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Deirdre Barrett

Waistland. The (R)evolutionary Science Behind Our Weight and Fitness Crisis

New York: W.W. Norton & Company, 2007, 320 pp. \$24.95 (hbk.); ISBN: 978-0-393-06216-8

At first glance Barrett's *Waistland* follows the familiar format of numerous other diet books. There is a picture of a burger on the front, a catchy title, and a photo of the slim, successful-looking author on the back, accompanied by a list of impressive-sounding credentials. So, is Barrett's book really any different?

Barrett examines obesity and exercise from an evolutionary perspective. She starts by describing what we should be eating. According to Barrett we should be eating like our hunter-gatherer ancestors of over 10,000 years ago. In other words, lots of vegetables, moderate amounts of lean protein and fruit, and small amounts of nuts, seeds and eggs. White flour, refined sugar and trans fats are most definitely *not* on the list. She goes on to explain why we all want to eat what we shouldn't. Drawing on work by the ethologist Tinbergen she explains how these foodstuffs represent supernormal stimuli. Tinbergen constructed bird eggs that exaggerated the natural characteristics of real bird eggs – they were larger and had more prominent colours and markings. The birds preferred the fake eggs, often at the expense of the real ones. Barrett states that because sugars, salts and fats are relatively rare in the wild, we have evolved to prefer them. Thus today's burgers, sodas and doughnuts, with excessive amounts of sugar, salt and fat, represent supernormal stimuli which we consume at the expense of more natural and nutritious alternatives.

It's a similar story with exercise. Ten thousand years ago we were walking several miles a day, carrying hunting equipment and toddlers. When times were hard, those who conserved energy, by not doing very much, were more likely to survive. Thus unlike hamsters, who will happily spend half the day running round a hamster wheel, we humans have no instinct to exercise. Instead, given the choice, we are likely to do not very much at all.

Television makes the situation worse. According to Barrett this is another example of a supernormal stimulus. She refers to work by Pavlov on the 'orienting response'. This is an instinctive response to any sudden or novel stimulus, such as a sound or movement. It evolved to spot and assess food, mates, enemies and predators and involves turning in the direction of the stimulus and freezing. Barrett

suggests that programming such as commercials, action sequences and music videos provoke orienting responses at a rate of one per second, maintaining our attention but overloading the system and resulting in reductions in learning, memory and metabolism. Indeed she claims that metabolism averages 14.5% lower when watching television compared to simply lying in bed.

So what can we do about it? First we need to do more exercise, either by going to the gym, participating in a sport or considering a job that builds in exercise. Barrett makes some encouraging remarks about the benefits of exercise plus a few more unusual suggestions such as having business discussions whilst walking in the park. Second we need to stay away from the supernormal stimuli. Not just limit the TV, popcorn and candy but exclude them completely. Barrett goes on to compare junk food with addictive substances, suggesting that the only way to really rid yourself of cravings is to cut them out completely. More controversially she suggests we might learn a few things from people with anorexia. Whilst acknowledging the seriousness of this condition she nevertheless notes that people with anorexia 'know how to take weight off'. In particular they are aware that it is the first couple of days of food restriction that is the hardest, after which the cravings disappear.

However, going cold turkey on junk food is difficult. Barrett has two suggestions. The first is to make healthy food choices and exercise routines a matter of habit rather than as things we agonise over. The second is to practice exercising willpower. She discusses two techniques that could be used to improve willpower – cognitive behavioural therapy (CBT) and hypnosis, the latter supported by some feel-good success stories from her own clinic. Finally she talks about the importance of change at the societal level, for example cutting subsidies on foods such as white flour and butter and placing restrictions on advertising.

So is Barrett saying anything new? And is this book really the answer to our 'weight and fitness crisis'? The strength of the work lies in its insightful use of anthropology and ethology to account for our current behaviour and to suggest the kinds of eating and exercise plans that might be most beneficial for our health. Barrett's discussion is highly readable, well-referenced and should appeal to academics and lay persons alike. However, her suggestions for change are less convincing. Whilst her recognition of the importance of psychological approaches is welcome, this section of the book felt

underdeveloped. It is true that CBT and hypnosis have had some success with health behaviour change but there are many other equally promising techniques; motivational interviewing, implementation intentions, mindfulness strategies to name but a few. Some of these, such as implementation intentions, would be far more accessible to the average reader than sessions of CBT or hypnosis.

Barrett also overlooks the role of stress and socioeconomic status in health-related behaviours. Research shows that people in lower socioeconomic groups engage in more health-damaging behaviours (e.g., Drenowski & Specter, 2004). This does not seem to be down to a lack of education, but may be a means of helping the individual cope with day-to-day stresses (Graham, 1994). Indeed, there is a growing body of research indicating that stress severely limits our ability to exercise self-control (e.g., Greeno & Wing, 1994; Pecina, Schulkin & Berridge, 2006). Thus arguably, the people who need the most help are those who will be least able to implement Barrett's recommendations.

To conclude, this book would probably appeal to anyone looking for a fresh perspective on diet, exercise and obesity. If you are also highly motivated, lead a relatively stress-free life and have the money to pay for hypnosis it may even help you lose weight. However, if you enjoy the odd slice of chocolate cake or pint of beer it's probably not the diet for you.

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Linda D. Cameron and Howard Leventhal (Eds.), *The Self-Regulation of Health and Illness Behaviour*

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£95.00 (hbk); ISBN 0-415-29700-1

Self-regulation models are commonly applied in health psychology, given their potential ability to predict motivation and monitoring in the pursuit of health-related goals. The collected works of many international experts in self-regulation are presented in Cameron and Leventhal's volume *The Self-Regulation of Health and Illness Behaviour*.

The volume contains five sections covering (I) the theoretical background, (II) recent empirical and theoretical advances, (III) emotional processes, (IV) socio-cultural contextualisation and (V) health promotion and illness detection. Section I provides an informative history of self-regulation theories. Feedback loops are a key feature of self-regulation, hence their central role in both Scheier and Carver's self-regulatory model of goals (chapter 2) and Leventhal and colleagues' Common-Sense Model (CSM) of self-regulation in illness (chapter 3). Contrada and Coups (chapter 4) go on to cover a wide range of issues by interpreting personality theories and non-traditional intelligences within a self-regulation context.

In section II the importance of illness perceptions is reviewed for individuals with a number of chronic biomedically explainable illnesses (Kaptein et al.; chapter 5) and functional somatic syndromes (Moss Morris & Wrapson; chapter 6). Kaptein et al. provide an informative discussion of chronicity of illness. Their incorporation of qualitative studies of patients' narratives in their review alongside quantitative questionnaire studies provides balanced insight. Moss Morris and Wrapson present useful working definitions of a range of functional somatic syndromes and focus on the illness representations held by people with chronic fatigue syndrome (CFS). Horne's extension of the CSM to perceptions of medicinal treatments (chapter 7) is a relevant example of broadening the context of self-regulation and considering the common structure of perceptions across conditions.

Purely negative conceptions of certain emotional processes are challenged in section III. The potentially adaptive function of anxious states via processes such as self-discrepancy reduction is