

Treating dementia: will the NICE guidance 2006 change our clinical practice?

Dementia is increasingly becoming a target of major attention and concern not only for clinicians but also for society and political policy makers. Its devastating individual, familial and social impacts, together with the expected rise in prevalence in the next few years, will challenge the limited resources of health care systems in Western societies [1]. In the absence of short term curative treatment(s), more investment and reorganisation of both health and care services is mandatory to support both the rapidly increasing number of dementia sufferers and their carers. Although members of the medical profession engaged in the treatment of elderly people with dementia (e.g. old age psychiatrists, geriatricians, neurologists and general practitioners) are committed to this effort by ensuring that patients are appropriately assessed and provided with the best treatment available at the moment, they must deal with far from ideal conditions to accomplish this purpose. Recently the Joint Committee on Human Rights found serious problems in the care of elderly people in the United Kingdom [2]. Also, as stated by the National Audit Report [3], until now dementia has not been given the necessary priority by policy makers. In this context, update of the National Institute for Health and Clinical Excellence (NICE) guidelines for dementia in November 2006 [4] and the recent judicial review on 10 August 2007 imposing restrictions on prescription of cholinesterase inhibitors (ChEI) has caused even more apprehension not only to dementia sufferers and their carers but also to those already facing numerous constraints when trying to provide the best care to this vulnerable population.

There is widespread consensus about the necessity to reconcile individual needs of patients with the limited resources of the NHS, especially for high-priced technologies or medications which could easily result in escalating costs. There is no doubt that the process of clinical decision must be grounded on the best available scientific information at the moment. However, controversy arises when the new paradigm of 'evidence-based medicine' is seen as an instrument to address economic issues through direct interference in clinical decisions. One of the questions arising following dialogue between pharmaco-economics and clinical medicine is whether and to what extent the economic perspective should be integrated into the clinical decision-making process. How can this be done without challenging the norms of good practice by which clinicians must prioritise their patients' care, ensuring that they receive the best possible treatment for their condition?

The NICE guidelines are a major contribution to the summary and systematisation of all available information about pharmacological and non-pharmacological management of cognitive and behavioural symptoms in dementia.

However, we must not overlook that by using a probabilistic and inductive model, the methodology underlying the NICE recommendations has great limitations when applied to individual cases in a routine clinical setting. Indeed, it could be imprudent to use a rigid standardised approach in clinical medicine where the complexity and variety of cases require a thorough approach to identify all possible factors in the specific pathological process (Figure 1). For example, the diagnosis of dementia in an individual patient is rarely straightforward. After a clinical and imaging assessment it becomes apparent that different types of comorbidity and pathology exist simultaneously, and the clinical decision must be made judiciously to establish the predominant pathology contributing to the dementia syndrome.

Another problem is whether the passive application of these guidelines will become a substitute for clinical decision rather than acting as a useful instrument in the clinical decision-making process. By automatically and rigidly following a flow-chart based on the mini mental state examination (MMSE) score, the clinician would miss the complexity involved in making a therapeutic decision, deferring to the guidelines with ominous consequences (Appendix 1, available online). If this were the case, despite the false idea of security that would prevail, errors, waste of resources and ultimately serious consequences to patients would certainly result. One of the NICE statements advises 'health care professionals should not rely on MMSE score in certain circumstances'. We wonder if they should rely on MMSE score alone in any circumstance. Indeed, just one item (concentration and attention question) on this scale can give a variability in the score of up to 4 points [5]. Furthermore, in clinical practice, variability of the overall MMSE score can

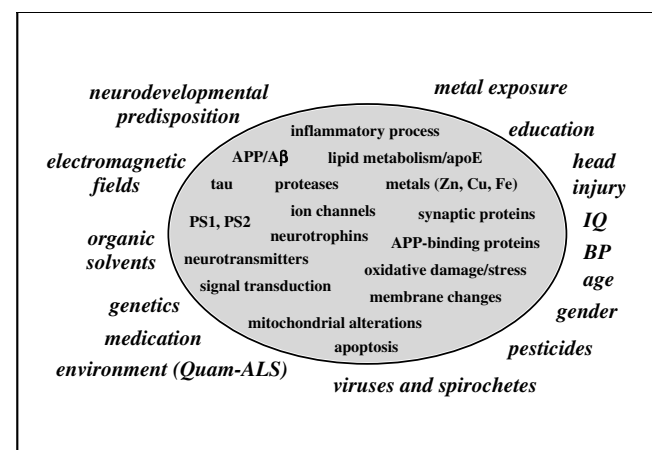


Figure 1. Dementia: risk factors and pathogenesis.

range up to 14 points in the elderly with a varying degree of poly-comorbidity as well as cognitive impairment (EBM-L, unpublished). This highlights the importance of a working operational MMSE framework, which will provide us with the necessary flexibility, being incorporated within the NICE guidance.

The changes to NICE guidance also highlight another important issue. They have confirmed what was already known: the available drugs represent only modest help for people with dementia. More than 40% of people with dementia, irrespective of whether they are treated with ChEI or not, will face the need for 24-h care during the first 3 years of their disease course, and over 60% of them will suffer from malnutrition and consequent further deterioration in cognitive impairment. This illustrates how far we, as clinicians, are from a clear understanding of the pathophysiology of Alzheimer's disease and other forms of dementia.

The changes raise many questions, including the issue of whether we use available anti-dementia drugs appropriately in line with what is already known about their neuro-biochemical characteristics. Are some of the ChEI in current use better in treating distinct forms/variants of Alzheimer's disease than others? Why should we be using ChEI only for moderate dementia, when there is evidence that they are also effective (and in some instances result in even better response) in severe dementia? What about postponing cognitive decline in mild dementia? Why should we limit the use of Memantine, and not use it in accordance with its pharmacological properties which indicate its suitability for treatment of mild dementia? What are the clinical implications of the latest molecular pathological and neuro-biochemical research in dementia? What do unchanged levels of CSF tau and beta amyloid protein following ChEI treatment tell us about the neurobiological impact of these drugs on the disease process [6]? How about depleted amyloid levels in brain tissue of Alzheimer's disease patients following ChEI treatment [7]?

These are only a few of the questions arising from our routine daily clinical practice. There is also significant data from laboratory research into dementia which should not be restricted solely to an academic setting. The combination of clinical and research findings and their influence on therapeutic approach(es) to dementia can only be useful when fostered more closely. It is the responsibility not only of the scientific community but also of society in general, to put more effort into research to develop novel and more efficient drugs to modify and cure the dementia disease process.

In conclusion, NICE guidelines about the therapeutic management of cognitive symptoms of dementia are welcome as an important instrument serving health professionals. However, many memory specialists directly

involved in the clinical care of dementia sufferers do not feel that these guidelines will largely influence our clinical practice. This was confirmed recently at the Memory Clinic Conference held in Newcastle (29 June 2007) when about 40% of the memory specialists agreed on the latter. Although over 80% of us agree on the need for ChEI to be used in mild dementia [8], we still lack data about how many of us are using them for this condition, and how beneficial they are in a routine clinical setting. The guidelines should not be erroneously overvalued and promoted as a 'miracle' strategy to decrease costs and to improve the quality of clinical practice. These two objectives can be achieved only with sound investment in clinical training and the development of solid clinical and communication skills and competent clinical judgement. Using the guidelines as a substitute for these will surely frustrate both the economic objectives and the patients' expectations.

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Supplementary data

Supplementary data for this article are available online at <http://ageing.oxfordjournals.org>.

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