

Title: Risk factors associated with near-falls in community-dwelling older adults: a cross-sectional study

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Introduction: Falls are a leading cause of functional dependence and premature death in older populations. While fall risk factors are well-established, risk factors for near-falls—defined as trips, slips, or missteps where balance is lost but recovered independently—remain poorly investigated. Evidence suggests near-falls act as “precursors” and strong predictors for actual falls in older adults.

Objectives: To investigate factors associated with near-falls in community-dwelling older adults.

Methods: This cross-sectional study recruited 189 community-dwelling older adults. Participants were assessed for demographics, fear of falling, balance confidence, physical performance (including lower limb muscle strength, gait speed, and balance), cognitive function, and depressive and anxiety symptoms. The history of near-falls in the previous month was recorded via a standardized questionnaire. Logistic regression was used to evaluate associations between these outcomes and the history of near-falls.

Results: Fifty-three percent of participants reported one or more near-falls in the past month. Univariate analysis indicated significant associations between near-falls and fear of falling ($OR=2.20, p<.001$), balance confidence ($OR=0.98, p=.025$), lower limb muscle strength ($OR=1.05, p=.008$), depressive symptoms ($OR=1.13, p=.004$), and anxiety symptoms ($OR=1.11, p<.001$). Multivariate logistic regression identified fear of falling ($OR=2.14, p=.006$), lower limb muscle strength ($OR=1.05, p=.021$), and anxiety symptoms ($OR=1.11, p=.003$) as independent factors associated with near-falls.

Conclusion: Increased fear of falling, reduced lower limb muscle function, and anxiety symptoms are significant independent risk factors for near-falls in community-dwelling older adults. Future prospective studies are warranted to evaluate the predictive value of these factors for near-fall prevention.