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ORIGINAL ARTICLE

Frailty in the elderly living in the community with and without prior cerebrovascular disease☆

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KEYWORDS
Ageing;
Frail elderly;
Stroke;
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Abstract
Objective: To determine the prevalence of frailty in elderly people living in the community with and without cerebrovascular disease (CVD) and describe the main sociodemographic and clinical characteristics of these patients.
Material and method: Descriptive and cross-sectional study carried out between January and July 2016 in elderly people living in two specific areas of northern Portugal. Data were collected using a sociodemographic and clinical questionnaire. The existence of previous CVD was evaluated through an initial assessment and application of the Charlson Comorbidity Index. Frailty was assessed using the criteria of phenotypic methodology.
Results: A total of 435 participants, aged >65 years (mean = 74.3 years), mostly women (62.3%), were studied. Six point nine percent of the elderly people had a history of CVD. The prevalence of frailty syndrome was 60.0% in the elderly people with a history of CVD, and 20.5% in the other cases ($p < 0.05$). Statistically significant relationships ($p < 0.05$) were found between CVD and vision problems, fear of falling, hospitalisations in the last year, use of walking aids and perception of health status.

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Conclusion: Most of the elderly with a history of CVD were frail. According to the phenotypic theory, frailty is a state that precedes total dependence. The diagnosis and management of frailty may help to prevent adverse events that precipitate the institutionalisation of the elderly with CVD.

PALABRAS CLAVE
Envejecimiento;
Anciano frágil;
Accidente cerebrovascular;
Prestación de atención de salud

Fragilidad en ancianos que viven en la comunidad con y sin enfermedad cerebrovascular previa

Resumen
Objetivo: Determinar la prevalencia de fragilidad en ancianos que viven en la comunidad con y sin enfermedad cerebrovascular (ECV) y describir las principales características sociodemográficas y clínicas que presentan dichos pacientes.
Material y método: Estudio descriptivo y transversal realizado entre enero y julio de 2016 en personas mayores residentes en 2 zonas concretas del Norte de Portugal. Los datos se han recogido mediante un cuestionario sociodemográfico y clínico. La existencia de ECV previa se evaluó a través de una valoración inicial y aplicación del Índice de *comorbilidad de Charlson*, y la fragilidad utilizando los criterios de la metodología fenotípica.
Resultados: Se estudiaron 435 participantes, de edad > 65 años (media = 74,3 años), siendo en su mayoría mujeres (62,3%). El 6,9% de los ancianos tenía antecedentes de ECV. La prevalencia del síndrome de fragilidad fue de 60,0% en los ancianos con antecedentes de ECV y 20,5% en los restantes casos ($p < 0,05$). Relaciones estadísticamente significativas ($p < 0,05$) fueron encontradas entre ECV y problemas de visión, miedo a caer, hospitalizaciones en el último año, uso de ayudas para caminar y percepción del estado de salud.
Conclusión: La mayoría de los ancianos con antecedentes de ECV eran frágiles. Según la teoría fenotípica la fragilidad es un estado que precede a la dependencia total. El diagnóstico y la gestión de la fragilidad podrán ayudar a la prevención de eventos adversos que precipitan la institucionalización del anciano con ECV.

Introduction

There has been a demographic shift in Europe marked by the progressive ageing of the population. In Portugal, in particular, the proportion of elderly people in the population structure has significantly increased due to falling birth rates, increased life expectancy and the recent emigration phenomena.[1]

The ageing population and consequent increase in associated chronic disease pose a major challenge for health and social protection systems. New health policies are based on networked care to promote wellbeing, better management of hospital admissions and discharges, and improving long term care and continuity.[2] One of the main objectives of these new policies it to keep elderly people engaged with their families and their communities for as long as possible and with the best possible quality of life.[1]

Given this scenario, it is important to understand the health-related circumstances in which we can intervene after a correct diagnosis, as in the case of frailty syndrome. The literature defines frailty syndrome as a clinically recognisable state of vulnerability and decline in physiological reserves, which makes these people weak and compromises their ability to cope with everyday stress.[3] This state of vulnerability is considered a predictor of adverse events on health, such as institutionalisation or dependency.[3] According to this theory, dependency in the elderly is difficult to reverse, and is usually preceded by a state of frailty, in turn preceded by a state of prefrailty.[4]

The perspective that dependency has preceding conditions opens a real way forward towards its prevention. Frailty, therefore, is understood as a syndrome that can be identified by a frailty phenotype according to the presence of at least 3 of the following clinical criteria: involuntary weight loss, fatigue/exhaustion, low physical activity, slow walking speed and reduced muscle strength.[3]

There is a wide range of prevalence levels of frailty syndromes in elderly people living in the community (4–59%).[5] A study performed in the European context concluded that the prevalence of frailty is greater in the southern countries, indicating rates of 15% in France, 23% in Italy and 27.3% in Spain.[6] A research study on the elderly living in rural