



Health inequalities: Overweight, obesity and underweight

Introduction

Malnutrition in all its forms has adverse health outcomes. Overweight and obesity is one of the leading global risks for mortality¹. Both overweight and obesity increase the risk of multiple health problems including Type 2 diabetes, some cancers and cardiovascular diseases². Underweight is also a global risk for burden of disease¹ and results in weakened immunity and nutritional deficiencies³.

Prevalence and risk factors

People with learning disabilities are much more likely to be either underweight or obese than the general population, although rates of underweight and obesity vary widely across studies^{4 5 6 7 8 9 10 11 12 13 14 15 16 17 18}.

Of 1,304 people with learning disabilities in supported accommodation in Northern England, 14% of participants were underweight, 28% overweight and 27% obese⁷. Data from GP records for 47% of patients in England in 2017/18 indicate that 61.5% of those with a recorded learning disability and 27.6% of those without a recorded learning disability had a body mass index (BMI) assessment in the prior 15 months¹⁹.

Of these, BMI was classed as underweight for:

- 6.4% of people with learning disabilities and 4.9% of other people
- overweight for 27.4% of people with learning disabilities and 32.0% of other people
- obese for 37.5% of people with learning disabilities and 29.9% of other people

Within the population of people with learning disabilities, there are increased risks of obesity for women, people with Down syndrome, people of higher ability, people living in less restrictive environments and women living in more deprived areas^{6 7 8 9 10 16 20 21}. Female gender has been found to be the most consistently observed risk factor for overweight/obesity status in individuals with learning disabilities¹⁸.

Few studies have looked at underweight among people with learning disabilities. Underweight is associated with more profound or severe learning disabilities. Of 1,450 adults with learning disabilities in the US, approximately 3% with borderline or

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mild learning disabilities were underweight, whereas 10% of participants with severe or profound learning disabilities were underweight²². Individuals with more profound disabilities may experience higher rates of undernutrition due to more feeding problems, chewing and swallowing problems, and general dietary risk²³.

Impact on people with learning disabilities

As for the population generally, high rates of obesity exacerbate the health problems of people with learning disabilities and significantly contribute to their reduced life expectancy²⁴. Among the general population, being overweight is associated with an increased risk of cardiovascular disease, diabetes, some cancers, stigma and bullying in childhood and poor mental health in adulthood²⁵.

Mental ill health, bullying and abuse are all more commonly experienced by people with learning disabilities than in the general population although it is not clear to what extent excess weight contributes to these problems²⁵. People with learning disabilities have higher rates than the general population of the conditions associated with being overweight, such as diabetes, heart failure and strokes^{25 26}. Less research attention has been paid to the issue of underweight among people with learning disabilities, but it is clear that underweight is associated with health risks in the general population, for example underweight has been found to be associated with an increased risk of infectious disease mortality²⁷. Underweight may also be associated with nutritional deficiencies, contributing to osteoporosis and anaemia, and a weakened immune system³.

Healthcare and treatment

Clinical guidelines on the management of obesity advocate multicomponent weight management interventions as the treatment of choice²⁸. There is a paucity of randomised controlled trials of multi-component weight management interventions for adults with learning disabilities and overweight/obesity²⁴. Current interventions, based on a health education approach are ineffective²⁴, although there is some evidence to suggest that multi-component weight management programmes can be adapted for adults with learning disabilities in ways that are accessible, acceptable and (in the short term) effective^{25 26}.

People with learning disabilities may not always be able to access the weight management programmes that are available to the general population²⁷. Guidance on making reasonable adjustments to obesity and weight management services for people with learning disabilities is available for those supporting people with learning disabilities to lose weight²⁷. Guidance is also available on caring for people who are malnourished or at risk of malnutrition in hospital or in their own home or a care home²⁹.

Social determinants

In England, obesity is associated with lower socioeconomic status, and this is more pronounced in women than men with 38% of women obese in the lowest quintile versus 18% women obese in the highest³⁰. Morbid obesity is associated with lower socioeconomic status in men and women in England³⁰. The availability and affordability of healthy foods and lower participation in physical activity may be important factors in lower socioeconomic groups³⁰.

Research suggests that the increased risk of obesity among people with learning disabilities may be attributable to their poorer living conditions (rather than their learning disability per se)³¹.

Resources

Public Health England (2016) [Making reasonable adjustments to obesity and weight management services for people with learning disabilities](#)

Cumbria, Northumberland, Tyne and Wear NHS Foundation Trust [Weight loss guide – easy read](#)

NHS [Managing weight with a learning disability](#)

Cumbria, Northumberland, Tyne and Wear NHS Foundation Trust [Weight loss guide – easy read](#).

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