

### Book reviews in the electronic age

Doctors, perhaps more than any other professionals, need to keep abreast of their subject. They need every encouragement to do this. Crown *et al* (2000) gave us a valuable reminder of the importance of book reviews in stimulating interest in new publications. As a reader, I enjoy a mixture of reviews, from reviews of leading textbooks to a review of a biography of Iris Murdoch, who suffered from dementia (Garner, 2000). Book reviews are a valuable part of the *Journal*.

But technology has moved on and the printed word is no longer the only way in which doctors obtain information or exchange ideas. The internet is increasingly becoming the first recourse for doctors seeking information. It is also being used more and more by patients, who come to the doctor clutching triumphantly printouts of material downloaded from the web. A patient may not always fully understand the latest paper he or she has found on the website of an American university, but will soon lose confidence in the doctor if he or she is entirely unaware of it.

There are hundreds, if not thousands, of medical websites, and the busy practitioner needs guidance as to which are worthwhile and which are not. It would be an immense service to readers if the Book Review Editors could extend the valuable work they do to encompass the new medium of the internet.

**Crown, S., Lee, A., Ramsay, R., et al (2000)** And now the book reviews... *British Journal of Psychiatry*, **177**, 388–389.

**Garner, J. (2000)** When the badgers broke in. *Old Age Psychiatrist*, **Autumn**, 7–8.

**A. Thompsell** Maudsley Hospital, Denmark Hill, London SE5 8AZ

We were pleased to see that Crown *et al* (2000) are considering bringing us into the 21st century with their suggestion regarding the review of websites. We feel that the proliferation of unreviewed information is a potential source of patient distress and general confusion. One way forward would be for authorities (e.g. a national medical association) to review sites and give 'seals of approval'. There are several rating scales for websites, all with varying quality criteria and little testing for reliability and validity (Jadad & Gagliardi, 1998). There are also concerns about possible litigation

if a reviewing authority gives a bad review, for example, and the site loses traffic as a result (Terry, 2000). Although "Rating the quality of medical websites may be impossible" (Delamothe, 2000), we think it is useful to have some framework within which individuals can think about websites and compare their value for their own particular information needs.

We have been developing a standardised format to assess websites, looking at two main areas in a more qualitative way. First, ease of operation and layout, scored on a visual analogue scale. Second, an assessment of content under such headings as quality issues, provenance, and frequency of updates. The general public and the media should have some guidance as to which websites should be taken seriously and which should be avoided at all costs. When our project is complete we will seek publication conventionally and on our own website ([www.ask-a-psychiatrist.co.uk](http://www.ask-a-psychiatrist.co.uk)).

Few people have access to psychiatric textbooks and libraries, but access to the web is likely to become almost universal in the developed world over the next few years. We should take advantage of this opportunity to promote the understanding of mental health issues by encouraging people to access reliable sources of information.

**Crown, S., Lee, A., Ramsay, R., et al (2000)** And now the book reviews... *British Journal of Psychiatry*, **177**, 388–389.

**Delamothe, T. (2000)** Quality of websites: kitemarking the west wind. *British Medical Journal*, **321**, 843–844.

**Jadad, A. R. & Gagliardi, A. (1998)** Rating health information on the internet. *Journal of the American Medical Association*, **279**, 611–614.

**Terry, N. P. (2000)** Rating the "raters": legal exposure of trustmark authorities in the context of consumer health informatics. *Journal of Medical Internet Research*, **2**, e18 (<http://www.jmir.org/2000/3/e18/index.htm>).

**A. Gray, S. Lamerton** St Anne's Orchard, Psychiatric Day Hospital, Link Top, Worcester Road, Malvern, Worcester WR14 1EZ

### Evolutionary theory and psychiatry

While we welcome Abed's (2000) editorial and endorse the arguments presented in it, we feel that it gives an inadequate account of the important British contribution to the burgeoning new discipline of evolutionary psychiatry. Instead, it leaves one with the impression that Darwinian psychiatry is largely an American achievement and that Abed and Marks are the only home-grown contributors to it. This is unjust, as

the application of evolutionary theory to psychiatric disorders began in this country 40 years ago at a time when American psychiatry was still in thrall to psychoanalysis and behaviourism. Bowlby's (1958) classic paper on the phylogeny of the child's bond to its mother and his life's work on the consequences of rupturing that bond for later psychopathology were seminal contributions to the development of the new evolutionary paradigm, as were Price's papers in the 1960s on social dominance and the evolution of mental illness (e.g. Price, 1967; further references in Stevens & Price, 2000a). Since then, British psychologists and psychiatrists have contributed as much to this fascinating field of enquiry as our American colleagues, whom Abed cites. In particular, we would draw attention to the work of Crow (1995) on the Darwinian approach to the origins of psychosis, Gilbert (1992) on depression and the evolution of powerlessness, and our own work on the evolutionary basis of the major neurotic, 'functional' psychotic, and reproductive disorders (Stevens & Price, 2000a), and the phylogeny of schizophrenia (Stevens & Price, 2000b). In addition, significant work has been published by Archer (1992) on ethology and human development, Bailey (1987) on human palaeontology, and Birtchnell (1993) on how humans relate.

A major criticism advanced against 'adaptionist' explanations of psychiatric disorders is that they are untestable and therefore of little use; this is untrue. We have responded to this criticism by providing testable predictions based on evolutionary insights (Stevens & Price, 2000a, pp.258–274). As Abed rightly suggests, scientific method requires "a theoretical framework that generates testable predictions", that "demands what questions to ask" and that "suggests what avenues of research are likely to bear fruit". Evolutionary psychiatry is now sufficiently advanced in this country for this programme to be implemented. Unfortunately, an uninformed reader would not have gathered this from Abed's editorial.

**Abed, R. T. (2000)** Psychiatry and Darwinism. Time to reconsider? *British Journal of Psychiatry*, **177**, 1–3.

**Archer, J. (1992)** *Ethology and Human Development*. New York: Harvester/Wheatsheaf.

**Bailey, A. K. (1987)** *Human Paleopsychology: Applications to Aggression and Pathological Processes*. Hove: Lawrence Erlbaum.

**Birtchnell, J. (1993)** *How Humans Relate: A New Interpersonal Theory*. Westport, CN: Praeger.

**Bowlby, J. (1958)** The nature of the child's tie to his mother. *International Journal of Psycho-Analysis*, **39**, 350–373.

**Crow, T. J. (1995)** A Darwinian approach to the origins of psychosis. *British Journal of Psychiatry*, **167**, 12–25.

**Gilbert, P. (1992)** *Depression: The Evolution of Powerlessness*. Hove: Lawrence Erlbaum.

**Price, J. S. (1967)** Hypothesis: the dominance hierarchy and the evolution of mental illness. *Lancet*, **ii**, 243–246.

**Stevens, A. & Price, J. (2000a)** *Evolutionary Psychiatry: A New Beginning* (2nd edn). London: Routledge.

— & — (2000b) *Prophets, Cults and Madness*. London: Duckworth.

**A. Stevens, J. Price** Address supplied.

Correspondence c/o *The British Journal of Psychiatry*, 17 Belgrave Square, London SW1X 8PG

### Near-fatal methylphenidate misuse

We report a near fatality of a 15-year-old girl who took one 10 mg tablet of methylphenidate supplied to her by a boy who was legitimately receiving it for hyperkinetic disorder. Both were residents in a local secure unit. Later investigation revealed that the boy would accept his supervised dose and then secrete it into his palm. After ingestion of the tablet the girl described seeing birds and stars. She suddenly collapsed and developed cyanosis. Her breathing stopped and artificial respiration was required for several minutes before spontaneous respiration resumed. There was difficulty finding her pulse and her blood pressure and temperature were elevated. She was hospitalised and recovered fully within 24 hours. She was amnesic of the episode but did recall receiving a tablet from the boy concerned. Blood investigations were normal. Urine toxicology, including a specialised test requested for methylphenidate, revealed no methylphenidate or other drugs including 3,4-methylenedioxymethamphetamine (MDMA; 'ecstasy'). This was consistent with a small methylphenidate dose, rather than an overdose, having been taken.

The most comfortable way of interpreting this incident was that it was a dangerous idiosyncratic reaction to methylphenidate and that these do occur. Also, the clinical signs of methylphenidate poisoning (i.e. hyperpyrexia, delirium, respiratory depression, convulsions and cardiac arrhythmias) are similar to those of ecstasy poisoning (Soloway, 1993). The latter was ruled out by appropriate tests.

This incident demonstrates that methylphenidate, contrary to some popular assertions, can be a drug of abuse. Oral misuse has rarely been reported, as this medication is not particularly effective in producing a 'high' (Garland, 1998). However, there have been reports of methylphenidate-induced euphoria in children misusing it (Corrigall & Ford, 1996). Increasing use of methylphenidate makes it likely that misuse of this nature will occur. Methylphenidate and ecstasy toxicity have been found to have similar manifestations. Education of clinicians and families in awareness of these risks and the resulting effects is important.

**Corrigall, R. & Ford, T. (1996)** Methylphenidate euphoria. *Journal of the American Academy of Child and Adolescent Psychiatry*, **35**, 1421.

**Garland, E. J. (1998)** Intranasal abuse of prescribed methylphenidate. *Journal of the American Academy of Child and Adolescent Psychiatry*, **37**, 573–574.

**Soloway, N. (1993)** Ecstasy (3,4-methylenedioxymethamphetamine). *Current Opinion in Psychiatry*, **6**, 411–415.

**J. S. Talbot, A. S. Ahuja** Swansea Child and Family Clinic, "Trehafod", Waunarlwydd Road, Cockett, Swansea SA2 0GB

### National Service Framework and suicide

The National Service Framework (NSF) for Mental Health has identified that the reduction of suicide by one-fifth by 2010 is both a national priority and a high-level performance indicator (Department of Health, 1999). However, relying on suicide rate as a parameter, and in isolation, could be criticised for being inappropriate as a performance indicator of mental health, and for being difficult to monitor and interpret at local level because of the small number of such events.

Counting the number of occurrences of an event that happens relatively infrequently, such as suicide, given the number of times that it could happen, follows a Poisson distribution. A Poisson distribution is specified by just one parameter – the mean. So, for example, if we know that in North Cheshire (population 350 000) the suicide rate is 11 per 100 000 with an annual average of 39 reported incidents, we can calculate the probability that there will be no suicides or a certain number of suicides within a year (Ryan *et al*, 1985) (Table 1).

**Table 1** Cumulative distribution function for suicides in North Cheshire<sup>1</sup>

Suicides in region (n)	P
≤ 15	<0.0001
≤ 20	0.0006
≤ 25	0.0113
≤ 30	0.1472
≤ 35	0.2939
≤ 40	0.6446
≤ 45	0.8508
≤ 50	0.9633

1. Assuming Poisson distribution, mean 39, base population 350 000.

According to Table 1, the probability of there being ≤35 suicides in a year within North Cheshire is  $P=0.29$ , meaning that there is a 29% chance that the number of suicides could be reduced from 39 to 35 (10% reduction) by chance alone. On the other hand, the probability of having 45 suicides or more in North Cheshire in a given year is  $P=(1-0.85)=0.15$ , which means that there is a 15% chance that there could be an increase in the number of suicides from 39 to 45 (15%) per year by chance alone. Neither the increase nor the reduction in the probability of suicide depends on any specific changes in the locally available mental health services.

The NSF target of 20% reduction in suicide rate means that in North Cheshire the rate will come down from 11 per 100 000 (i.e. a reduction of 8 suicides per year from 39 to 31) by 2010. Again, looking at the Poisson probability function, one can expect a 15% chance ( $P=0.147$ ) of 31 suicides or fewer occurring by chance alone. This means that we have a 15% chance of achieving the NSF target in reduction of suicide by good luck alone and without any effective psychosocial intervention or change in practice.

One may conclude that some change in suicide rate is expected to occur, and indeed does occur, within the same locality and independently of the mental health services, and is of no real significance. This could plausibly imply that a reduced suicide rate may be, at least partly, a statistical illusion due to reasons totally unrelated to the effectiveness or quality of psychiatric care. What is needed is a valid quality control model (similar to 'control charts' used so effectively in industry), and not just a single parameter, in order to reflect the complexity of suicide. Variables such as staffing