

## Book reviews

EDITED BY SIDNEY CROWN and ALAN LEE

### Neurobiology in the Treatment of Eating Disorders

Edited by Hans W. Hoek, Janet L. Treasure and Melanie A. Katzman. Chichester: Wiley. 1998. 529 pp. £95.00 (hb). ISBN 0-471-98102-8

The stated aims of this book are first, to integrate advances in biological sciences with aetiological concepts and second, to incorporate these data into therapeutic practice. The first aim is amply fulfilled. The relevant areas of neurobiology include the genetics of eating disorders, models of eating disturbances in animals (e.g. thin sow syndrome), the hypothalamic hypothesis of weight control and, in considerable detail, neurochemical models of anorexia and bulimia nervosa.

In some ways this book does not meet the second aim. The authors explain their difficulties according to each disorder. In anorexia nervosa refeeding and weight restoration are important to correct the effects of prolonged starvation which otherwise lengthen the course of the illness, but pharmacotherapy has little to offer. Neurobiological research has led to new drug treatments in bulimia nervosa, but the benefits are modest even in the short-term and are poorly sustained in the long-term. In binge eating disorder few biological correlates of overeating have been identified. In truth, therapeutic advances have been derived chiefly from clinical observations and the empirical use of controlled treatment trials. Nevertheless, the several chapters on the treatment of eating disorders are thorough and useful, covering appraisals of a wide range of psychological and drug treatments, numerous in bulimia nervosa but scarce in anorexia nervosa.

The central section of the text is concerned with the contributions of neurobiology to the aetiology and pathogenesis of the eating disorders. We learn that an earlier acceptance of a strong hereditary component of anorexia nervosa, based on studies of twins referred to hospital clinics, may need revision. In view of selection biases population-based studies might be preferable. It is perhaps disconcerting that a

twin study in Virginia, USA, failed to confirm the heritability of anorexia nervosa. On the other hand, an ongoing twin study in Denmark is confirming a higher rate of concordance in monozygotic than dizygotic twin pairs even in unselected samples.

The review of the hypothalamic hypothesis begins with the early experimental lesions of the dorsolateral nuclei in rats leading them to die from starvation, and proceeds to the wealth of studies on the role of neurotransmitters in weight regulation. The theory of hypothalamic control of eating and weight remains unproven but has been useful in stimulating relevant research in the human eating disorders. The role of neurotransmitters remains controversial. More recently the lipostatic hypothesis has gained support from animal studies with the discovery of the defective Ob gene in a strain of obese mice. This gene has an encoded hormonal product, leptin, secreted into the circulation in proportion to the body's adiposity. When leptin is deficient, obesity may ensue. It is hoped that these discoveries will lead to a greater understanding of energy intake and utilisation. In a chapter on neuroimaging techniques structural and functional abnormalities are described in anorexia nervosa but they are probably secondary to the malnutrition. A similar dilemma applies to changes in regional cerebral blood flow which have been described in these patients, but a primary underlying neurological abnormality has been proposed by the investigators who have undertaken this research in children with anorexia.

The remainder of the book is aimed at completing the overview of eating disorders by including chapters on the aetiology of anorexia and bulimia nervosa and drawing on epidemiological, behavioural and phenomenological data. Thus, the stated aim of the editors and most authors is accomplished, namely to adopt a multi-dimensional perspective. Without exception the chapters, written by internationally known experts, are thoughtful and informative. The most useful chapters are those achieving comprehensive reviews, for example, the assembly of all the psycho-

logical and treatment trials in bulimia nervosa up to 1998. Equally impressive is an exhaustive compendium of methods of assessing physical and psychological changes in patients with eating disorders, listing a huge number of self-report measures and structured interviews, even though the authors seem to regard these tools as more useful than the clinical interview in reaching a diagnosis.

The editors encouraged the authors to place their personal stamp on each chapter, but in doing so were sometimes too permissive. Adjoining chapters bear headings which betray an ambivalence with spelling: 'Etiology of Anorexia Nervosa' and 'Aetiology of Bulimia Nervosa'. The chapter on epidemiology concludes mistakenly that there is no convincing evidence that eating disorders in general are on the rise, when the authors mean anorexia nervosa in which the increase is confined to females aged 15-24 years over the past 50 years. Indeed, the rise in bulimia nervosa is accepted. Whereas there is a general enthusiasm for the multidimensional approach to aetiology one author states that it is more useful to hide our ignorance than reveal our knowledge. There is also an Australian proclivity for replacing the term eating disorders with 'dieting disorders'.

The main value of this book is its large bibliography concentrating on the research of the past 20 years. It should be read by everyone with a specialised interest in eating disorders and should be placed in all departmental libraries.

---

**Professor G. Russell** Emeritus Professor of Psychiatry and Consultant Psychiatrist, Hayes Grove Priory Hospital, Prestons Road, Hayes, Kent BR2 7AS

### A Guide to Treatments That Work

Edited by Peter E. Nathan and Jack M. Gorman. Oxford: Oxford University Press. 1998. 624 pp. £55.00 (hb). ISBN 0-19-510227-4

The aim of this book is succinctly stated by the title. It consists of a series of reviews of pharmacological and psychosocial treatments of a wide range of mental disorders. As it marks an acceptance that the treatment of mental health problems should be based on the best available research evidence, this book may become a landmark in the development of evidence-based