

“MEDICAL ART” - QUO VADIS ?

Many of us probably remember the rib-tickling remark by Mark Twain to his obituary published thirteen years before his death by the *New York Journal* : “Reports of my death have been greatly exaggerated.”

We, the practitioners of Natural Medicine, might also exclaim, “Reports of our death have been greatly exaggerated!” when our eyes happen to fall on the first six words of Professor Edzard Ernst’s preface to his desktop guide to *Complementary and Alternative Medicine*: **“An epitaph to opinion-based medicine”**.

Further down Professor Ernst and his Associates say, **“... CAM (and its literature) is presently far from being evidence-based and ought to become evidence-based sooner rather than later. The best way forward, as far as we can see, lies in objectively and reproducibly establishing and up-dating the evidence ... “**

We have become aware, with some dismay, that this man, who had after all been elevated to the Chair of Complementary Medicine at the School of Postgraduate Medicine and Health Sciences, University of Exeter, U.K., seems to have utterly failed to grasp both the science and the philosophy of Natural Medicine that has steadily developed CAM down the millennia. It would be as well for him to remember that this science and philosophy alone are the *raison d’être* for the Chair to which he had been elected. The science grows organically, often over centuries, on the observations of what works, then repeating it, and refining it. That is how acupuncture developed, how medical herbalism grew, how osteopathy became perfected, how every other naturopathic modality matured: it is an ever-continuing experiment involving millions of people from the dawn of human time. This scientific approach can not be bettered.

I randomly looked up *Rheumatoid Arthritis* [RA] in Ernst’s book, and I quote from it: ‘A recent review summarized three RCTs, including 226 patients, of homoeopathic treatments of RA. The odds ratio was 2.04 in favour of homoeopathic remedies over placebo, in these randomized controlled trials. No single homoeopathic remedy emerged as more effective than another.’ Yet in Ernst’s ‘Overall Recommendations’ a little later (on p 343) homoeopathic treatment for *Rheumatoid Arthritis* is not mentioned at all. Why not ? Presumably because the homoeopathic method, which classically uses a diversity of individualized remedies, was shown to be very effective, though there wasn’t one single remedy he could identify as ‘being

the pill for that ill': Well, now ... nor is there a single acupuncture formula for it; nor only one herbal remedy; nor only one naturopathic approach.

This leads on to how our distinct empirical scientific knowledge was forged and how it is applied.

Empirical Medicine and Rationalist Medicine are philosophically irreconcilable, because they are actually competing for the same central spot in scientific orthodoxy. Perhaps we should take a closer look at various aspects of these philosophical foundations of scientific medicine.

A central concept in the philosophy of science is empiricism, or dependence on evidence. Empiricism is the view that knowledge is derived from our experiences throughout our lives. In this sense scientific statements are subject to and derived from our experiences or observations. Scientific hypotheses are developed and tested through empirical methods consisting of observations and experiments.

Once reproduced widely enough, the information resulting from our observations and experiments counts as the *evidence* upon which the scientific community develops theories that purport to explain facts about the world. Observations involve perception and so are themselves cognitive acts. Put another way, observations are themselves embedded in our understanding of the way in which the world works; as this understanding changes the observations themselves may apparently change: or more accurately, our interpretation of observations may change. Empirical Medicine has always proceeded along these lines.

How does Empirical Medicine derive its scientific knowledge ? To illustrate this by means of just one example, *Vitex Agnus castus* is successfully employed in Empirical Medicine currently in a number of gynæcological disorders and also for *acné vulgaris*. It is recorded as having been so employed for about 25 centuries, since the time of Alexander the Great and Hippocrates before him. But it was probably in unrecorded use for a very long time prior to that. Subsequently Theophrastus, Dioscorides, Plinius, Galen, Avicenna and other ancient major authorities on medicinal plants have written about *Agnus castus*, which has been prescribed to untold numbers of women during all that intervening time. Could one imagine a greater cohort in any modern experimental study ? Could there be a longer period for 'retrospection' ? Nevertheless, there has also been an impressive number of successful modern studies (of the very type we're exhorted to produce by Ernst and Associates).

A true science is cumulative with an unchanging base. In the full sense described above, Naturopathic Medicine (a/k/a Empirical Medicine) is truly

scientific, as defined by Sir Karl R Popper (the standard-setting philosopher of science).

Professors E Ernst and M Baum wrote in the November 2009 issue of *The American Journal of Medicine*: “These [homoeopathic] axioms are not only out of line with scientific facts but also directly opposed to them. If homoeopathy is correct, much of physics, chemistry, and pharmacology must be incorrect. To put it more strongly, in the parallel universe of homoeopathy, life, as we know it, would be inconceivable, and the alien creatures that might dwell in that hostile environment are hard to envisage.”

Well, well the world of science has endured and survived more strikingly “alien” reversals of accepted opinion before this. Think of the profound change in our knowledge base when Johannes Kepler's laws and his analysis of the observations on which they were founded; or when the flat-Earth theory had to give way to the Earth as a sphere; or the effect of the concept of natural selection put forward by Charles Darwin.

During the last year (2009), when Ernst and Baum published their commentary, homoeopathy's much disputed mechanism of action has been the subject of a number of rigorous basic research experiments carried out by biologists, by physicists and by chemists. Several groups in physics, biology and immunology have shown the consistent effect of high homoeopathic dilutions. In a recent study Professor Luc Montagnier, the eminent French virologist who co-discovered HIV and who won the Nobel Prize in 2008, and his team reported the results of a series of rigorous experiments that demonstrated the distinctive electro-magnetic properties of homoeopathically highly-diluted biological samples. So, here we have the very ‘parallel universe’ Ernst and Baum ridicule ! Not to have informed themselves of relevant developments in scientific research before writing such a dismissive commentary about homoeopathy strikes me as wilful ignorance.

And they keep doing it ! And so does the third of the trio, Professor David Colquhoun !

[~1100 words]

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