HSU HEALTH SCIENCES UNIVERSITY

Reducing the Cost of Falls: How Strength Training Can Support Healthy Ageing

Key Message

Improving and maintaining muscle health in older adults is an evidence-based opportunity to reduce falls risk and potentially reduce pressure on health and care services.

The Problem

Muscle strength declines with age, increasing the risk of falls, frailty and loss of independence. As the population ages, falls are placing growing pressure on health and care services, costing the NHS more than £2.3 billion annually.[1] A King's Fund analysis estimates the average system-wide cost of a fall at around £21,120 per person.[2]

What the Research Found

Our research evaluated a 12-week, twice-weekly progressive resistance-training programme for community-dwelling adults ≥65 years who felt weaker or declining in function. We found:

- Increased muscle strength and physical function in all participants.
- Reduced indicators of sarcopenia risk.
- Improved physiological indicators associated with healthier ageing, including blood pressure and BMI.

Policy Implications

The findings demonstrate that targeted strength-training programmes can improve muscle health, reduce falls risk and support healthy ageing. Investing in preventative, community-based interventions could help reduce demand on NHS and social care services while supporting older adults to remain independent for longer. The findings support the NHS's shift from treatment to prevention and from hospital-based care to community-based care.[3]

Policy Recommendations

Policymakers should:

1. Increase investment in accessible, community-based strength training initiatives for older adults.
2. Prioritise high-risk populations and areas with the greatest burden of falls.
3. Support the delivery of personalised, preventative strength-training programmes in community settings, using flexible models tailored to local needs.
4. Include a simple validated measure of muscle strength, such as grip strength or the five-times sit-to-stand test, within appropriate older-person and falls-risk assessments.









Source: Bright, K., Langridge, N. & Gerasch, F. (2026). *A personalised and structured resistance training approach to improving outcomes for those with or at risk of sarcopenia. Working with Older People.*

[1] https://www.nice.org.uk/guidance/ng249/evidence/economic-model-report-pdf-15308397325
[2] https://www.steadyonyourfeet.org/news/the-cost-of-falls-and-the-need-for-proactive-prevention
[3] https://www.england.nhs.uk/long-term-plan/