

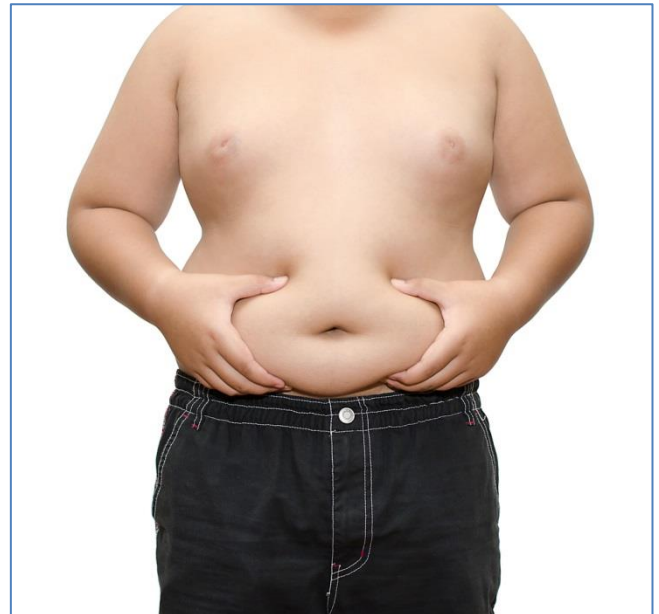
## Research Briefing N° 42

# Social and environmental interventions to reduce childhood obesity: a systematic map of reviews

This research considers evidence on the effectiveness of social and environmental interventions for the prevention or reduction of obesity and overweight in children and young people.

**Key words:** obesity; overweight; children; young people; social interventions; environmental interventions

The research was carried out by the **Institute of Education's Evidence for Policy and Practice Information and Co-ordinating Centre (EPPI-Centre)** in 2008 and funded by the Department for Health.



## Key findings

Policy makers, funders and researchers will be able to use this systematic map as a guide to the diverse mass of available evidence when planning policies and designing or appraising research proposals. The report brings together wide-ranging research from health, transport, urban planning, physical activity and food policy and is of use to decision makers and researchers from all these areas.

- We located 54 reviews of obesity-relevant research with a social and environmental focus, of which 32 were systematic reviews. Our results reflect the rapid recent growth in interest in this topic. Over half the reviews were published in 2004 or later.
- Most of the reviews covered the population as a whole and did not have a specific focus on children or young people. The reviews covered a wide range of intervention types and settings. Some were focused on specific intervention strategies such as mass media campaigns, financial instruments or point-of-sale information. Some investigated multi-component interventions which integrated social and environmental change with education and strategies for individual behaviour change, in either school or community settings. A number of reviews included studies covering all of these areas.
- Many reviews focused on studies which evaluated interventions which aimed to alter the social values attached to food and exercise, using, for example, education or social marketing techniques. We found few reviews which included studies evaluating large-scale structural changes to the physical environment or the availability or cost of food, exercise or sport.

## What we did

Both internationally and in the UK, there is widespread concern about rising rates of obesity and overweight. Since 2004, tackling obesity has been a policy priority for the UK government and efforts have particularly focused on halting the increases in childhood obesity.

There is increasing interest from both policy-makers and researchers in the social and environmental factors which influence obesity. These factors include the physical environment, social values, technology and the economy. Interventions that aim to change social and environmental factors in order to reduce obesity may include taxes or subsidies to encourage healthy eating or physical activity, extra provision of sporting facilities, efforts to improve safety and accessibility of walking and cycling or play areas or attempting to influence the social meanings and values attached to weight, food or physical activity. However, there is still not a robust understanding of the extent to which social and environmental interventions work to reduce obesity.

The aim of this piece of work, therefore, is to locate and describe existing review-level evidence on the effectiveness of social and environmental interventions for the prevention or reduction of obesity and overweight. The focus of the work is on evidence relating to children and young people.

## How we did it

We located reviews through searches of 21 databases in several fields, as well as 17 websites and contact with experts. Database searches used a broad strategy to maximise inclusiveness. Reviews were included if they: investigated some obesity-relevant topic; reviewed the effectiveness of interventions; included the 4 to 18 age group; were published in 1996 or later; and focused on social and environmental interventions. Two reviewers independently extracted information from the reviews and assessed quality. Any discrepancies were resolved in discussion. We did not look in detail at the studies included in the reviews because of the wide variation in the way that authors presented their study findings.

## Implications

- Reviews of all interventions, not only those based in schools, should assess the impact of interventions on children and young people.
- More reviews are needed of 'structural' or 'macro' interventions, such as policy interventions or changes to the built environment.
- The lack of data on large-scale structural or fiscal interventions may be due to the difficulty in setting up experiments to test the effects of these population-level changes. In future, research might explore how correlation data (examining relationships and trends) and qualitative data (examining people's views and experiences) could be combined with more traditional measures of effectiveness (such as measuring the outcome before and after an intervention) in order to improve the evidence-base in this field.
- Policy-makers should use this report as a map to navigate this complex field and identify which reports from the considerable review-level evidence might be worth retrieving and reading in order to answer their particular questions.

For the full report see [‘Social and environmental interventions to reduce childhood obesity: a systematic map of reviews’](#)

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