far less expensive to treat. It was the first time such compelling evidence was presented internationally that measured through downstaging the direct population health benefits of a government bowel

⁶ Bowel Cancer Screening Pilot Program: knowledge, attitudes & practices pre- and post-intervention surveys (2002 & 2004). Final report. Canberra: Australian Government Department of Health and Ageing.

⁷ Bishop J, Glass P, Tracey E, Hardy M, Warner K, Makino K, Gordois A, Wilson J, Guarnieri C, Feng J, Sartori L. *Health Economics Review of Bowel Cancer Screening in Australia*. Cancer Institute NSW, August 2008.

⁸ Michael P Pignone, Kathy L Flitcroft, Kirsten Howard, Lyndal J Trevena, Glenn P Salkeld and James B St John, Costs and cost-effectiveness of full implementation of a biennial faecal occult blood test screening program for bowel cancer in Australia, *Medical Journal of Australia*, Feb 2011

⁹ Ibid.

¹⁰ Ibid

¹¹ Cole, Tucker, Lane, Young, Cancer downstaging as a consequence of the Australian National Bowel Cancer Screening Program. Pre-press summary available at: <http://uegw.congress-online.com/quest/AbstractView?ABSID=14410>

cancer screening program. The study concluded that “greater participation in the NBCSP should translate to further reductions in bowel cancer burden in Australia”.¹¹

The average costs of care for metastatic bowel cancer (Stages C & D) per patient have increased from \$6,000 to \$66,000 over the past decade, with the Pharmaceutical Benefits Scheme accounting for most of the escalation in expenditure.¹² Staging is a critical indicator of expenditure, with the costs of treating bowel cancer at Stages B, C or D increasing 2.7, 3.9 and 3.4 fold respectively compared with Stage A.¹³

The evidence presented in Sweden highlights the NBCSP’s effectiveness while at the same time emphasising opportunities lost due to the program’s limited reach – as it only targets people turning 50, 55 and 65, rather than all Australians aged 50 and over.

Screening investment stagnates, PBS and Medicare costs escalate

At approximately \$35 million a year, current investment in the partial National Bowel Cancer Screening Program has remained stagnant in real terms since the Australian Government added 50-year-olds to the program in 2008-09.¹⁴

However, over that three-year period annual PBS expenditure for advanced bowel cancer treatments has doubled from \$47 million to \$96 million.¹⁵ The average cost to the health system of treating an individual case of advanced bowel cancer has increased 10-fold over the past decade, from \$6000 to \$66,000.¹⁶

MBS costs for colonoscopy – much of which could be reduced through appropriate use of FOBT as a population screening tool – have also increased, by \$16 million.¹⁷

So, while taxpayer funds for high-cost advanced cancer medicines and ad hoc screening escalate, investment in the recommended technology to prevent late-stage disease languishes.

Pharmaceutical Benefits Scheme costs

The recent listing of high-cost pharmaceuticals for advanced bowel cancer represents the single largest tumour-specific growth in PBS cancer treatment costs over the past four financial years, which in total have almost doubled from \$810 million in 2007-08 to just under \$1.6 billion in 2010-11.¹⁸

¹² Tran et al, A preliminary analysis of the cost-effectiveness of the National Bowel Cancer Screening Program – Demonstrating the potential value of comprehensive real world data, Journal of Internal Medicine, 2011.

¹³ S. Kosmider, K. M. Field, S. Ananda, P. F. Gibbs, Escalating costs of treating colorectal cancer (CRC) and cost effectiveness of faecal occult blood test (FOBT) screening, presented at 2009 Gastrointestinal Symposium, available at: http://www.asco.org/ascov2/Meetings/Abstracts?&vmview=abst_detail_view&confID=63&abstractID=10494

¹⁴ Australian Department of Health and Ageing budget papers, accessed at www.health.gov.au.

¹⁵ PBS data at <https://www.medicareaustralia.gov.au/> accessed November 2011. Allows for an average sedation cost per procedure of \$160.

¹⁶ Ibid

¹⁷ Medicare data at <https://www.medicareaustralia.gov.au/>, accessed November 2011.

¹⁸ Ibid

Reflecting this expenditure blow-out is a net \$49 million increase in PBS costs for Avastin (Bevacizumab), which was not listed in 2008-09, further inflated by increased expenditure on therapies such as Xeloda (Capecitabine).¹⁹

Cancer Council welcomed the listing of these antineoplastic drugs, with their potential to extend the lives of people with advanced cancer. However it must be stressed that investing in cancer screening would reduce the annual cost of these chemotherapy agents while delivering vastly improved patient outcomes.

Early detection not only reduces the need for high-cost pharmaceuticals, it also saves lives. The majority of early-stage bowel cancers and all precancerous conditions detected through FOBT screening require no high-cost chemotherapy.

PBS costs for advanced bowel cancer will not be sustainable as the population ages; we must invest now in detecting more early-stage cancers.

Colonoscopy costs continue to rise – draining budgets and capacity

More than half a million MBS-funded colonoscopies are performed in Australia each year,¹⁹ many of them done as a high-cost screening tool instead of FOBT.²⁰

Use of colonoscopy as a screening tool is a three-fold problem – it is prohibitively expensive, (up to \$1,300 per procedure, compared with \$40 for FOBT), not adequately acceptable to the public and it drains the capacity to use colonoscopy as an investigative tool for people who test positive for FOBT.

Medicare expenditure for colonoscopy without polyp removal (MBS item 32090) – the service most commonly used as a high-cost screening tool instead of FOBT – was \$76 million in 2010-11, more than double the \$31.6 million spent a decade ago and a \$5 million increase on last year's expenditure alone. Each service is more around \$320, 75% of which is rebated, and the Medicare data does not include separate costs for anaesthesia and pathology, which inflate the overall fee for service by several hundred dollars – compared with less than \$40 for an FOBT screening kit. MBS also picks up \$160 for the sedation costs of each procedure, adding \$50.2 million to overall Commonwealth expenditure.

Given that the rate of NBCSP-based referrals for colonoscopy have remained stable,²¹ it can be assumed that a \$7.2 million increase in taxpayer funding for MBS item 32090 and associated sedation in only one financial year reflects increased ad hoc use of colonoscopy as a screening tool, driven by Australia's population ageing population. This is unsustainable; an expanded NBCSP is the only feasible option for ensuring FOBT is used as a population screening tool.

Rigorous independent studies have shown that reductions in using colonoscopy as a screening tool are among the key cost savings achievable through an expanded National Bowel Cancer Screening Program.²²

¹⁹ PBS data at <https://www.medicareaustralia.gov.au/> accessed November 2011.

²⁰ Quality Working Group of the National Bowel Cancer Screening Program, Improving colonoscopy services in Australia 2009, Australian Health Ministers' Advisory Council, 2010.

²¹ Australian Institute of Health and Welfare, NBCSP monitoring reports, available at www.aihw.gov.au

²² Ibid.

Moreover, current colonoscopy usage, and the likelihood that much of it is in lieu of FOBT-based screening, refutes the argument that colonoscopy capacity must be incrementally grown before the NBCSP is expanded further. Capacity exists, and is being used inappropriately in the absence of an expanded screening program.

Australian Government a leader in cancer control – so why the delay?

Cancer Council Australia has commended the Gillard Government's achievements in cancer control, including the plan to introduce plain packaging for tobacco products and the allocation of \$2.5 billion in capital and recurrent grants for cancer detection and treatment.²³

In this context, a \$15 million top-up for the National Bowel Cancer Screening Program – given the immediate and long-term benefits in reduced cancer mortality – seems a modest funding proposal.

The Government has a strong record in cancer control; delays with expanding the NBCSP remain the largest deficit in Australia's national cancer control framework.²⁴

FOBT kits should be in the 'Men's Shed'

The Australian Government is establishing itself as a leader in men's health policy, yet delays to the expansion of bowel cancer screening are leading to a substantial number of deaths, particularly among Australian men who die from bowel cancer at higher rates than women.

As noted recently by the minister responsible for men's health, the Hon. Warren Snowdon MP, Australian men on average die younger than Australian women and do not engage adequately with healthcare professionals.²⁵

While we welcome the investment in the Men's Sheds initiative, expanding the NBCSP will immediately prevent bowel cancer deaths in Australian men and, by inviting them to screen, would encourage them to engage with the health system, including their GP, and think more about their personal health and wellbeing.

Delayed screening investment shifts bowel cancer costs to states

Australia's healthcare costs are at unprecedented highs and increasing. Public hospital services accounted for almost one-third (31%) of the total increase in Australia's healthcare expenditure in 2009-10, while medications accounted for over one-fifth (21%) of the total growth.²⁶ Escalating bowel cancer treatment costs reflect these trends, with most expenditure growth in increasing pharmaceutical costs and hospital services.²⁷

²³ Ministerial media statement, 7 November

²⁴ Ibid

²⁵ <http://www.health.gov.au/internet/ministers/publishing.nsf/Content/mr-yr11-ws-ws044.htm>

²⁶ Australian Institute of Health and Welfare, Health expenditure Australia 2009-10, 2011.

²⁷ Australian Institute of Health and Welfare (AIHW 2005). Health system expenditures on cancer and other neoplasms in Australia, 2000–01.

Despite a whole-of-government commitment to reduce cost-shifting between jurisdictions, the Commonwealth is in effect passing substantial long-term bowel cancer costs onto the states by deferring investment in screening. Bowel cancer accounts for by far the largest proportion of hospital inpatient costs of any cancer diagnosed in Australia.¹⁶ Data from 2006-07 shows that 52% of 30,000 bowel cancer hospital admissions for that year were in the public system,²⁸ 10-year-old AIHW data – the most recent tumour-specific hospital expenditure data available²⁹ – shows bowel cancer is by far the most expensive cancer treated in the hospital system.

Significant increases in bowel cancer incidence and the cost of new treatment technologies since the collection of this data will have substantially inflated the cost of bowel cancer to Australia's public hospitals. For example, removing a precancerous polyp costs less than \$2000; treating a patient who has advanced bowel cancer costs on average \$66,000, a substantial proportion of which is hospital inpatient services.³⁰

Under-investment in bowel cancer screening is shifting bowel cancer costs to the states, a problem compounded by inferior patient outcomes. Australia's national health reform agenda is well short of its potential when costs are shifted in this way – particularly when the net result in social terms is hundreds of avoidable deaths.

NBCSP and \$470m e-health initiative

The Australian Government is investing \$470 million in an electronic health strategy. The inter-governmental National Electronic Health Transition Authority (NEHTA) has rightly identified bowel cancer screening and referral as an important public health service that could be enhanced by integration with the personally controlled electronic health record system (PCEHR).³¹ NEHTA has announced that the PCEHR will be operational by July 2012.

Integrating bowel cancer screening into the PCEHR and extending the NBCSP to 60 and 70-year-olds is an ideal opportunity to add value to Australia's burgeoning e-health framework.

Best way forward – interim expansion, long-term planning

Seven years and thousands of preventable deaths³² since a phased-in NBCSP was a bipartisan election commitment, the program remains restricted to only three age groups as a one-off test, despite compelling evidence of benefit if it were more widely available.³³

However, the Australian Government's decision in the 2011-12 budget to allocate NBCSP funds on a permanent recurrent basis provides an opportunity to fund an expansion to the program for

²⁸ Cancer Australia, National Audit of Cancer Control Activity, 2010.

²⁹ Australian Institute of Health and Welfare (AIHW 2005). Health system expenditures on cancer and other neoplasms in Australia, 2000–01.

³⁰ Tran et al, A preliminary analysis of the cost-effectiveness of the National Bowel Cancer Screening Program – Demonstrating the potential value of comprehensive real world data, *Journal of Internal Medicine*, 2011.

³¹ NEHTA Referrals Environmental Scan, 2009

³² As per our analysis, even adding only two age groups would result in circa 630 early-stage cancers being diagnosed, therefore we can conservatively assume thousands of bowel cancer deaths would have been avoided if the program had been fully implemented from as late as 2008-09.

³³ Ibid.

the first time since 2008-09. As this submission demonstrates, expanding the NBCSP represents the best national cancer control investment available to government federally. The evidence calls for:

- Inclusion from 2012-13 of Australians aged 60 and 70; and
- Announcement of long-awaited full implementation within four years.

Our analysis of the current program's effectiveness, based on large published studies, indicates that adding 60 and 70-year-olds to the target group would detect at early stage more than 630 cancers (circa 417 in 70-year-olds and 206 in 60-year-olds) each year, added to the 527 cancers the program is detecting among its established age cohort.³⁴ Participation in the NBCSP is substantially higher in 65 year-olds compared with 55 and especially with 50 year-olds – and it should be equally high in 60 and 70 year-olds.

Additionally, prevalence of cancer increases progressively with advancing age. In combination these two factors make it most appropriate to add the two older age groups to the program. (These figures do not include the substantial direct and indirect economic and social gains that would also be derived from removing potentially cancerous polyps in 60 and 70-year-olds.)

With the chances of surviving bowel cancer around 87% if it is detected early through FOBT, compared with as low as 12% for advanced cases,³⁵ expansion to the program is an urgent life-saving priority. This differential in survival is also reflected in PBS and hospital costs. There are few public health investments capable of this level of immediate return, particularly in a cost-effective program that government has already committed to fully implementing. Lives and money saved are entirely a matter of timing and investment; the evidence is clear.³⁶

Based on current Commonwealth investment levels it would cost the Australian Government only \$15 million per annum to add 60 and 70-year-olds to the NBCSP, immediately saving lives and expediting the accrual of demonstrated cost offsets to taxpayers. At an estimated \$36,080 per healthy life year saved, this is extraordinarily good value; factor in the indirect cost benefits, such as productivity gains and it is an outstanding investment.

With only 3% of annual bowel cancer expenditure invested in screening,³⁷ the 2011-12 federal budget provides an opportunity for the Australian Government to further demonstrate its commitment to reducing the impact of cancer in Australia by expanding its most important under-funded cancer initiative.

³⁴ Victorian bowel cancer statistics (registry data) extrapolated with findings from 13-year randomised control trial in Denmark (Jorgensen et al, 2002), also Med J Aust 2009;191:378-381.

³⁵ Ibid

³⁶ Ibid.

³⁷ Ibid