Orthotic management of instability of the knee related to neuromuscular and central nervous system disorders: systematic review, qualitative study, survey and costing analysis

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Plain English summary

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People with neuromuscular and central nervous system conditions can experience knee instability, which may be treated using callipers or splints, known as 'orthotic devices'. Very little is known about the effectiveness of these devices, how often they are used, how much they cost the UK NHS or what patients think about them. This study aimed to investigate these knowledge gaps. Previous research was examined to find out what is already known about the effectiveness of these devices. Health-care professionals were asked to take part in a survey and interviews to identify the types of devices currently being provided by the NHS, how often they are used, their cost and professionals' views about the use of devices. Patients using devices were invited to talk to a researcher in a face-to-face interview about their views and experiences. Study results suggest that a number of different devices are provided in the NHS. However, we cannot tell from existing literature how effective they are, as very few studies examined the extent to which the devices help patients when they were used in real-life settings. Patients highlighted how important their device can be in helping them to work, support their family and take part in social and community activities. However, they were unhappy about some aspects of their treatment. Treatment outcomes considered important by patients are not being routinely measured. Further research is needed to identify how to best deliver cost-effective care concerning supply of devices to patients, which takes account of their concerns.

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