Should NICE evaluate complementary and alternative medicines?

David Colquhoun

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Demand for complementary and alternative medicine is high despite limited evidence. Linda Franck and colleagues believe that a thorough review by NICE would benefit the NHS and patients, but David Colquhoun argues that it cannot afford to re-examine evidence that has shown little benefit.

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NO

One of the most important roles of the National Institute for Health and Clinical Excellence (NICE) is to assess which treatments produce sufficient benefit that the National Health Service should pay for them. Since the money available to the NHS is not infinite, making choices of this sort is inevitable, and it is in the interests of patients that dispassionate judgments are made on the efficacy of treatments.

If the effectiveness of a treatment is disputed, what could be more obvious than to refer it to NICE for a judgment of the evidence? Nothing is more disputed than the effectiveness of alternative medicine, so why has NICE not adjudicated? Even the Smallwood report, sponsored by the Prince of Wales, did not pretend to find good evidence, but recommended that NICE should be invited “to carry out a full assessment of the cost-effectiveness of the therapies”1 The Smallwood report was greeted warmly by many of the complementary medicine fraternity despite its principal recommendation.

That reaction is welcome, if a little surprising, because the evidence, such as it is, has been reviewed endlessly, and it is obvious that if NICE were to apply its normal criteria, almost all complementary and alternative medicine would be removed from the NHS immediately. Why, then, has NICE not considered complementary medicine, despite recommendations from experts? The answer seems to be that someone in the Department of Health is stopping that happening, possibly because he or she can foresee the obvious outcome.

Since referral to NICE would remove complementary medicine from the NHS, I should, perhaps, favour it. Nevertheless, a strong argument can be made for NICE not having to spend time and money going through, yet again, evidence that we already know to be inadequate. In fact NICE has alternative treatments in several of its reports—for example, the reports on supportive and palliative care, obsessive-compulsive disorder, and multiple sclerosis and draft guidance on chronic fatigue syndrome.2 In all these cases NICE has found no good evidence for anything more than placebo effects.

Unaffordable luxury

NICE has around 240 employees and costs £27.6m (€41m; $54m) a year,3 and it nevertheless comes under constant criticism for not responding quickly enough to really important questions, most recently over treatments for cancer and Alzheimer’s disease. It can’t afford the time to do again what has already been done.

Since we already know there is little evidence for the effectiveness of complementary medicine, should more research be done? I wonder whether that is worth while either. Homoeopathy has had 200 years to come up with evidence. Acupuncture and traditional Chinese medicine have had thousands of years. Yet still there is little convincing evidence. Isn’t that long enough? The House of Lords report on complementary and alternative medicine in 2000 recommended that three important questions should be examined in the following order: does the treatment offer therapeutic benefits greater than placebo? is the treatment safe? how does it compare, in medical outcome and cost effectiveness, with other forms of treatment?4

Money was made available for research but was spent on projects that almost all failed to address the first priority.5 In the US, the National Center for Complementary and Alternative Medicine “has not proved effectiveness for any ‘alternative’ method. It has added evidence of ineffectiveness of some methods that we knew did not work before NCCAM was formed”6 despite spending almost a billion dollars.

Lack of evidence

It is not necessary to take the word of sceptics about the lack of evidence. The more honest advocates of complementary and alternative medicine admit it themselves. Peter Fisher, clinical director of the Royal London Homoeopathic Hospital, on the radio said, “It is true that there is not as much evidence as you would like.” (Vanessa Feltz Show, Radio London, 26 Jan 2007 [www.ucl.ac.uk/Pharmacology/de-bits/quack.html#rose]). Dantas and colleagues concluded that: “The central question of whether homoeopathic medicines in high dilutions can provoke effects in healthy volunteers has not yet been definitively answered, because of methodological weaknesses of the reports.”7 Consider also the National Library for Health, Complementary and Alternative Medicine [www.library.nhs.uk/cam]. In July 2006, not one entry concluded that there is good evidence for the effectiveness of homoeopathic treatment, although this library is compiled by supporters of complementary medicine. Likewise, search of the Cochrane Library for homoeopathy finds very few positive reviews.

None of what I have said is intended to deny the important role of supportive and palliative care of patients for whom that is the best that can be done. But it is perfectly possible to provide such care honestly.8 There is no need to subscribe to the early 19th century pseudoscientific hocus pocus of homoeopathy to treat sick patients sympathetically and holistically. And there is no need for NICE to spend time and money coming to that conclusion when it has more important things to do.

Competing interests: None declared.

References are in the full version on bmj.com
Should NICE evaluate complementary and alternative medicine?

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YES

The National Institute for Health and Clinical Excellence (NICE) guidance is built on the rigorous appraisal of scientific evidence and the evaluation of the cost effectiveness of diagnostics and treatments. The Secretary of State for Health refers topics for development of guidance based on national priorities. NICE has received international recognition for its topic selection and appraisal processes and “commitment to using the best available evidence for decision making.”

Complementary and alternative medicine covers a heterogeneous group of therapies that share a focus on, or integration of, treatment of mind and spirit as well as body. The main goals of these treatments are often framed in terms of feeling better (that is, relief of symptoms) or prevention (promotion of general health and wellbeing) rather than cure. They may therefore be particularly relevant for patients with long term disease, who account for 80% of general practice consultations and who, by definition, are unlikely to be cured. Furthermore, most people seek complementary therapies as an adjunct rather than substitute for conventional medicine.

Complementary therapies are widely used by the public. Around half of general practitioners provide access to complementary medicine, and two thirds of Scottish general practitioners prescribe herbal or homoeopathic medicines. However, NICE has not been asked to develop guidance on these therapies. Given the high public interest in complementary medicine, we find this surprising.

Explanations

There are several possible explanations for the lack of investigation. The first is that complementary therapies are not relevant to NHS priorities of reducing health inequalities, promoting health and wellbeing, patient choice, and patient involvement. Yet as current usage statistics indicate, patients are choosing complementary therapies to promote health and wellbeing and there are inequalities in terms of access.

A second reason is that there are not always adequate methods for evaluating these therapies with the same rigour as applied to conventional medicine. Some therapies, such as herbal, nutritional, or homoeopathic remedies, can be evaluated in standard double blind randomised placebo controlled trials. For other therapies that are heavily dependent on the individual therapist, double binding may be impossible. However, these research design problems are no different from those for conventional therapies such as surgery. Research methods used for comparative trials of behavioural interventions offer a way forward. In order for alternative therapies to be compared with conventional treatments, more work is needed to define the most important outcomes and to measure them appropriately.

Failure to evaluate complementary therapies leads to health inequalities because of uneven access and missed opportunities

A third reason NICE may not have been commissioned to evaluate complementary therapies is that there is insufficient evidence with which to develop guidelines. However, there are numerous Cochrane reviews of complementary therapies. NICE has made some recommendations about benefits (or risks) of some complementary therapies within condition specific guidelines—for example, pregnancy, multiple sclerosis, Parkinson’s disease, hypertension, and depression. The guidance and supporting documentation available on its website suggests that these “recommendations” of a few complementary therapies have not been subjected to the same rigour as those of traditional medical interventions. Furthermore, NICE has not addressed the important questions of comparative efficacy or additive value in relation to current treatments being offered in the NHS. Where there is insufficient evidence, NICE could draw attention to this in order to stimulate more research.

This leaves two final reasons for the absence of NICE guidance. There may be an attitudinal bias against complementary therapies or a lack of resources. Some people within conventional medicine remain deeply convinced that alternative medicine cannot have any possible benefit, but this is all the more reason that these therapies should be rigorously evaluated. The lack of resources for evaluation is equally difficult to defend, but perhaps understandable when there is great pressure to evaluate high cost drugs and technologies.

Benefits of review

However, failure to evaluate complementary therapies leads to health inequalities because of uneven access and missed opportunities. For example, as complementary therapies are often relatively cheap, if shown to be effective they could save money currently spent on costly drugs.

In summary, NICE already has a systematic review process that takes into account all available evidence, including observational studies. Recent publicity on the use of complementary medicine in the NHS suggests that it should receive greater priority in topic selection. Applying the same standards as we apply to conventional medicine, we simply need to ask is it safe, is it effective in relieving symptoms compared with no treatment, how effective is it (the number needed to treat), how much does it cost, and is it affordable (quality adjusted life years)? Complementary and alternative therapies deserve a full evaluation from NICE and, if the evaluation is favourable, they should be adopted either on their own or integrated with conventional medicine.

Competing interests: None declared.
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David Colquhoun  
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Rapid Responses published:

Leave alternative therapists in peace  
John R King  (13 March 2007)

Fairies and leprechauns  
David Colquhoun  (16 March 2007)

Leave alternative therapists in peace  
13 March 2007

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Send response to journal:  
Re: Leave alternative therapists in peace

David Colquhoun (“NICE should not have to evaluate alternative medicine”) makes a better case than Linda Franck et al. Space researchers do not, after all, waste time trying to disprove the beliefs of flat-earthists. Neither would it be helpful for a Nobel prizewinning chemist to stride into a church and denounce the holy water there as nothing more than H2O. There is a very large and ever expanding array of alternative treatments, some more bizarre than others, which could tie up the resources of NICE for an indefinite period. But if people want to believe in them – or in fairies or leprechauns – they should be left in peace to do so. It is no concern of scientific medicine.

Competing interests: None declared

Fairies and leprechauns  
16 March 2007

David Colquhoun,  
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Send response to journal:  
Re: Fairies and leprechauns

Nobody is proposing to ban fairies or leprechauns. It would be both undesirable and impossible.

There does seem to be a case, though, for not providing leprechauns at the tax payers' expense. And really all leprechauns that are sold to the public should have labels that don't make false claims for their powers. Unfortunately the MLRA (Medicines and Leprechauns Regulatory Agency) has let us down in the matter of labelling. I suspect infiltration of the Department of Health by little green men.

Competing interests: None declared