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Health behaviour, risk awareness and emotional well-being in students from Eastern Europe and Western Europe

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Abstract

Life expectancy and other indices of health have deteriorated markedly in the former socialist countries of Eastern Europe over recent decades. The possible roles of lifestyles, knowledge about health and behaviour, emotional well-being and perceptions of control were assessed in a cross-sectional survey of young adults of similar educational status in Eastern and Western Europe. As part of the European Health and Behaviour Survey, data were collected in 1989–1991 from 4170 university students aged 18–30 years from Austria, Belgium, the Federal Republic of Germany, the Netherlands and Switzerland, and from 2293 students from the German Democratic Republic, Hungary and Poland. Measures were obtained of health behaviours, awareness of the role of lifestyle factors in health, depression, social support, health locus of control, and the value placed on health. After adjustment for age and sex, East European students had less healthy lifestyles than Western Europeans according to a composite index of 11 health behaviours, with significant differences for seven activities: regular exercise, drinking alcohol, avoiding dietary fat, eating fibre, adding salt to food, wearing a seat-belt, and using sunscreen protection. East European students were less likely to be aware of the relationship between lifestyle factors (smoking, exercise, fat and salt consumption) and cardiovascular disease risk. In addition, they were more depressed (adjusted odds of elevated scores on the Beck Depression Inventory of 2.46, 95% C.I. 1.95–3.09), reported lower social support, and had higher beliefs in the "chance" and "powerful others" locus of control. Internal locus of control levels did not differ across regions, and Eastern Europeans placed a higher valuation on their health. Unhealthy lifestyles associated with lack of information about health and behaviour, greater beliefs in uncontrollable influences, and diminished emotional well-being, may contribute to poor health status in Eastern Europe.

Keywords: UK; Health behaviour; Emotional well-being; Risk perception; Eastern Europe; Western Europe

Introduction

The differences in health and rates of premature mortality between Western Europe and Central and Eastern Europe are of major concern (Bobadilla, Costeool, & Mitchell, 1997; Hertzman, Kelly, & Bobak, 1996). Over the past 30 years, there has been a progressive increase in differences in life expectancy between the countries of the European Union and the countries of Central and Eastern Europe (Bobak & Marmot, 1996). For example, between 1970 and 1991, there were decreases in male life expectancy at age 15 in Hungary, Poland, Romania, and Bulgaria, compared with increases of more than three years in the European Union. Life expectancy at age 15 increased over the same period among women in Eastern Europe, but to a

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much lesser extent than among Western Europeans. Premature death from cardiovascular diseases and external causes are major contributors to this pattern.

A number of explanations for these trends have been put forward (Bobak & Marmot, 1996; Cockerham, 1997; 1999). Poor medical care in Central and Eastern Europe may make a limited contribution, though this is unlikely to account for more than 10% of the difference in all-cause mortality (Boys, Forster, & Jozan, 1991). Environmental pollution may also play a significant role, particularly in Poland, the former East Germany and the Czech Republic. However, it has been argued that health behaviours and psychosocial stress are the most important factors. Smoking, patterns of alcohol intake, and dietary factors such as fat and antioxidant consumption may all contribute, although there is uncertainty about the magnitude of differences between Western Europe and the former Communist states of Eastern Europe (Watson, 1995; Uitenbroek, Kerekovska, & Festchieva, 1996; Bobak et al., 1999).

The health behaviour explanation implies that Western and Eastern Europeans may differ not only in individual habits, but also in health-related lifestyles. A healthy lifestyle implies healthy practices across a range of personal behaviours and activities. Comparisons of a broad range of health behaviours between regions of Europe have been limited thus far. In the present study, we therefore investigated the prevalence of unhealthy options in twelve health behaviours, so as to obtain evidence concerning broad lifestyle differences between Western and Eastern Europe.

We also investigated factors that might be associated with differences in health behaviour. Cockerham (1997) has argued that unhealthy lifestyles in Eastern Europe are determined less by individual choice than by structural constraints embodied in reduced life chances. People may lack information about health and behaviour, or have little control over provision (limiting dietary and exercise choices), while living in societies in which unhealthy lifestyles are normative. These factors may be associated with a sense of powerlessness and fatalism engendered by the political system (Nagorski, 1993). Watson (1995) has emphasised that Eastern Europeans may experience cumulative frustration due to a mismatch between personal aspirations and the means of achieving them, and an inability to improve the material situation through exclusion by the state from activity in the public sphere. Chronic social stress resulting from feelings of disadvantage and uncertainty over fundamental shifts in economic and political organisation may also contribute, leading to a pervasive sense of lack of control.

We address these factors by assessing risk awareness, locus of control, the valuation of health, social support and depressive symptoms. If people living in Eastern Europe lack information about health and behaviour, then we predict that they will be less aware than their Western counterparts of the role played by habitual behaviours in disease risk. We tested this hypothesis by comparing the levels of awareness of the involvement of lifestyle factors (fat intake, salt intake, smoking, physical activity, etc.) in cardiovascular disease (heart disease and high blood pressure).

The hypothesised sense of powerlessness in East European citizens was indexed in terms of health locus of control. Health locus of control is a domain-specific control construct that indexes beliefs in different types of means-ends relationship (Skinner, 1996). Since it is specific to the domain of health, it may not reflect general perceptions of control. However, it is particularly relevant to the actions people carry out to maintain health. We have previously shown that health locus of control is associated with the likelihood of healthy behavioural choices (Steptoe & Wardle, in press). The association between low sense of control over life in general (and health in particular) and self-rated health has previously been described in a Russian sample (Bobak, Pikhart, Hertzman, Rose, & Marmot, 1998). However, the measures of control had poor internal consistency, and no comparison with other countries was possible. In the present analysis, we used the well-established Multidimensional Health Locus of Control scales that distinguish beliefs in internal control from beliefs in chance, and beliefs in powerful others (specifically health professionals). We predicted that respondents from Eastern Europe would have lower internal control beliefs and greater beliefs in chance than Western Europeans. We also hypothesised that Eastern Europeans would have stronger beliefs in the influence of powerful others over their health, since the Communist political system might have engendered greater dependence on authority than was apparent in Western Europe.

If differences in healthy lifestyles between Western and Eastern Europeans do exist, they might also be related to differences in valuations of health. People who do not place a high priority on health within their value systems are less likely to be concerned about carrying out activities that are hazardous to health in the long term (Norman & Bennett, 1996). We therefore administered a standard measure of the value of health, to assess whether respondents from Western and Eastern Europe differed in the importance they placed on health.

Finally, we tested psychosocial explanations for differences in health between Eastern and Western Europe by assessing depressive symptoms and social support. Differences in social stress might be expected to be translated into higher levels of depressive symptoms in Eastern Europeans, while greater social fragmentation could lead to reduced social support. The prevalence in depressive symptoms assessed in national representative surveys in Hungary increased markedly