

**CLOSING THE GAP BETWEEN TRADITIONAL
AND COMPLEMENTARY THERAPIES:
The case for the use of aromatherapy (essential oils) in
podiatry.**

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Introduction

Aromatherapy as part of the Complementary and Alternative Medicine (CAM) movement is becoming increasingly popular in driven by lifestyle decisions and high profile proponents such as the Prince of Wales. In 2004 a study showed that an estimated 10% of the UK population had visited a CAM practitioner in the previous 12 months ⁽¹⁾ with other studies put the figure as high as 20% ⁽²⁾. With the combination of such openness amongst the population to consider non-traditional care and a desire amongst healthcare practitioners to deliver holistic care packages, CAM offers podiatrists additional ways of delivering footcare to their patients, many of whom are part of the modern quest to find something ‘pure’ to treat minor ailments, help maintain good health and prevent ill health. This presents both challenges and opportunities for those involved in delivering healthcare in a changing population.

Of the CAMs that are now gaining wider acceptance in the healthcare community, Aromatherapy may be seen to be particularly suited to the podiatrist. This utilises the health benefits of volatile liquid plant materials known as essential oils in conjunction with the pleasurable experience involved in the treatment. Application of the essential oils through massage and manipulation is believed to have benefits in podiatric treatment however this raises the question of evidence to support such claims.

Orthodox healthcare professional are said to be divided into two categories; those who want to be involved in CAM, and are prepared to help design protocols for research studies or they stand back and criticize the lack of ‘proper’ research ⁽³⁾. By exploring the potential benefits of aromatherapy to the populations’ foot health, this paper sets out to raise awareness among the podiatric fraternity of the synergetic role of aromatherapy and the use of essential oils with the skills of a podiatric practitioner. The growing nature of the market for CAM, in and in particular aromatherapy, is explored together with its potential benefits in today’s podiatric practice. With the concern of healthcare professional as to the apparent lack of an evidence base, issues relating to the evidence surrounding aromatherapy are explored and its relevance to the podiatric practitioner. While dealing with issues of evidence other factors are considered such as the notion of

‘mind and body’ as an important aspect during the patient (client)/podiatric practitioner contact.

The Uptake of CAM in the UK

Set in context to the rest Europe, the UK market for CAM is comparatively small at the moment. Within Europe particularly France and Germany CAM is being practiced by medically trained doctors whilst in the UK there has been biting criticism by the practitioners of conventional medicine ⁽⁴⁾. An intriguing, positive correlation between signs of affluence and the sales figures of commercial complementary and alternative medicine products has also been reported ⁽⁵⁾. Figures for the financial scale of the UK aromatherapy market are difficult to estimate due to its fragmented nature with most practitioners working on a sole trader basis however combined with homeopathic remedies, the sale of aromatherapy products were said to be worth over £60m in 2004 ⁽⁶⁾ and set to grow with the rest of the sector in real terms by around 3% per year ⁽⁷⁾. It is notable that CAM therapies are used by men and women in equal proportions ⁽¹⁾.

There have been a number of factors which have been attributed to this rise in popularity, namely; perceived effectiveness and safety, pleasant therapeutic experience, control over treatment, affluence, “high touch, low tech”, good patient/therapist relationship, non-invasive nature and accessibility ⁽⁸⁾. The British Medical Association has dramatically changed its attitude to CAM and it is reported that several medical schools are offering special study modules to doctors in their 3rd year ⁽⁹⁾. This illustrates a change in the attitude of the orthodox medical fraternity which will undoubtedly reflect into the consumer market, or the private market where patients do have a real choice of how, and from whom, they access healthcare.

Why is this important to the Podiatric Practitioner?

More and more patients are purchasing over the counter aromatherapy products, i.e. essential oils, or are consulting other practitioners offering CAM treatments. It is easy to understand why the orthodox medical practitioner is starting to want to become familiar with aromatherapy as it enables them to rethink their work and their relationship with

their patient together with the opportunity to provide added value services in the commercial environment. Podiatrists particularly may follow the lead of medical colleagues through supporting patients' changing attitude to their health and well being.

The question of evidence?

The foremost question on the minds of healthcare professionals when considering CAM, is of its efficacy and the evidence base to support it. With the introduction of evidence-based practice the discerning podiatrist is not content to rely on patient testimonials but wants robust evidence. There is an overwhelming call for such evidence for aromatherapy, especially Random Controlled Trials ⁽¹⁰⁾, however this should not be the only sort of evidence that can be considered ⁽¹¹⁾. With Aromatherapy the number of such trials is currently very small, making the use of systematic review and meta-analysis almost meaningless. However there are many other types of research which may give equally valid evidence.

It has been stated that only well designed clinical investigations can establish trust, in terms of the efficacy of CAM, and those who prefer to bypass rigorous research, i.e. by shifting the discussion towards patients' preference, will not help establish CAM as part of routine healthcare ⁽⁸⁾. On the other hand it has been argued that too often those who believe in randomised controlled trials are scornful of those interested in observational research. Biostatisticians mock economists, quantitative researchers question the value of qualitative research, and basic scientists denigrate clinical research. In the context of such disputes, the answer is to return to fundamentals and ensure that the research question addresses the needs and the research methodology is the correct one to answer the question ⁽¹²⁾.

What evidence is available?

In spite of this current methodological debate there are a number of RCT's that have been conducted into CAM, and a number of systematic reviews exist. In their book, *Aromatherapy for Health Professionals*, Price & Price ⁽³⁾ back up their text with hundreds of references relating to clinical trials and research into the essential oils and their various

components. So for any practitioner unsure of the efficacy of individual oil, this text will highlight the relevant research.

A high proportion of the research undertaken has been in-vitro testing of essential oils and their components. One study in 2003 looked specifically at the antifungal activity of Tea Tree oil ⁽¹³⁾. It concluded that all Tea Tree oil components, except B-Myrcene, have antifungal activity. Another study in 2006 ⁽¹⁴⁾ demonstrated that Lemon, Lavender, Lemon Grass and Marjoram all showed antifungal effects against *Aspergillus Niger*, a fungus which affects the feet and nail ⁽¹⁵⁾. The local anaesthetic activity of *Lavandula angustifolia* (Lavender oil) has been demonstrated in-vitro and this action is reported to be due to the blockage of sodium and calcium channels ⁽¹⁶⁾. Yang et al ⁽¹⁷⁾ showed that Patchouli oil inhibited the growth of *Trichophyton* spp, *Microsporum canis*, *M.gypseum*, *Epidermophyton floccosum* and bacteria responsible for foot odour. Hammer ⁽¹⁸⁾ studied the antimicrobial activity of plant oils against a number of organisms including, *Candida albicans typhimurium*, and *Staphylococcus aureus*, Lemongrass, Oregano and Bay inhibited all organisms while variable activity was recorded for the remaining oils. These results support the notion that plant essential oils and extracts may have a role in pharmaceuticals and preservatives.

Other actions such as anti-inflammatory are found in oils such as Lemon, Ginger and Marjoram oil. A study by Duraffourd cited by Price & Price ⁽³⁾ found that Marjoram oil stimulates the vagus (parasympathetic) nerve, and does not act on the sympathetic nerve, therefore its action was identified as tranquillizing and lightly narcotic. In in-vitro testing by Deans & Svoboda ⁽¹⁹⁾, Marjoram inhibited the growth of five fungal and twenty five bacterial species, while Sharma et al ⁽²⁰⁾ demonstrated the anti-inflammatory properties in Ginger oil in laboratory tests.

Shin & Lim ⁽²¹⁾ focused on the combined action of essential oils and commonly used antifungal drugs. They found that Geranium oil (*Pelagonium graveolins*) used in combination with ketoconazole (an antifungal agent) had a strong synergistic inhibition against several *Trichophyton* spp. This combined action is useful as it can reduce the

efficacious dose of the oral antifungal and therefore minimise its side effects. In addition the therapeutic use of essential oils may provide a solution for the rapid development of fungal resistance and drug to drug reactions. This is a potential instance where use of an essential oil in itself may have nominal benefit but can be seen to augment traditional treatment.

These are just a few examples of the research which has been undertaken from the scientific standpoint – there is much research done from the qualitative perspective or looking into the effectiveness in relation to various conditions such as coronary heart disease ⁽²²⁾ and depression ⁽²³⁾

Clinical research is ultimately about making a difference to patient care, quality of life or health outcome ⁽²⁴⁾. In spite of the calls for more robust evidence in the form of RCT's it is suggested that alternative measures can be used, for example, qualitative approaches, outcome assessment, clinical audit and observational studies ⁽¹¹⁾.

What else should the Podiatrist consider when choosing to use aromatherapy oils?

When considering aromatherapy the podiatrist should not shy away from the holistic approach to treatment. The relationship between a person's thoughts, feeling and immune status suggests that all these make aromatherapy worth considering as a truly holistic therapy ⁽²⁴⁾. This is especially relevant to podiatry. Doctors report the difficulties of dealing with the “heart-sink” patient where their physical symptoms cannot be medically explained. The podiatrist will also see this category of patient and is frequently at a loss as to what direction to take the next treatment regime. Studies have confirmed the power of the mind to bring about dramatic changes in the physiology of the body as evidence in the fight-or-flight response ⁽³⁾. So where does Aromatherapy fit in? The evidence, although still a subject of much debate, does suggest that essential oils can have a physical impact in that some are bactericidal, anti-inflammatory, and antifungal. At the same time they possess properties which can affect the mind and emotions to sedate, calm and uplift since when we are safe, in a calm atmosphere we have the opposite of the

stress response, in that tension, blood pressure and oxygen use are all reduced - a state termed the relaxation response ⁽²⁴⁾.

As health professionals, podiatrists are all concerned primarily about the health and well being of our patients. Along side questions of efficacy, the safety of oils is foremost in the mind the podiatrist. As a general rule the quantity of essential oils used is very small and unwanted side effects are very small. A few studies have reported adverse events ⁽²⁵⁾ however these tend to occur when oils have been used undiluted in carrier oil. It is however stressed that the podiatrist should be aware of the contraindications to the oils that they choose and should always apply the information gained during the history taking phase of the consultation to decide if the patient has any contraindications to the use of a particular oil.

Conclusion: should we close the gap between podiatry and aromatherapy?

The evidence shows that aromatherapy is being more accepted not just by the general population but by the medical world. Affluence of the population and the desire to adopt a holistic approach to health care are probably fueling this trend. The opportunity is there for the Podiatrist to provide a value added service to their clients / patients by incorporating the use of essential oils as an adjunct to their conventional treatment, or as a treatment option when other more conventional methods have not provided adequate patient satisfaction. There is a wealth of quantitative and qualitative evidence about, not just the efficacy of essential oils but also the positive effect to the patients in terms of the association of the treatment to the paradigm of the mind and body relationship to healing and holistic health.

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