

Does sports participation promote health? Challenges for providers

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Aim of paper

Public policy emphasises the need for individuals to participate in sport and physical activity to promote their health, both in the UK as well as internationally (WHO World Health Day, 2002). This paper examines the challenges faced in reaping such benefits by examining the determinants of sports participation but, crucially, distinguishing between factors contributing towards health giving levels of participation and those that do not. It follows that better policy advice can follow from identifying the factors that promote health-generating physical activity from those that do not.

Literature review

Sports policy in England emphasises contributing to recommended physical activity guidelines through encouraging 30 minutes of moderate intensity sport and active recreation on at least three days a week (Sport England, 2008). Achieving such policy targets can be informed by relevant research on the appropriate policy levers. A large sport management literature has investigated the socio-economic determinants of participation, stressing the impact of gender, age, income and education etcetera as well as the impact of facility provision. The research draws upon economic theories of time allocation, human capital formation, and sociological theory. However, the much smaller literature examining the impact of sports participation on health focusses only on non-validated single-item scales of subjective health and does not address the crucial distinction between participation in sport per se and participation of sufficient intensity to generate health (Downward et al, 2009; Wicker et al, 2009). Further, some medical studies that do distinguish these impacts do not account for the ordered nature of this choice, are based on relatively small samples and focus purely on socio-demographic variables and not supply side variables such as club and facility availability (Bergmann et al 2008). This paper seeks to fill this gap in the literature by using large-scale datasets to examine if socio-economic and sports facility variables affect sports participation of sufficient intensity to generate health benefits, to better inform policy.

Methodology, research design and data analysis

To model the health impacts of sports participation three waves of the Active People Survey, commissioned by Sport England, are used covering the periods 2007-2010. This generates a total sample of n=573,626. As the survey contains questions that address participation or not, its frequency over a four week period, its typical duration and, crucially its impact on breathing and sweating it is possible

to identify an ordered dependent variable measuring non-participation in sport, and participation of either a recommended health level or not. The survey also allows measurement of key socio-economic independent variables as well as membership of sports clubs and satisfaction with sports facility provision. The data is supplemented by facility data collected over the same period in the Active Places Survey, also commissioned by Sport England, to control for endogeneity between club-based participation, satisfaction with facilities and participation. A Zero-inflated Ordered Probit (ZIOP) estimator is then employed to model the participation decision. This estimator accounts for the ordered but discrete nature of the dependent variable. It also allows the distinct analysis of general participation in sport or not, as well as the difference in intensity of participation.. As the data also investigates participation based on the last four weeks, the estimator also accounts for excess zero responses that could be due to either never having participated in sport, or not currently doing so within that period.

Results, discussion and implications/conclusions

The results from estimates across the whole sample, and then separately for males and females, suggest that income and education, that is economic and human capital are robust determinants of recommended health levels of participation. Further, being a student promotes male participation of recommended health levels. Ageing generally reduces sports participation, but ageing individuals that do participate increase their levels as they age, though not to recommended levels. This is with the exception of retired males. Likewise the presence of children in the household does increase the overall chance of sports participation, but not to the recommended level for health benefits. Significantly, the results suggest that satisfaction with sports facilities and club memberships also promote sports participation, but it is only the latter that promotes the recommended health levels. The results re-emphasise the importance of encouraging sports club membership as a vehicle for obtaining health benefits from sport as well as some reorientation in ageing and family oriented activities perhaps in this direction to try to increase the intensity of participation.

References

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