

Development of a lifestyle medicine

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In his 1970 book, *Future shock*,¹ Alvin Toffler warned of the ways in which the world would be affected by exponential change in post-industrial societies. He did not specifically refer to public health or clinical practice, but to say that such change has not dramatically affected the practice of both would be naive. This has necessitated a change in orientation in both public health and clinical practice.

The 'germ theory' of the late 19th century, for example, had a monocausal focus ('germs'). Health workers were able to succeed against the dominant infectious diseases in the 19th and early 20th centuries through changes in public health, hygiene, immunisation and ultimately the development of antibiotics and other medications. By the time of publication of *Future shock*, it appeared that we had all but won the battle against disease. However, since 1970 we have seen a dramatic shift in health in Western societies from a predominance of acute, infectious diseases to a predominance of chronic, usually non-infectious diseases. The latter have not just been due to the extra longevity gained through the reduction of infectious ailments, but from our modern ways of living. Unlike the infectious diseases, these do not have a simple 'cause'. As a result, they have been largely managed in silos, such as heart disease, cancers, respiratory ailments and musculoskeletal problems.

Increasing levels of obesity since 1980 have been proposed as an underlying and ubiquitous 'cause' of chronic disease. But recent work shows that much chronic disease exists in the absence of obesity, which may be a sufficient, but not necessary, factor. In the 1990s, Harvard researchers found a previously

unrecognised low-level form of systemic inflammation, called 'metaflammation' because of its link with the metabolic system.² Initially this was thought to be the link between obesity and disease. However, work carried out in the past decade has shown that metaflammation can exist in the absence of obesity but in the presence of some of the determinants of obesity (eg diet, inactivity, stress). Focusing on metaflammation thus offers prospects for better managing chronic diseases. Hence the task of finding a 'germ theory' equivalent for chronic disease becomes more interesting. Find an underlying 'cause' of metaflammation – if there is one – and we have a point of attack.

Lifestyle medicine has arisen as a relatively new (adjunct) discipline to assist conventional approaches to clinical care in dealing with lifestyle (behaviour) and environmental, in contrast to microbially-induced, disease. It is not and was never meant to be a substitute for conventional medicine but is an adjunct to the principles and practices that have served medicine well over the years. Furthermore, it is not radical in scope: lifestyle medicine is targeted at making realistic and progressive evidence-based changes in people's behaviour to reduce the risks of common modern (mainly chronic, but potentially new lifestyle-related acute and infectious) diseases. In doing so it targets not just the risks and markers of disease but, in the vernacular of the great English epidemiologist Jeffrey Rose,³ the '... cause of the cause ... and the cause of the cause of the cause ...', without which long-term permanent improvements are unlikely. In doing this, it becomes imperative that lifestyle medicine includes aspects of the environment – social, political, cultural and economic⁴ – as well as personal behaviour and risk. Human behaviour does not exist in a vacuum, and any attempt to see it

as such could be rightly labelled 'victim blaming' – a criticism directed at many current political and health policymakers. Like many new branches of practice, however, lifestyle medicine is an evolving discipline with a dynamic structure and pedagogy designed to reflect the 'future shock' gathering in pace in health and society as foretold by Alvin Toffler.

In this issue of *Australian Journal of General Practice* we provide an overview of the current landscape of the science and art of lifestyle medicine and include several practitioners' perspectives on individual components of the field. This is obviously limited by space, but follows some initial, more widely scoped texts on the topic.⁵⁻⁷ With the field growing rapidly, it is expected that this will evolve further in the future and hopefully provide some new perspectives on a changing health culture.

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