Aging Pathobiology and Therapeutics 2026; 8(1): 103-105 ***103***
DOI: 10.31491/APT.2026.03.213

EDITORIAL

Prevalence of geriatric syndromes in patients with advanced dementia cared for by a Geriatric Home Care Unit

Arís Somoano Sierra[a,*], Blanca Garmendia Prieto[a], Francisco Sánchez del Corral Usaola[a], Javier Gómez Pavón[a]

[a] *Geriatrics Department, Hospital Universitario Central de la Cruz Roja, Madrid, Spain.*

Abstract

Geriatric syndromes are highly prevalent in older adults with advanced dementia, yet data in home-based geriatric care settings remain limited. We conducted a retrospective descriptive study including patients with advanced dementia (Global Deterioration Scale stages 6–7) attended by a specialized Home-Based Geriatric Care Unit between June and October 2021. Among 210 patients assessed, 48 (22.8%) had advanced dementia (mean age 90.8 years; 79.2% women). Severe or total dependence was present in 91.6%, all patients were frail (mean Clinical Frailty Scale 7.3), and the mean Charlson Comorbidity Index was 3.3. The most prevalent geriatric syndromes were urinary incontinence (100%), fecal incontinence (89.7%), sensory impairment (89.7%), insomnia (84.6%), caregiver burden (71.8%), dysphagia (69.2%), depressive syndrome (64.2%), pain (61.5%), and pressure ulcers (25.6%). Polypharmacy was frequent (mean 12.4 medications at admission), and 30-day mortality was 16.7%. These findings highlight the extreme clinical complexity of home-dwelling patients with advanced dementia and reinforce the importance of comprehensive geriatric assessment in this setting.

Keywords: Advanced dementia, geriatric syndromes, home-based care, frailty, comprehensive geriatric assessment

Geriatric syndromes (GS) are common clinical conditions in older adults with multifactorial causes and are associated with increased morbidity, mortality, and deterioration in quality of life [1]. Despite being potentially preventable, their detection is frequently inadequate in routine clinical practice.

The Home-Based Geriatric Care Unit (HGCU) at the Red Cross Central University Hospital (RCCUH) in Madrid provides care to frail older adults with significant functional impairment through a multidisciplinary team in coordination with primary care [2]. The unit is composed of geriatricians, nurses, and social workers who provide comprehensive geriatric assessment and follow-up through home visits, aiming to prevent hospital admissions and maintain patients in their home environment whenever possible. The criteria for admission to the HGCU include complex chronic elderly patients commonly presenting frailty and functional or cognitive impairment whose management aims to promote, maintain, or restore health, or, if this is not possible, to minimize the impact of disease and disability. In addition, patients must have a minimum level of social support that allows them to receive care at home.

The objective of this letter is to describe the prevalence of geriatric syndromes in the subgroup of patients with advanced dementia (GDS stages 6–7) attended by this unit during the study period. We performed a retrospective descriptive study between June and October 2021. Sociodemographic data, functional status (Barthel Index), frailty (Clinical Frailty Scale), comorbidity (Charlson Comorbidity Index), geriatric syndromes (urinary and fecal incontinence, dysphagia, pain, sensory impairment, pressure ulcers, insomnia, depressive syndrome), polypharmacy, caregiver burden, and 30-day mortality were recorded. Mortality at 30 days after discharge was also recorded.

Patients were eligible if they were admitted to the Home-Based Geriatric Care Unit during the study period and had advanced dementia defined as stage 6 or 7 on the Reisberg Global Deterioration Scale (GDS) at admission. Dementia diagnosis had previously been established by the referring physicians. Frailty was not used as a formal inclusion criterion for admission but was assessed at baseline due to its clinical relevance in this population.

* Corresponding author: Arís Somoano Sierra
Mailing address: Geriatrics Department, Hospital Universitario Central de la Cruz Roja, Avenida Reina Victoria no24, 28003 Madrid, Spain.
Email: aris.somoano@salud.madrid.org

Received: 24 January 2026 / Revised: 24 February 2026
Accepted: 20 March 2026 / Published: 31 March 2026

The Charlson Comorbidity Index was calculated without age adjustment. Data distribution was assessed prior to analysis, and continuous variables are presented as mean ± standard deviation. Dysphagia was assessed using the Clinical Examination Method for Volume and Viscosity (MECV-V), which allows evaluation of swallowing safety and tolerance to different fluid consistencies. Caregiver burden was identified through clinical assessment and documentation in the patient's medical record. All patients were managed within a home-based multidisciplinary care model involving home visits and coordination with primary care professionals.

During the study period, 210 patients were managed by the Home-Based Geriatric Care Unit. Of these, 48 patients (22.8%) met the inclusion criteria of advanced dementia (GDS 6–7) and constituted the study population analyzed. Among these patients, 81.3% were classified as GDS stage 6 and 18.7% as stage 7. The mean age was 90.8 ± 5.9 years, and 79.2% were women. In terms of living arrangements, 41.7% lived with family members, 20.9% with a spouse, 35.4% with a private caregiver, and 2.1% lived alone. 58.3% had private home help, 16.7% had public home help, 12.5% had both, and 12.5% had neither.

Although admission to the unit requires a minimum level of social support to allow home-based care, in many cases this support is provided by private caregivers due to the high level of functional dependence of the patients.

Overall, 91.6% presented severe or total dependence (mean BI 14.5 ± 14.3). The mean RDPDS score was 4.4 ± 0.6. All patients were classified as frail (mean CFS 7.3) and presented high comorbidity (mean Charlson Index 3.3 ± 2). At admission, the mean number of medications was 12.4 ± 4.9, which decreased to 9.6 ± 4.6 at discharge. Medication deprescription was performed in 84.7% of patients.

The most prevalent geriatric syndromes were urinary incontinence (100%), fecal incontinence (89.7%), sensory impairment (89.7%), insomnia (84.6%), caregiver burden (71.8%), dysphagia (69.2%), depressive syndrome (64.2%), pain (61.5%), and pressure ulcers (25.6%). Mortality at 30 days after discharge was 16.7%.

The results reflect a very elderly and predominantly female population, consistent with the greater longevity of women and with non-modifiable risk factors such as advanced age for the development of dementia.

The high levels of functional dependence and frailty observed in this cohort are partly expected given that advanced dementia (GDS ≥ 6) was an inclusion criterion for the study. Therefore, these findings should be interpreted within the clinical context of the population analyzed rather than as independent observations. The high prevalence of incontinence is consistent with advanced dementia stages [3], negatively affecting quality of life for both patients and caregivers and potentially leading to additional physical complications and healthcare costs.

Pain (61.5%) exceded figures reported in other home-care cohorts [4], possibly reflecting systematic assessment. Dysphagia was common, as expected in advanced neurodegenerative disease [5]. Pressure ulcers (25.6%) were comparable to previous Spanish home geriatric care experiences [6]. The relatively moderate prevalence of pressure ulcers may reflect the benefits of continuous home monitoring and caregiver involvement in preventive care. The mean number of medications at admission was high, indicating extreme polypharmacy in this population.

The prevalence of insomnia and depressive symptoms was higher than reported in some previous studies of older adults with dementia [4], where sleep disturbances and depressive symptoms have been reported in approximately 30–50% of patients. This may be explained by the advanced stage of dementia in the population analyzed. The mean CFS score of 7.3 indicates a cohort with very advanced frailty. In such populations, a high prevalence of geriatric syndromes and significant short-term mortality would be expected. The observed 30-day mortality of 16.7% may reflect the stabilizing role of multidisciplinary home-based care and close follow-up.

Emerging evidence suggests that circadian rhythm disruption (stemming from irregular sleep–wake cycles, shift work, and atypical timing of food intake) can negatively affect multiple physiological systems, including metabolism, hormonal regulation, and psychological well-being. In shift workers, for example, desynchronization between the intrinsic circadian clock and environmental cues has been associated with disturbed eating patterns, altered metabolic homeostasis, and increased risk of adverse health outcomes; the timing of food intake appears to play a crucial role in the maintenance of circadian synchrony and metabolic health [7]. While our study did not directly assess circadian variables, recognizing the potential impact of circadian misalignment on older adults functional and metabolic status could help frame future research aimed at understanding how lifestyle factors, such as meal timing and daily activity rhythms, might interact with vulnerability to geriatric syndromes.

This study is limited by its retrospective design and small sample size. However, data describing geriatric syndromes specifically in home-dwelling patients with advanced dementia remain scarce, and these findings contribute real-world information from a specialized geriatric home care program. Future studies should further explore the impact of home-based multidisciplinary care models on outcomes such as hospitalization rates, caregiver burden, and quality of life in this population.

In conclusion, geriatric syndromes are highly prevalent in patients with advanced dementia receiving home-based care. Early detection through comprehensive geriatric assessment in home-based care settings may contribute to improved quality of life and prevention of complications in this highly vulnerable population.

References

1. González Montalvo J, & Alarcón Alarcón T. Grandes síndromes geriátricos. Concepto y prevención de los más importantes. *Medicine - Programa de Formación Médica Continuada Acreditado*, 2003, 8(108): 5778-5785.

[Crossref]

2. Garmendia Prieto B, Sánchez Del Corral Usaola F, Avilés Maroto P, Ramírez Real L, Fernández Rodríguez A, & Gómez Pavón J. Evolution of the profile of patients attended by a hospital Geriatric Home Care Unit in the last 20 years. *Rev Esp Geriatr Gerontol*, 2022, 57(6): 291-297. [Crossref]
3. Fages-Masmiquel E, Ponjoan A, Blanch J, Alves-Cabratosa L, Martí-Lluch R, Comas-Cufí M, *et al*. The effect of age and sex on factors associated with dementia. *Rev Neurol*, 2021, 73(12): 409-415. [Crossref]
4. Baztán J, Gil L, Andrés E, Vega E, & Ruipérez I. Community care of the hospital geriatric service: practice of the coordination between primary care and the specialist. *Atención Primaria*, 2000, 26(6): 374-382. [Crossref]
5. Clavé P, Arreola V, Velasco M, Quer M, Maria Castellví J, Almirall J, *et al*. Diagnosis and treatment of functional oropharyngeal dysphagia. Features of interest to the digestive surgeon. *Cirugía Española*, 2007, 82(2): 62-76. [Crossref]
6. Serra Rexach J, Rexach Cano L, Cruz Jentoft A, Gil Gregorio P, & Ribera Casado J. Domiciliary geriatric care: 20 months' experience. *Rev Clin Esp*, 1992, 191(8): 405-411.
7. Reytor-González C, Simancas-Racines D, Román-Galeano N, Annunziata G, Galasso M, Zambrano-Villacres R, *et al*. Chrononutrition and energy balance: how meal timing and circadian rhythms shape weight regulation and metabolic health. *Nutrients*, 2025, 17(13): 2135-2143. [Crossref]

Cite this article as: Somoano Sierra A, Garmendia Prieto B, Sánchez del Corral Usaola F, & Gómez Pavón J. Prevalence of geriatric syndromes in patients with advanced dementia cared for by a Geriatric Home Care Unit. *Aging Pathobiol Ther*, 2026, 8(1):103-105. doi: 10.31491/APT.2026.03.213