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## Revisionist or simply wrong? A response to Armstrong's article on chronic illness

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**Abstract** This article is a response to David Armstrong's recent, revisionist account of the epidemiological transition which he claims replaced earlier discourses of ageing with new discourses of chronic disease. We argue (i) that he misrepresents a key element in Omran's account of the epidemiological transition, namely the decline in infant, child and maternal mortality; (ii) that he fails to acknowledge debates going back centuries in Western medicine over the distinctions between natural and accidental death and between endogenous and extrinsic causes of ageing and (iii) that he misrepresents the growth of medical interest in the everyday illnesses of old age over the course of the 20th century as a discourse of suppression rather than a process of inclusion. While we would acknowledge that the chronic illnesses of today are different from those of the past, this amounts to something more than the changing semantics of senility.

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### Introduction

David Armstrong has a deserved reputation for challenging accepted opinions in medical sociology, whether this is on the emergence of surveillance medicine or on the construction of health behaviour (Armstrong 1995, 2009). In 1983 he wrote *The Political Anatomy of the Body: Medical Knowledge in Britain in the Twentieth Century*, one of the earliest engagements with the work of Michel Foucault in relation to health. However, and in spite of this record, we would argue that despite his zeal to revise our understanding of certain key terms used in the field, his work suffers on occasion from being too impressionistic and that closer scrutiny does not support what he is claiming (Vallgård 2010). This seems to be particularly evident in Armstrong's recent article in the *Sociology of Health & Illness* 'Chronic illness: a revisionist account' (Armstrong 2014), where he challenges the conventional understanding of both the epidemiological transition and the processes of ageing. In his article Armstrong claims that the major illness problems of the early 21st century had their origin, not in a shift in disease patterns during the 20th century, but 'in the way medicine both began to focus on the downstream consequences of disease and asserted the superiority of the pathological paradigm over the ageing process' (Armstrong 2014: 25). According to him:

An older explanatory framework was therefore lost as the colonisation of ageing by medicine in the 20th century changed the way in which getting old, dying and death were construed. (Armstrong 2014: 25)

Our aim in this response to Armstrong's article is to challenge (i) the idea that there was no epidemiological transition; that is, no change in disease patterns during the 20th century and (ii) that what was called chronic disease was previously called the ageing process. Where we agree with Armstrong is that medicine did become more interested and involved in disease and infirmity in later life, and that the outcome of this has not always been beneficial – though undoubtedly the overall situation is better than before.

### The epidemiological transition

The epidemiological transition theory was designed to account for the changing patterns of morbidity (disease) and mortality (death) during the period termed modernisation (Omran 1971: 511). Its main tenets are that (i) during this period:

A long term shift occurs in mortality and disease patterns whereby pandemics of infection are gradually displaced by degenerative and man-made diseases as the chief form of morbidity and primary cause of death. (Omran 1971: 516)

And that (ii) the most profound changes in diseases patterns 'obtain among children and young women' (Omran 1971: 521). More recently, some have argued for a fourth stage transition, namely deferred mortality in later life coupled with extended survivorship for those suffering from chronic or degenerative disease (Olshansky and Ault 1986).

What evidence does Armstrong offer either that this transition did not occur (the theory is wrong) or that alternative explanations of the transition have been suppressed (that while the pattern of disease and its associated mortality have changed, the reason for this is not profound changes in diseases patterns among children and young women)? In general, Armstrong seems to be claiming that chronic illness emerged as a term so that medicine could survey the health of the population and expand its remit beyond the clinic and its technologies (Armstrong 2014: 19) such that 'the old chronic disease of the 19th century clinic had almost disappeared' [and was replaced by] 'a new form of morbidity that was based less on pathology and more on a patient's capacity to function' (Armstrong 2014: 19). This position echoes Armstrong's earlier work on surveillance medicine (Armstrong 1995).

More specifically Armstrong claims that during the 19th century 'the old form of natural death continued to haunt clinical practice' – by which he means old age, senility, atrophy and debility. However in the first half of the 20th century the distinction between pathological processes and natural ageing 'became blurred' and so more of what was previously seen as ageing was relabelled degenerative illness instead of natural decay (Armstrong 2014: 20). For Armstrong, it is this process that accounts for the 'suppression' of an older alternative account of the role of ageing on health.

We would wish to challenge Armstrong's revisionism on a number of counts. Firstly, Omran's concept of the transition is misrepresented. Omran located the change not in age or ageing but in lower rates of infection and lower mortality around and after childbirth, which led to more people reaching mid-life. Omran's data focus upon increasing survivorship up to 60 years of age, not on mortality gains after that point (see, for example, Omran 1971: 526, figure 8) and indeed his – and most others' – assumption at that time was that life expectancy 'was expected to change little in the future ... [as] ... mortality declines bottomed out' (Olshansky and Ault 1986: 358). These declines have still not bottomed out and the limits of longevity remain a subject of much discussion (Christensen *et al.* 2009, Vaupel 2010). The key point to take from this, however, is that Omran's theory was not based on mortality in later

life – that is, old age, senility or however it was expressed in his article – but on the declining rates of infant child and maternal mortality. We are not sure if Armstrong would dispute that such changes have happened, but if so his would be a lonely voice indeed.

*Senescence, natural and unnatural*

Accepting for the sake of argument that Armstrong recognises the decline in infectious disease and the increased survival of infants through adulthood and its periodisation, what should we make of his claim that alternative explanations of the transition have been suppressed? Concern about the nature of ageing, its naturalness or indeed unnaturalness has been debated at least since Galen's time in late antiquity (Galen CE 100–200). While he was reluctant to consider ageing a natural process, Galen considered that there must be some inherent limit to the length of life and that physicians should confine themselves to (i) helping people reach old age in good health; (ii) treating their illnesses; and (iii) maintaining their health through old age (Theoharides 1971). This Galenic precept was maintained as the dominant model in medicine until the 19th century, although it was challenged periodically by the Paracelsians and other medical radicals. Further, numerous essays and treatises on managing health and illness in old age were written during the Renaissance, primarily targeting the elites of the time mainly because they could afford medicine and were more likely to reach old age (Gilleard 2013). Had there been a widespread belief that age and death were natural companions, it seems curious that the learned doctors of the 15th, 16th and 17th centuries should have bothered to write so extensively on this subject (see Schäfer 2011 for treatises from the early modern period).

Arguably, it was the era of the French physician Claude Bernard and his experimental medicine in the mid to late 19th century when the detailed examination of sick old people became more common. Prior to this period, in England as in many other European countries the elderly were mostly excluded from teaching hospitals and their care entrusted to the workhouse infirmaries where nursing and medical care was almost entirely notional (Smith 1979). The *Clinical Lectures on the Diseases of Old Age* by the 19th century neurologist Jean Martin Charcot (1881) marked the inclusion of non-elite older people into modern medicine and its gaze. From the late 19th century to the end of World War II, *pace* Charcot, interest in the diseases of later life (beyond the age of 60) remained minimal. It was World War II and its requirement for the release of hospital beds to the war wounded that transformed this situation (Means and Smith 1998). In Britain, to these wider pressures was added the desire of the low status local authority doctors who ran the municipal hospitals to be part of the medical establishment. It was these circumstances that led to the rise of geriatric medicine in the UK and to the subsequent systems of categorisation based upon function that accompanied the formal division of health and social care responsibilities, as well as the professional distinction between acute and long-stay hospital wards (Millard and Higgs 1989, Pickard 2010, Warren 1943). As Christoph Conrad (1998) has pointed out in his history of old age and health care, the medicalisation of old age in the second half of the 20th century was a feature of the post-war welfare state that brought treatment and assistance to many older people whom medicine had previously ignored. Such developments arguably helped contribute to the fourth stage of epidemiological transition described by Olshansky and Ault of rapidly declining death rates in advanced age, a shift toward older ages among those dying from degenerative diseases and improved survival rates (Olshansky and Ault 1986: 360–1). This is a long way from the idea of the suppression of an ageing discourse by a rising one of chronic illness.

Armstrong's argument also ignores the fact that the modern medical discourse on ageing was not, and never has been, all of a kind. There was certainly a renewed interest not just in treating the diseases of old age but in abolishing age entirely, in the late 19th and early 20th

century (Morris 1926, Schultheiss *et al.* 1997). While the medical rejuvenators of the time were ridiculed more than the present practitioners of anti-ageing medicine are, they were able to pursue their trade because of the continuing interest among both the old and the new elites in not growing old. Disease and its disabling effects in later life, however, remained marginalised—, not because of a continuing belief in senescence and natural ageing but because of the limited benefits to the standing and status of medicine from treating ill and infirm elderly people. Only when the state centralised responsibility for the old and sick did most older people begin to be seen as not simply old and infirm but sick – not naturally ageing and due to die, but unnecessarily and avoidably dying, to the point that one by one most countries abandoned the use of old age as an acceptable cause of death on people's death certificates.

## Conclusion

We would conclude this response to David Armstrong's revisionism of the idea of chronic illness by pointing out that it is not sufficient to assert that alternative discourses of ageing and senescence were suppressed in the desire to impose alternative accounts of the development of the epidemiological transition. Not only does such an argument misunderstand the nature of the transition; it also ignores the circumstances in which the diseases of old age were understood by practitioners, and the institutions which came into being as a result of such knowledge. In the field of history, revisionist accounts are often brought about by access to new data: unfortunately, in this new account of chronic illness it seems that existing sources of information from other areas of study, such as gerontology, have been ignored in order to fit the argument. To those familiar with these other bodies of literature Armstrong's revisionism is simply wrong.

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