

Reply to Mr Ryan's paper: acupuncture, ACC and the Medicines Act

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In the December 2017 issue, the *New Zealand Medical Journal* published an article entitled "Acupuncture, ACC and the Medicines Act."¹ Author Daniel Ryan investigated the websites of New Zealand acupuncturists to determine, in his opinion, whether they were breaching the Medicines Act 1981.² Ryan justifies his claims of alleged breaches of the Act by his assumption that acupuncture lacks evidence of efficacy in the treatment of conditions contained within the Act.

The landscape of evidence for acupuncture is fast changing. The Cochrane Register of Controlled Trials shows there are currently 9,088 published clinical trials on acupuncture.³ In January 2017, two large acupuncture reviews were published. The first, "The Acupuncture Evidence Project", published by the Australian Acupuncture and Chinese Medicine Association, draws on two prior comprehensive literature reviews; one conducted for the Australian Department of Veterans' Affairs in 2010 and another conducted for the United States Department of Veterans Affairs in 2013. Research identified by these reviews were pooled, and a search of further literature from 2013–2016 conducted. Trials were then assessed using the National Health and Medical Research Council levels of evidence, with risk of bias assessed using the Cochrane GRADE system. Results in this review have been tabulated to indicate not just the current state of the evidence, but to indicate how the quality and quantity of evidence has changed from 2005 to 2016.⁴

In this review, 122 conditions were identified. The authors concluded that "strong evidence supported the effectiveness of acupuncture for eight conditions, and moderate evidence supported the use of

acupuncture for a further 38 conditions." For the remaining 76 conditions there was weak or little evidence found and further research is warranted.

The second significant piece of work published in 2017 was a programme of research on acupuncture for chronic pain and depression funded by the National Institute of Health Research UK.⁵

The researchers carried out a series of systematic analyses on acupuncture research for five chronic pain conditions; headache, migraine, back pain, neck pain and osteoarthritis of the knee. Their data conclusively demonstrated acupuncture to be "more than simply a placebo as it was more effective than sham acupuncture ... Acupuncture was also found to be better than standard medical care for all of these chronic pain conditions".⁵

Systematic reviews on acupuncture for major depressive disorder (MDD) and dysthymic disorder stated acupuncture therapy appeared safe and effective for MDD and could be considered as an alternative option.⁶ Acupuncture for anxiety was positive but reported insufficient evidence.⁷ For PTSD, acupuncture performs as well as CBT and superior to waitlist control.⁸ However, acupuncture is consistently shown as a low risk and safe therapy. Indeed, incidence of adverse events was lower with acupuncture and sham acupuncture than with antidepressants (10.2% versus 40.4%).⁶ When compared to the evidence for other treatments, including pharmaceuticals, for many conditions, including pain, migraine and headaches, acupuncture's evidence is at least equal to if not stronger in terms of efficacy, effectiveness and understanding of mechanisms.

Acupuncture's effectiveness in the treatment of many conditions has not yet been fully researched and further quality research is vital. However, cumulatively current studies create a solid and growing basis of evidence of the efficacy of acupuncture.

Ryan asserts "that there is no evidential base for the concepts of qi, meridians and acupuncture points" and "that any improvement could well be due to the placebo effect". This assertion is directly contradicted by systematic reviews and meta-analysis demonstrating that acupuncture outperforms sham needling. Moreover, many studies demonstrate that acupuncture produces a variety of biochemical and physiological effects both centrally and peripherally.⁹⁻¹² While the use of traditional language deviates from western medical terminology, the argument is one of semantics rather than plausibility.

Ryan writes "The UK's National Institute for Health Care Excellence (NICE) no longer recommends using acupuncture for the treatment of any health conditions". This is incorrect. Acupuncture is recommended for both migraine and chronic tension-headache prophylaxis in the NICE guidelines.¹³

Early in 2017, the American College of Physicians published clinical practice guidelines for back pain based on current evidence. For acute back pain, they suggest heat treatment has the best evidence, followed by acupuncture, massage and manipulation. For chronic back pain, they recommend acupuncture as a first-line treatment, ahead of pharmacological treatment.¹⁴

Furthermore, the National Comprehensive Cancer Network guidelines for supportive care recommend the use of acupuncture as one of the non-pharmacological, integrative therapies for adult cancer-related pain, as an adjunct to pharmacological treatment as required.¹⁵

The entire remit of Ryan's article is that there is no evidence for the effectiveness of acupuncture and that, any claims made relating to conditions listed under Section 58(1) of the Medicines Act 1981 are therefore in breach of the law. However, section 58 (3) states:

*"It shall be a good defence in a prosecution for an offence against paragraph (a) or paragraph (b) of subsection (1) if the defendant proves that the matter claimed, indicated, or suggested in the advertisement is true."*²

The argument that acupuncture has an insufficient evidence base is contested here. Health law expert Adam Lewis said the 'The Acupuncture Evidence Project' appeared to be a strong piece of evidence in showing acupuncture was not just a "theatrical placebo". He said it was likely the Project would stand up in court as a defence to breaching the Medicines Act.¹⁶

New Zealand's two acupuncture regulatory bodies—Acupuncture New Zealand and the New Zealand Acupuncture Standards Authority—are in agreement that this article does highlight the need for continued education of all health professionals on their advertising responsibilities and the need to reference the evidence base, however, we refute the assertions made in the article regarding the evidence base of acupuncture and its position in clinical guidelines.

Competing interests:

Nil.

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