

## Enabling the success of academic health science centres in Australia: where is the leadership?

**TO THE EDITOR:** In a recent perspective in the Journal, Theile and colleagues called for national leadership in the creation of academic health science centres (AHSCs) through partnerships and collaborations that better link Australian universities, research institutes and health services.<sup>1</sup> The mission of one of the most influential AHSCs in the world, the Mayo Clinic, is to “provide the best care to every patient every day through integrated clinical practice, education and research”.<sup>2</sup>

In Australia, it may be increasingly difficult for AHSCs to reach this ultimate goal as we are losing the clinical academics who integrate the tripartite mission of research, teaching and improving patient care within the public health system. In the United States, clinical academics still lead the best performing AHSCs as chief executives and department heads.<sup>3</sup> Here, recruitment in academic medicine is declining,<sup>4</sup> the clinical research workforce is ageing,<sup>5</sup> and senior academics and mentors are retiring. This loss of clinical academic leadership will be to the detriment of patient care in Australia’s health system.

At times of budgetary restraint, clinical research can be viewed as a non-essential expense by the health system. During periods of financial restraint, hospitals do not have the funds to support the cost of infrastructure and protected time for clinical researchers.<sup>5</sup> In reality, funding young clinical researchers is an important contribution to the ongoing improvement of patient care. We hope that the emergence of the AHSCs will provide new impetus to better fund applied clinical research and translational science throughout Australia’s public health system.

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- 1 Theile DE, Scott IA, Martin JH, Gavrilidis A. Enabling the success of academic health science centres in Australia: where is the leadership? *Med J Aust* 2014; 201: 636–638.
- 2 Mayo Clinical Model of Care. Mayo Foundation for Medical Education and Research. Rochester, Minn: 2002, <http://www.mayo.edu/pmts/mc4200-mc4299/mc4270.pdf> (accessed Apr 2015).
- 3 Goodall AH. Physician-leaders and hospital performance: Is there an association? *Soc Sci Med* 2011; 73: 535–539.
- 4 Henderson S, Porter RJ, Basset D, et al. Why academic psychiatry is endangered. *Aust N Z J Psychiatry* 2015; 49: 9–12.
- 5 Australian Government Department of Health and Ageing. Strategic review of health and medical research in Australia – better health through research. Final report. Canberra: DoHA, 2013, <http://www.mckeeonreview.org.au> (accessed Apr 2015). ■

## Can Australia’s clinical practice guidelines be trusted?

**TO THE EDITOR:** In response to the news article from the National Health and Medical Research Council (NHMRC) published recently in the Journal,<sup>1</sup> we would like to highlight a generally neglected facet of the clinical guidelines discussion: acceptability. While it is clearly critical for clinical guidelines development to adopt a thorough and transparent process, it is equally important to focus on the end user.<sup>2</sup> Many good quality clinical guidelines lay unused because they ignore practitioner requirements, including practical, design and context-specific needs.<sup>3</sup>

Remote Primary Health Care Manuals (RPHCM) are clinical



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guidelines that have been published in Central Australia since 1993. They were originally developed to enable standardised and evidence-based practice in the context of remote Aboriginal health care. Repeat evaluations have confirmed the high acceptability of and compliance with the guidelines.<sup>4</sup> The “by the users, for the users” approach to their development contributes significantly to their high acceptability and uptake.

We monitor NHMRC recommendations closely to direct and improve our guideline development, and adopt a vigorous and continuous quality improvement process, including recording details and conflicts of interests of contributors, and publishing the evidence review underlying our protocols.<sup>5</sup> However, what distinguishes our clinical guidelines from many others is the degree of involvement of end users, largely remote health care practitioners working in stressful, isolated and resource-poor environments.

The content, layout, format, and illustrations of the RPHCM guidelines are tailored to their users and their context. In combination with a strong evidence base and transparency of process, this focus ensures the development of quality guidelines that are highly useable and acceptable.

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**Competing interests:** We are part of a project, funded by the Australian Government, to develop clinical practice guidelines for remote health care practitioners.

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## Closing the dental divide

**TO THE EDITOR:** Russell noted the importance of oral health to general health and quality of life, and the substantial costs of dental treatment.<sup>1</sup> In 2012–13, \$8.3 billion was spent on dental treatment in Australia.<sup>2</sup>

A recently released Health Workforce Australia report<sup>3</sup> indicated that Australia has a more than sufficient dental workforce. The dental workforce distribution between remote and metropolitan areas is altering as graduate dentists move to outer regional and remote areas,<sup>4</sup> although there are many regional and remote areas that will never be able to support full-time dental services due to low population numbers.<sup>4</sup>

Unlike medical care, dental care is overwhelmingly supplied in the private sector.<sup>5</sup> Russell's solution is to transfer the costs of dental care from the patient to the government.

The National Oral Health Plan 2004–2013 identified six populations for specific action to improve oral health outcomes: children and adolescents, older people, people with low incomes and with social disadvantage, people with special needs, Aboriginal and Torres Strait Islander peoples, and those living in rural and remote areas.

It would be more practical than integrating dental care into Medicare to incrementally increase the availability of the government's limited resources to populations who have difficulty accessing dental care. The Australian Dental Association has supported the Child Dental Benefit Schedule and suggested that the next group in the staged implementation of government-assisted dental care should be people aged 65 years and over.<sup>6</sup> It makes sense from both a health and an economic perspective for government to prioritise the oral health of older people within a policy of staged improvement in dental care access.

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**Competing interests:** I am Chairman of the Australian Dental Association Dental Workforce Education Committee; the Dental Consultant for AITEC Corporate Education and Consulting responsible for the delivery of the Voluntary Dental Graduate Year and Oral Health Therapy Graduate Year Programs; and Chief Investigator for the Australian Primary Health Care Research Institute Centre of Research Excellence in Primary Oral Health Care. The information and opinions contained in this article do not necessarily reflect the views or policy of the Australian Primary Health Care Research Institute or the Department of Health.

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- 1 Russell LM. Closing the dental divide. *Med J Aust* 2014; 201: 641–642.
- 2 Australian Institute of Health and Welfare. Health expenditure Australia 2012–13. Canberra: AIHW, 2014. (Health and Welfare Expenditure Series No. 52. AIHW Cat. No. HWE 61.)

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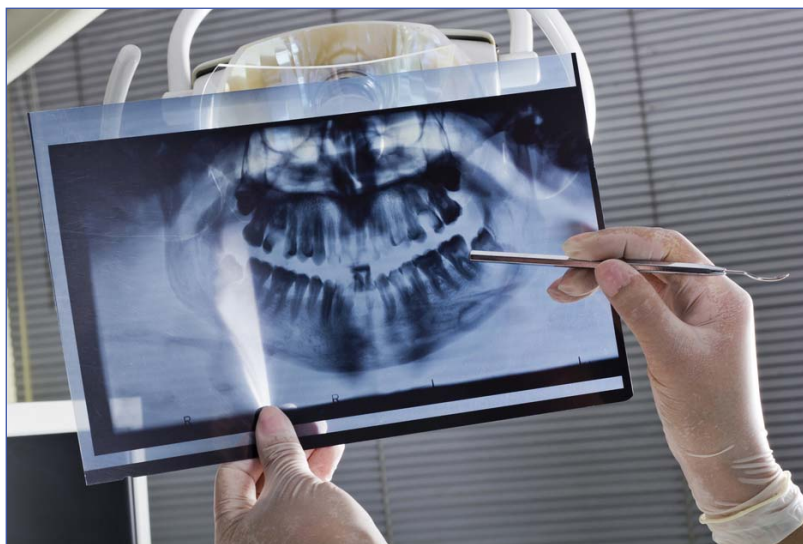
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[My] very pragmatic solutions ... don't even entail a significant transfer of costs from patients to the public purse

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Russell



- 3 Health Workforce Australia. Australia's future health workforce – oral health. Overview report. Canberra: HWA, 2014. [http://www.health.gov.au/internet/main/publishing.nsf/Content/3CFAE9DEE7BB7659CA257D9600143C09/\\$File/AFHW%20-%20Oral%20Health%20Overview%20report.pdf](http://www.health.gov.au/internet/main/publishing.nsf/Content/3CFAE9DEE7BB7659CA257D9600143C09/$File/AFHW%20-%20Oral%20Health%20Overview%20report.pdf) (accessed Apr 2015).
- 4 Godwin D, Hoang H, Bell E, Crocombe LA. Dental practitioner rural work movements: a systematic review. *Rural and Remote Health* 2014; 14: 2825.
- 5 Chrisopoulos S, Harford JE. Oral health and dental care in Australia: key facts and figures 2012. Australian Institute of Health and Welfare. Canberra: AIHW, 2013. (Cat. No. DEN 224.)
- 6 Australian Dental Association. Federal pre-budget submission 2015–2016. [http://www.ada.org.au/App\\_CmsLib/Media/Lib/1502/M850700\\_v1\\_635590808920306487.pdf](http://www.ada.org.au/App_CmsLib/Media/Lib/1502/M850700_v1_635590808920306487.pdf) (accessed Apr 2015). ■

**IN REPLY:** Crocombe rightly points to the findings of the recent Health Workforce Australia report<sup>1</sup> that Australia has a “more than sufficient dental workforce” but fails to note that the report states that this does not take account of the considerable unmet demand that exists, particularly in rural and lower socioeconomic areas. The problem of maldistribution remains.<sup>2</sup>

A careful reading of my article would show that my solution to poor dental health in Australia is not to integrate dental care into Medicare — although I do contend that the separation of oral health from that of the rest of the body is hard to rationalise. But the very pragmatic solutions offered, from fluoridation to investment in a “Dental Health Service Corps”, specifically exclude this possibility, and don't even entail a significant transfer of costs from patients to the public purse.

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## Determinants of rural practice: positive interaction between rural background and rural undergraduate training

**TO THE EDITOR:** The rural clinical school (RCS) initiative is acknowledged as a successful policy response to the rural–urban medical workforce imbalance.<sup>1</sup> Kondalsamy-Chennakesavan and colleagues' article regarding the location of practice of Commonwealth-supported alumni from the University of Queensland Rural Clinical School (UQRCS) concludes that there appears to be a compounding effect of RCS experience on a background of "rurality", when compared with metropolitan students undertaking similar rural placements.<sup>2</sup>

These results differ from those of the University of Sydney RCS<sup>3</sup> and the University of Western Australia RCS,<sup>4</sup> the former of which was not referenced by the authors. These earlier articles suggest that long-term RCS placements change the likelihood of all students' uptake of rural internships<sup>3</sup> and rural practice in general,<sup>4</sup> not simply those of rural origin versus metropolitan origin students.

Australian universities operating RCSs employ differing admission criteria for undergraduate and postgraduate courses, course durations and pedagogical constructs in their curricula; both rural and metropolitan students are subject to differing personal or financial circumstances.<sup>5</sup> Within the Commonwealth RCS funding parameters, there is the potential for a plurality of interpretations and implementation of RCS placements.

The authors' conclusions reflect the situation pertaining to their institution, and hence it would not be justified to generalise that the goals of the RCS scheme are best served by restricting or preferencing long-term RCS

placements to students of rural rather than urban origin.

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- 1 Hudson JN, May JA. What influences doctors to work in rural locations [editorial]? *Med J Aust* 2015; 202: 5-6.
- 2 Kondalsamy-Chennakesavan S, Eley DS, Ranmuthugala G, et al. Determinants of rural practice: positive interaction between rural background and rural undergraduate training. *Med J Aust* 2015; 202: 41-45.
- 3 Clark TR, Freedman SB, Croft AJ, et al. Medical graduates becoming rural doctors: rural background versus extended rural placement. *Med J Aust* 2013; 199: 779-782.
- 4 Playford DE, Evans SF, Atkinson DN, et al. Impact of the Rural Clinical School of Western Australia on work location of medical graduates. *Med J Aust* 2014; 200: 104-107.
- 5 Hays RB, Lockhart KR, Teo E, Smith J, Waynforth D. Full medical program fees and medical student career intention. *Med J Aust* 2015; 202: 46-49. ■

**IN REPLY:** We agree that institutional differences may limit the generalisability of the findings of our recent study.<sup>1</sup> However, direct comparison of the results of our study with those of earlier studies<sup>2,3</sup> is problematical because the studies differ in many ways, including definition of rural background, outcome measures, adjustment for confounders, and statistical methods and power. Importantly, neither study collected and tested for interactions among all variables that could potentially confound the results. However, the Western Australian study did note that the dual exposure of rural background and rural clinical school (RCS) placement was the strongest predictor of rural practice.<sup>2</sup> The Sydney study did not show an association between rural background and their rural

workforce outcome,<sup>3</sup> a result inconsistent with most extant data.

We did not recommend "restricting" RCS placements to rural background students but that an increase in the proportion with rural background be considered. The results of our study, and in fact the Western Australian study, support such a consideration. We note that Arnold does not object to our proposals for longer RCS placements and recruitment of students with longer rural background.

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References are available online at [www.mja.com.au](http://www.mja.com.au). Kondalsamy-Chennakesavan S, Eley DS, Ranmuthugala G, et al. Determinants of rural practice: positive interaction between rural background and rural undergraduate training. *Med J Aust* 2015; 202: 41-45.

- 1 Playford DE, Evans SF, Atkinson DN, et al. Impact of the Rural Clinical School of Western Australia on work location of medical graduates. *Med J Aust* 2014; 200: 104-107.
- 2 Clark TR, Freedman SB, Croft AJ, et al. Medical graduates becoming rural doctors: rural background versus extended rural placement. *Med J Aust* 2013; 199: 779-782. ■ Health Workforce Australia. Australia's future health workforce – oral health. Overview report. Canberra: HWA, 2014. [http://www.health.gov.au/internet/main/publishing.nsf/Content/3CFAE9DEE7BB7659CA257D9600143C09/\\$File/AFHW%20-%20Oral%20Health%20Overview%20report.pdf](http://www.health.gov.au/internet/main/publishing.nsf/Content/3CFAE9DEE7BB7659CA257D9600143C09/$File/AFHW%20-%20Oral%20Health%20Overview%20report.pdf) (accessed Apr 2015).
- 3 Tennant M, Kruger E, Shiyha J. Dentist-to-population and practice-to-population ratios: in a shortage environment with gross maldistribution what should rural and remote communities focus their attention on? *Rural Remote Health* 2013; 13: 2518. Epub 2013 Oct 7. <http://www.rrh.org.au/articles/subviewnew.asp?ArticleID=2518> (accessed April 2015) ■

## HCV-infected patients need access now to new direct-acting antiviral agents to avert liver-related deaths

**TO THE EDITOR:** We recently used a modelling approach to describe how the burden of infection with hepatitis C virus (HCV) and the associated health care costs in Australia will increase as the infected population ages.<sup>1</sup> We showed that increasing the efficacy of antiviral therapy and the number of patients treated could avert the expected increase in deaths from HCV-related liver disease and in the number of patients with end stage HCV-related liver disease. We did not include the specific costs of new direct-acting antiviral (DAA) regimens, as these are yet to be determined in Australia. We know that the cost of the new regimens has elicited discussion internationally about the ability of payers to meet those costs.

Importantly, compared with previous regimens, DAA therapies offer higher cure rates, simplified dosing, shorter treatment duration and are better tolerated — albeit at a substantial price.

Given the difficult decisions that will need to be made by the Australian Government, we examined the impact of delayed access to DAA treatment by modelling 1-year and 2-year delays. Currently, an estimated 2550 patients are treated with interferons

and/or first-generation protease inhibitors.<sup>1</sup> In the DAA scenario, we assumed cure rates of over 90%, drug availability in 2015 and an increase in the number of patients treated to 3550 in 2015, 7100 in 2016 and 14 000 after 2018. To provide the chance of cure of HCV infection to those at greatest risk, we limited treatment to advanced liver fibrosis (stage F3 or F4) from 2015 to 2017, with no restriction on the stage of fibrosis beginning in 2018. Based on those assumptions, we then compared the cumulative incident cases of liver-related deaths, decompensated cirrhosis, and hepatocellular carcinoma from 2014 to 2030. Under no circumstance did we consider that DAAs would never be available, thus the 1-year and 2-year delay scenarios were only compared with the DAA scenario (Box).

While other scenarios could be considered, we believe that it is important to remember that an estimated 230 000 people in Australia are chronically infected with HCV,<sup>1</sup> and those with advanced liver disease remain at greatest risk of liver-related death. We believe that it is critical to provide patients with access to highly effective therapeutic regimens to cure HCV infection without delay to diminish future HCV-related morbidity and mortality.

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“ it is critical to provide patients with access to highly effective therapeutic regimens to cure HCV infection without delay

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**Competing interests:** William Sievert has been a member of advisory boards and a clinical investigator for Bristol Myers Squibb, Gilead Sciences, Merck, Janssen and AbbVie.

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1 Enhanced antiviral treatment efficacy and uptake in preventing the rising burden of hepatitis C-related liver disease and costs in Australia. *J Gastroenterol Hepatol* 2014; 29 (Suppl 1): 1-9. ■

Projected cumulative new cases of hepatitis C-related advanced liver disease and death with current treatments compared with direct-acting antiviral (DAA) agents from 2014 to 2030, inclusive, plus projected new cases if access to DAA agents is delayed for 1 or 2 years

Treatment	Cumulative new cases		
	Liver-related deaths	Decompensated cirrhosis	Hepatocellular carcinoma
Current treatments	22200	19100	13500
DAAs	13500	11000	8200
DAAs, 1-year delay	14400	11800	8700
DAAs, 2-year delay	15300	12600	9200
Impact of delay			
1-year	900	800	500
2-year	1800	1600	1000