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Prevention of functional decline in hospitalized older adults: a scoping review

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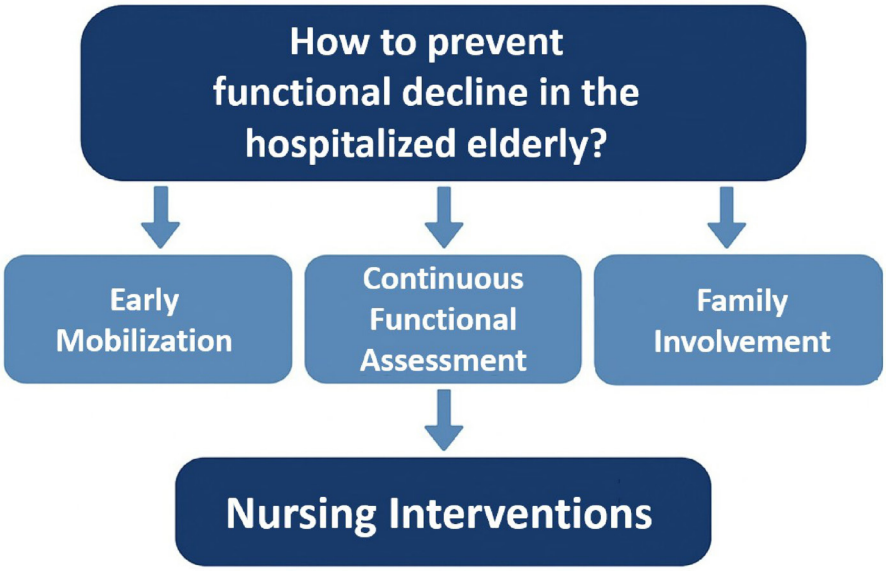
Graphical Abstract



Highlights

- *Early mobilization prevents functional decline during hospitalization.*
- *Continuous functional assessment guides personalized care.*
- *Family involvement increases adherence and autonomy of older adults.*
- *Protocols such as HELP reduce falls and length of hospital stay.*

Abstract

The increase in average life expectancy poses significant challenges to hospital care, particularly regarding the prevention of functional decline during hospitalization. This study aimed to map the strategies described in the literature and identify relevant contributions to clinical practice, focusing on nursing interventions directed at the prevention of functional decline in hospitalized older adults. A scoping review was conducted in accordance with the Joanna Briggs Institute (JBI) methodology, based on the PCC framework (Population: older adults; Concept: functional decline and nursing care; Context: hospitalization), through a search carried out in March 2025 across multiple databases. Fifteen articles were included for full-text analysis. The results highlighted three main thematic areas: factors promoting functional decline, factors facilitating functionality, and interdisciplinary care with nursing contributions. Among the identified strategies, early mobilization, continuous functional assessment, family involvement, promotion of self-care, and implementation of structured protocols stand out. The findings also highlight the role of nursing in the assessment, coordination, and continuity of care directed at the preservation of functional autonomy. It is concluded that nursing assumes a central role in the prevention of functional decline and in the promotion of functional autonomy of hospitalized older adults.

Keywords: Nursing Care. Functional Status. Exercise. Hospitalization. Aged.

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INTRODUCTION

Demographic aging is a widely recognized phenomenon, resulting from scientific and technological advances in health, improvements in socioeconomic conditions, and the implementation of public policies oriented toward the promotion of longevity. The progressive growth of the population aged 65 years or older – an age threshold widely used in health research and aging studies – poses significant challenges to health systems, requiring differentiated responses centered on the specific needs of this age group. Among these challenges, functional decline in the hospital context stands out, understood as the progressive loss of self-care capacity and autonomy during hospitalization[1].

The literature demonstrates that prolonged immobility, pre-existing frailty, and reduced physical and cognitive stimulation in the hospital environment constitute determining factors for the worsening of functional decline[2]. These conditions are associated with a higher risk of dependency following hospital discharge, increased morbidity, and prolonged length of stay.

In contrast, structured physical exercise interventions implemented during hospitalization have demonstrated efficacy in preserving functionality and reducing length of stay[2]. Similarly, self-managed and individualized interventions integrating physical exercise and nutritional support – initiated in the hospital setting and maintained at home – show significant improvements in muscle strength and in the reduction of frailty in pre-frail and frail older adults[3].

The early identification of frailty thus assumes a central role in defining preventive strategies and implementing personalized care. Validated instruments such as the Vulnerable Elders Survey[4] and the Fried Frailty Phenotype[5] enable the identification of older adults at increased risk of functional decline, allowing for the timely planning of interventions oriented toward the preservation of autonomy and the promotion of functionality.

In this context, nursing assumes particular relevance, given its continuous participation in functional assessment, monitoring of the older adult's needs, promotion of self-care, and liaison with the broader multidisciplinary team. Beyond the execution of specific interventions, the nurse contributes to the early identification of signs of functional loss, the implementation of preventive measures, and the continuity of care throughout hospitalization and in the transition process following discharge.

The present study consists of a scoping review conducted in accordance with JBI methodological guidelines[6], with the objective of mapping the strategies described in the literature and identifying relevant contributions to clinical practice in the field of nursing interventions oriented toward the prevention of functional decline in hospitalized older adults.

It is anticipated that this review will contribute to the strengthening of evidence-based practice, supporting the definition of health care policies and protocols that promote functional autonomy and quality of life in older adults during hospitalization and in the period following hospital discharge.

METHODOLOGY

The present study consists of a scoping review conducted in accordance with JBI methodology[6] and reported according to the recommendations of the Preferred Reporting Items for Systematic Reviews and Meta-Analyses – Extension for Scoping Reviews (PRISMA-ScR).

The research question was defined based on the PCC mnemonic: Population (P) — individuals aged 65 years or older; Concept (C) — functional decline and nursing care; and Context (C) — hospital admission. The guiding question formulated was: What nursing care described in the literature promotes the prevention of functional decline in individuals aged 65 years or older during hospitalization?

The literature search was conducted in March 2025 across the following databases: PubMed®, MEDLINE with Full Text®, CINAHL Complete®, Academic Search Complete®, MedicLatina®, Cochrane Library®, and LILACS. Language filters (Portuguese, Spanish, and English), full-text availability, and a time frame between January 2017 and March 2025 were applied, considering the increase in publications with greater methodological robustness after 2017.

Search strategies were adapted to each database, using controlled descriptors and Boolean operators. The search expressions applied were as follows: in PubMed® and MEDLINE with Full Text®: (Aged OR Geriatrics) AND (Hospitalization) AND (Functional Status OR Activities of Daily Living) AND (Nursing Care OR Nursing Assessment OR Nursing Process) AND (Exercise OR Exercise Therapy); in CINAHL Complete®: (MH "Aged") AND (MH "Hospitalization") AND (MH "Functional Status" OR MH "Activities of Daily Living") AND (MH "Nursing

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Care" OR MH "Nursing Assessment" OR MH "Nursing Process") AND (MH "Exercise" OR MH "Exercise Therapy"); in Academic Search Complete®: "Older Adults" AND "Hospitalization" AND ("Functional Status" OR "Daily Living Activities") AND ("Nursing Care" OR "Nursing Assessment") AND ("Exercise" OR "Exercise Therapy"); in Cochrane Library®: "Hospitalization" AND "Older Adults" AND "Nursing" AND ("Exercise" OR "Functional Decline"); and in LILACS and MedicLatina®, with DeCS descriptors: ("Idoso" OR "Geriatria") AND "Hospitalização" AND ("Estado Funcional" OR "Atividades da Vida Diária") AND ("Cuidados de Enfermagem" OR "Avaliação de Enfermagem" OR "Processo de Enfermagem") AND ("Exercício Físico" OR "Terapia por Exercício").

Study screening was performed in the Rayyan® platform, in a blinded and independent manner by two reviewers. Pre-defined inclusion criteria were applied: studies with populations aged 65 years or older, focused on functional decline in the hospital context, with specific nursing interventions, full text available, and methodologically robust designs – including randomized clinical trials, cohort studies, qualitative studies, quasi-experimental studies, and systematic or integrative reviews. Opinion studies, articles with significant methodological flaws, and studies that did not directly address the phenomenon under analysis were excluded.

The literature search identified 68 records in the selected databases. After removing duplicates and screening by title and abstract, potentially eligible studies were submitted to full-text evaluation. At this stage, 14 studies met the established inclusion criteria. One additional study was subsequently added through manual reference checking of selected articles, resulting in a final sample of 15 studies. The identification, screening, eligibility, and inclusion process is represented in the PRISMA diagram.

The study protocol was registered on the Open Science Framework® (OSF) platform, under DOI: https://doi.org/10.17605/OSF.IO/TNS7Z.

RESULTS

The search conducted across the various databases resulted in the inclusion of 15 studies as the final sample of this review, as illustrated in Figure 1.

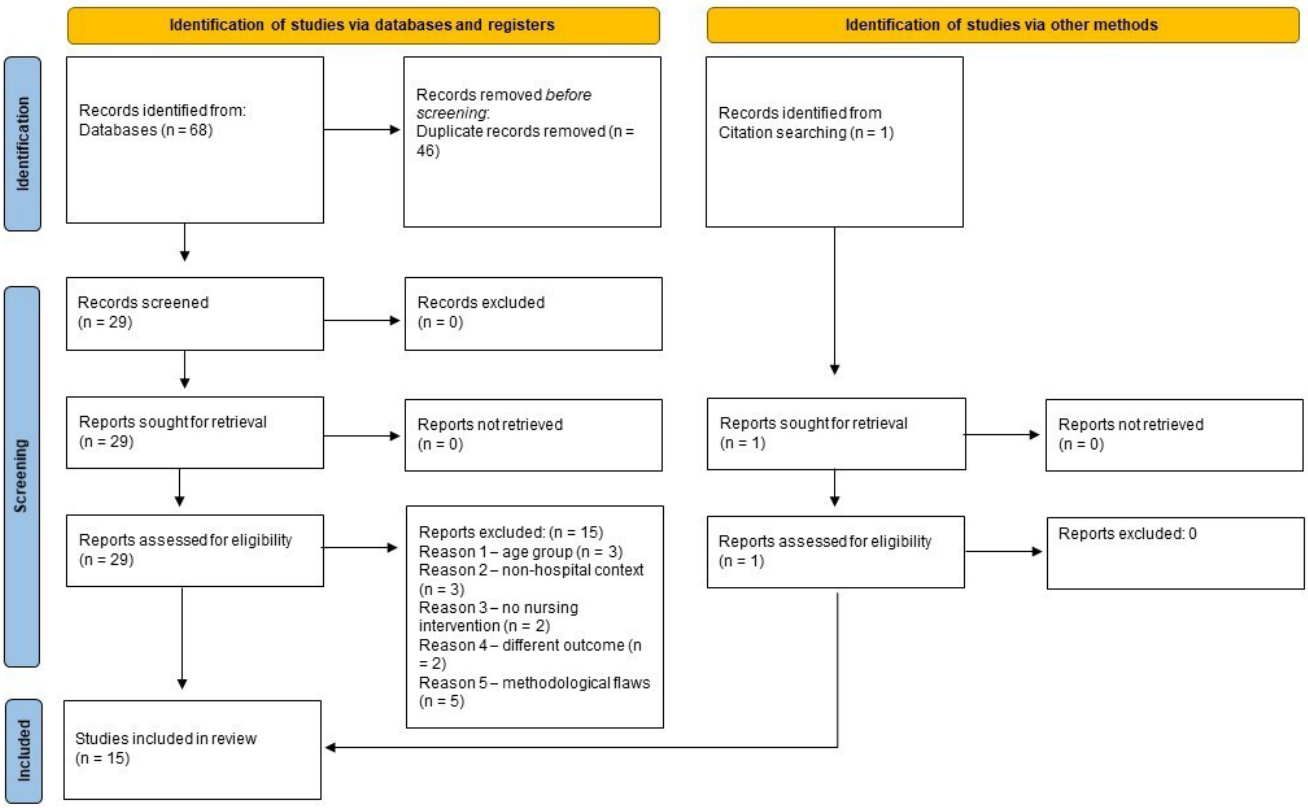

Figure 1 - PRISMA diagram of study selection.

Table 1 presents the classification of the evidence level of the 15 selected studies, in accordance with JBI guidelines applicable to intervention questions. A predominance of studies with high levels of evidence was observed, namely randomized clinical trials (level 1.c), systematic reviews with or without meta-analysis (levels 1.a and 1.b), and cohort studies with a control group (level 2.c). Qualitative studies, cross-sectional observational studies, and one quasi-experimental study were also included, offering complementary perspectives and relevant contributions regarding the factors involved in functional decline in hospitalized older adults.

It is important to note that some of the included studies – namely pilot randomized clinical trials and quasi-experimental studies – were classified as preliminary and exploratory evidence and should not be interpreted as conclusive, but rather as indicators of promising research trends. The methodological diversity of the studies reflects the breadth with which this topic has been explored in the context of hospitalization of older adults.

Table 1 - Characterization of studies according to JBI evidence levels.

No.	Authors	Abbreviated Title	Study Design	Evidence Level
1	Asteasu *et al.* (2019)[1]	Variability in exercise response in hospitalized older adults	Randomized clinical trial	1.c
2	Kanach *et al.* (2018)[2]	Review of structured exercise interventions	Systematic review of RCTs	1.a
3	Han *et al.* (2023)[3]	Exercise-nutrition self-managed intervention for frail older adults	Pilot randomized clinical trial	1.c*
4	Raymond *et al.* (2017)[7]	High-intensity functional exercise in hospitalised older adults	Randomized clinical trial	1.c
5	Chan *et al.* (2020)[8]	Older adult involvement in hospital self-care	Qualitative study	4.c
6	Santiago *et al.* (2021)[9]	Rehabilitation nursing care after rib fractures	Randomized clinical trial	1.c
7	Urquiza *et al.* (2020)[10]	Participation in post-hospitalization exercise programs	Cross-sectional study	3.e
8	Hshieh *et al.* (2018)[11]	Systematic review and meta-analysis of the HELP program	Systematic review with meta-analysis	1.a
9	Sandberg *et al.* (2024)[12]	Feasibility of the "PREV_FUNC" study – Pilot Trial	Pilot randomized trial	1.c*
10	Resnick & Boltz (2019)[13]	Optimizing function and physical activity	Integrative review	1.b
11	Butler & Fox (2019)[14]	Interprofessional communication and functional decline	Cross-sectional qualitative study	4.c
12	Liu *et al.* (2018)[15]	Multicomponent intervention for functional mobility	Cohort study with control group	2.c
13	Tavares *et al.* (2020)[16]	Functionality-centered care	Quasi-experimental study	2.d
14	Keenan *et al.* (2020)[17]	Nursing care for adults with cognitive impairment	Cross-sectional observational study	3.e
15	Surkan & Gibson (2018)[18]	Early mobilization and length of hospital stay	Cohort study with control group	2.c

Notes:
• (*) Indicates preliminary evidence
• Evidence levels assigned according to the JBI model

Table 2 presents the main findings of the included studies.

Table 2 - Data extraction from included studies.

	Author/Year	Country	Study Design	Objective	Population/ Sample	Intervention/ Study Focus	Assessment Instruments	Main Findings	Contribution to Prevention of Functional Decline
1	Asteasu *et al.* (2019)[1]	Spain	Randomized clinical trial	Analyze variability in the response to physical exercise in hospitalized older adults	Hospitalized older adults	Structured physical exercise program	Barthel Index; Fried Frailty Phenotype	48% maintained functionality in intervention group vs. 29% in control group	Supports the efficacy of individualized exercise interventions in preventing functional decline
2	Kanach *et al.* (2018)[2]	USA	Systematic review	Evaluate the effects of structured exercise interventions in hospitalized older adults	Hospitalized older adults	Structured exercise interventions	Multiple (ADL, mobility)	Exercise reduces functional decline and length of hospital stay	Reinforces exercise as a key intervention for preventing functional decline
3	Han *et al.* (2023)[3]	Australia	Pilot clinical trial	Evaluate a self-managed exercise-nutrition intervention for frail older adults	Pre-frail and frail hospitalized older adults	Individualized self-managed exercise–nutrition intervention (hospital–home)	Fried Phenotype; muscle strength and other functional tests	Reduction in frailty and significant improvement in physical and functional strength	Supports integrated exercise–nutrition approaches in preventing functional decline

to be continued...

...continuation - Table 2.

	Author/Year	Country	Study Design	Objective	Population/ Sample	Intervention/ Study Focus	Assessment Instruments	Main Findings	Contribution to Prevention of Functional Decline
4	Raymond *et al.* (2017)[7]	Australia	Randomized clinical trial	Evaluate the effect of high-intensity functional exercise on the functionality of hospitalized older adults	Hospitalized older adults ≥65 years	High-intensity functional exercise	Barthel Index	Rest >72h associated with 27% reduction in functionality; exercise preserved autonomy	Demonstrates the efficacy of early mobilization and structured exercise in preventing functional decline
5	Chan *et al.* (2020)[8]	Malaysia	Qualitative study	Explore older adults' perception of involvement in self-care during hospitalization	Hospitalized older adults	Patient involvement in self-care	Semi-structured interviews	Increased self-confidence, motivation, and participation in activities of daily living	Highlights active patient involvement as a preventive strategy against functional decline
6	Granados Santiago *et al.* (2021)[9]	Spain	Randomized clinical trial	Evaluate the impact of personalized rehabilitation nursing care	Older adults with fractures	Personalized rehabilitation nursing	Barthel Index	Mean increase of 15 points on the Barthel Index between discharge and follow-up	Demonstrates the impact of rehabilitation nursing on functional recovery and prevention of functional decline
7	Urquiza *et al.* (2020)[10]	Spain	Cross-sectional study	Identify determinants of participation in post-hospitalization exercise programs	Older adults post-hospital discharge	Adherence to post-discharge exercise	Questionnaires; sociodemographic and clinical characteristics	Family support and better functional status associated with higher exercise adherence	Highlights the importance of family support as a facilitating factor for therapeutic continuity after discharge
8	Hshieh *et al.* (2018)[11]	USA	Systematic review and meta-analysis	Evaluate the efficacy of the Hospital Elder Life Program (HELP)	Hospitalized older adults	Hospital Elder Life Program (HELP)	Multiple functional instruments	Significant reduction in mean length of hospital stay and incidence of falls	Demonstrates the efficacy of structured multicomponent programs in preventing functional decline
9	Sandberg *et al.* (2024)[12]	Sweden	Pilot clinical trial	Evaluate the feasibility of the PREV_FUNC program for preventing functional decline	Hospitalized older adults	PREV_FUNC program (Preventing functional decline in acutely hospitalized older patients)	Barthel Index; mobility tests; fall records	Intervention considered feasible, safe, and well accepted; trend toward less functional decline	Supports the development of structured nursing programs for preventing functional decline
10	Resnick & Boltz (2019)[13]	USA	Integrative review	Identify strategies to optimize function and physical activity in hospitalized older adults	Hospitalized older adults	Promotion of physical activity	Barthel Index; institutional fall records	Reduction of functional decline from 22% to 12% and decreased fall incidence	Highlights the central role of nursing in promoting physical activity
11	Butler & Fox (2019)[14]	Canada	Cross-sectional qualitative study	Analyze nurses' perspectives on interprofessional communication in the prevention of functional decline	Nurses in hospital settings	Interprofessional communication in preventing functional decline	Semi-structured interviews	Effective communication promotes the implementation of functional care	Reinforces nursing as the central link in care coordination
12	Liu *et al.* (2018)[15]	Canada	Cohort study with control group	Evaluate a multicomponent intervention to improve functional mobility	Hospitalized older adults	Multicomponent mobility intervention	Timed Up & Go; Barthel Index; fall records	Significant improvement in functional mobility and reduced fall incidence	Supports systematic functional assessment and nursing-led multicomponent interventions

to be continued...

...continuation - Table 2.

	Author/Year	Country	Study Design	Objective	Population/ Sample	Intervention/ Study Focus	Assessment Instruments	Main Findings	Contribution to Prevention of Functional Decline
13	Tavares *et al.* (2020)[16]	Portugal	Quasi-experimental study	Evaluate the efficacy of Functionality-Centered Care (FCC) in preventing functional decline	Hospitalized older adults ≥65 years	Functionality--Centered Care	Barthel Index; clinical records	62% increase in functionality-directed interventions during hospitalization	Demonstrates the efficacy of the functionality-centered care model in preventing functional decline
14	Keenan *et al*. (2020)[17]	USA	Observational study	Compare nursing care provided to older adults with and without cognitive impairment	Older adults with and without cognitive impairment	Differentiated nursing care	Electronic clinical records; nursing care indicators	Differences in the frequency and type of nursing care provided to older adults with and without cognitive impairment	Highlights the need for differentiated functional monitoring in older adults with cognitive impairment
15	Surkan & Gibson (2018)[18]	Canada	Cohort study	Examine the impact of early mobilization on length of stay and functionality	Hospitalized older adults	Early mobilization interventions during hospitalization	Barthel Index; fall records	Mobilization associated with less functional decline, shorter length of stay, and lower fall incidence	Supports the implementation of institutional early mobilization protocols to prevent functional decline

It was considered appropriate to organize the analysis of results into three thematic areas: factors promoting functional decline, factors facilitating functionality, and interdisciplinary care with nursing contributions.

Factors Promoting Functional Decline

Prolonged immobility during hospitalization was identified as one of the main determinants of functional decline in hospitalized older adults[7]. Evidence from a randomized clinical trial demonstrated that rest periods exceeding 72 hours were associated with a 27% reduction in functional performance as assessed by the Barthel Index, reinforcing the negative impact of inactivity on autonomy[7].

Pre-existing frailty also constitutes a factor associated with greater clinical vulnerability. Its identification through validated instruments such as the Vulnerable Elders Survey[4] and the Fried Frailty Phenotype[5] enables the recognition of older adults at heightened risk of functional loss during hospitalization.

Additionally, the absence of active involvement of the older adult in their own care was associated with greater functional losses, with better functional performance and lower dependency at hospital discharge observed among patients encouraged to participate in self-care activities[9].

Factors Facilitating Functionality

Early, structured, and guided mobilization has been consistently described as an effective strategy for preserving functionality in hospitalized older adults. Evidence from a randomized clinical trial demonstrated that 48% of participants subjected to supervised physical exercise sessions maintained functional autonomy until hospital discharge, compared to 29% in the control group[1], reinforcing the importance of implementing structured programs during hospitalization. Accordingly, personalized rehabilitation care also demonstrated a positive impact on functional recovery and the promotion of autonomy in hospitalized older adults[9].

Family involvement emerged as a relevant facilitating factor in adherence to functional routines and exercise programs, both during hospitalization and after discharge[10], contributing to greater motivation, continuity of care, and reinforcement of self-care.

Structured multicomponent programs such as the Hospital Elder Life Program (HELP) demonstrated significant reduction in mean length of hospital stay and incidence of hospital falls[11], demonstrating the positive impact of systematized organizational interventions on the preservation of functionality.

Recent studies also point to the feasibility and potential benefit of innovative programs and integrated interventions adapted to the clinical context[12], as well as the contribution of physical activity interventions supported by continuous care team monitoring in maintaining functional autonomy and in reducing episodes of decline,

frailty, and falls[13].

Interdisciplinary Care and Nursing Contributions

The analyzed results show that the prevention of functional decline does not depend on a single isolated intervention, but on an interdisciplinary approach centered on functionality, in which nursing assumes a relevant role. In this domain, the nurse participates in systematic functional assessment, monitoring of clinical progress, promotion of self-care, liaison with other professionals, and continuity of guidelines throughout hospitalization[14].

The regular use of validated instruments such as the Barthel Index and the Timed Up & Go test enables standardized monitoring of functional progression, facilitating early identification of functional losses and timely adaptation of the care plan[15].

Evidence from a quasi-experimental study demonstrated that the implementation of the Functionality-Centered Care (FCC) model resulted in a significant increase in interventions directed at functional preservation during hospitalization[16]. Despite moderate professional adherence (46%), the experimental group benefited from more frequent and structured practices, demonstrating a positive impact on the prevention of functional decline.

The importance of effective interprofessional communication is similarly highlighted in the literature, with nursing identified as the central element in the coordination of personalized care and in the articulation between the different interventions directed at the hospitalized older adult[14]. Additionally, the literature highlights the need for differentiated functional monitoring and appropriate adjustment of nursing care for older adults with cognitive impairment, given the variation in the frequency and type of care provided to this group[17].

Organizational strategies and mobilization-oriented interventions demonstrated the potential to favor the personalization of care and reinforce interventions directed at the maintenance of functionality[18].

DISCUSSION

This scoping review demonstrated that functional decline in hospitalized older adults results from a set of interdependent factors of a clinical, functional, and organizational nature. Among these factors, prolonged immobility during hospitalization stands out consistently in the literature as an element associated with loss of autonomy, reduction in functional capacity, and worsening of dependency[7]. This finding suggests that the hospital environment, when excessively centered on rest and risk containment, may contribute to functional limitation in the older adult.

The analyzed results demonstrate that structured interventions – namely early mobilization programs, supervised exercise, and personalized rehabilitation care – produce measurable gains in the preservation of functional autonomy[1,9]. However, these benefits tend to depend on their integration into systematized care practices sustained by formal protocols and effective interdisciplinary coordination. In this context, nursing assumes a strategic role, not only in the execution of interventions, but also in the continuous monitoring of functionality, the early identification of signs of decline, and the articulation between the different professionals involved in care[14].

Family involvement also emerges as a relevant facilitating factor in consolidating functional gains and adhering to therapeutic routines[10], reinforcing the importance of care models centered on the older adult and their relational context. Similarly, structured multicomponent programs such as HELP demonstrate that systematized organizational interventions can reduce length of stay and fall incidence[11], highlighting that the prevention of functional decline requires integrated approaches sustained by institutional policies.

Despite the availability of validated instruments for functional assessment such as the Barthel Index and the Timed Up & Go, their systematic use remains inconsistent[15]. This limitation compromises the early detection of functional losses and hinders the timely implementation of preventive strategies. In this domain, nursing reveals particular relevance, as it is in a privileged position to conduct regular functional assessment, monitor the progression of the older adult throughout hospitalization, and adjust the care plan according to identified needs.

The analyzed evidence further reinforces that the active involvement of the older adult in decisions and self-care activities is associated with better functional outcomes and greater autonomy at hospital discharge[8]. In this framework, the role of the nurse proves to be structurally significant, both in promoting the participation of the older adult and in encouraging self-care, health education, and the continuity of guidelines during hospitalization and at the moment of transition following discharge[14].

Concurrently, emerging programs and strategies

adapted to the needs of hospitalized older adults point to the potential for expanding the concept of functional care[12]. However, the successful implementation of these initiatives requires an organizational culture oriented toward functionality, investment in continuous training, and leadership committed to the prevention of functional decline. Also in this regard, nursing may assume a relevant role, both in operationalizing interventions and in promoting evidence-based practices within care teams.

Collectively, the results of this review point to the need for a transition from care models predominantly centered on disease to approaches oriented toward functionality, in which the prevention of functional decline is understood as a shared responsibility among different professionals – with a particularly relevant role for nursing in the assessment, coordination, monitoring, and continuity of care.

CONCLUSION

The results of this scoping review demonstrate that functional decline in hospitalized older adults results from a complex interaction of clinical, functional, and organizational factors, with prolonged immobility standing out as a critical determinant of functional loss. Pre-existing frailty and the absence of structured mobilization strategies reinforce the vulnerability of this population during hospitalization.

The analyzed evidence demonstrates that interventions such as early mobilization, supervised exercise, personalized rehabilitation care, systematic functional assessment, family involvement, and the promotion of active participation of the older adult in self-care constitute effective strategies for preserving functional autonomy. Structured multicomponent programs such as the Hospital Elder Life Program (HELP) demonstrate consistent benefits in reducing the incidence of falls and decreasing length of hospital stay, reinforcing the importance of integrated organizational approaches sustained by scientific evidence.

Nursing assumes a relevant role in the operationalization of these strategies, both through continuous functional monitoring and through interprofessional coordination of care, promotion of self-care, and continuity of care. Effective articulation among professionals – with a particularly relevant contribution from nursing – proves to be decisive for the implementation of individualized, functionality-centered interventions.

In light of the identified results, the consolidation of evidence-based practices in the hospital context is recommended, with the implementation of standardized mobilization protocols, systematic application of functional assessment instruments, and active involvement of the older adult in their care plan.

It is important to acknowledge, however, as limitations of this review, the methodological heterogeneity of the included studies and the diversity of the interventions analyzed – factors that limit the direct comparability of results. Nevertheless, this review contributes to systematizing the available evidence and reinforces the relevance of nursing in the prevention of functional decline, offering useful contributions to clinical practice, care organization, and future research in this area.

Future research should deepen the efficacy of the different stages of the nursing process in mitigating functional decline, contributing to the reinforcement of safety, quality, and sustainability of care provided to hospitalized older adults.

Data and materials availability

The study protocol is registered on Open Science Framework (OSF): DOI https://doi.org/10.17605/OSF.IO/TNS7Z. Extracted data and the full search strategy are available upon request to the corresponding author following publication.

CRediT author statement

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All authors have read and agreed to the published version of the manuscript.

Declaration of competing interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

REFERENCES

1. Asteasu ML, Martínez-Velilla N, Zambom-Ferraresi F, Casas-Herrero Á, Izquierdo M. Inter-individual variability in response to exercise intervention or usual care in hospitalized older adults. J Cachexia Sarcopenia Muscle. 2019;10(1):126-34. doi:10.1002/jcsm.12481.
2. Kanach FA, King AC, Boulé NG, Chiou KR. Effects of structured exercise interventions for older adults hospitalized with acute medical illness: a systematic review. J Aging Phys Act. 2018;26(2):284-303. doi:10.1123/japa.2016-0372.
3. Han CY, Sharma Y, Yaxley A, Baldwin C, Woodman R, Miller M. Individualized hospital-to-home exercise-nutrition self-managed intervention for pre-frail and frail hospitalized older adults: the INDEPENDENCE randomized controlled pilot trial. Clin Interv Aging. 2023;18:809-25. doi:10.2147/CIA.S405144.
4. Saliba D, Elliott M, Rubenstein LZ, et al. The Vulnerable Elders Survey: a tool for identifying vulnerable older people in the community. J Am Geriatr Soc. 2001;49(12):1691-9. doi:10.1046/j.1532-5415.2001.49281.x.
5. Fried LP, Tangen CM, Walston J, et al. Frailty in older adults: evidence for a phenotype. J Gerontol A Biol Sci Med Sci. 2001;56(3):M146-M57. doi:10.1093/gerona/56.3.M146.
6. Peters MDJ, Godfrey CM, Khalil H, McInerney P, Parker D, Soares CB. Guidance for conducting systematic scoping reviews. Int J Evid Based Healthc. 2015;13(3):141-6. doi:10.1097/XEB.0000000000000050.
7. Raymond MJ, Blizzard L, Moyle W, Callisaya ML, Martin P. The effects of a high-intensity functional exercise group on clinical outcomes in hospitalised older adults: an assessor-blinded randomized controlled trial. Age Ageing. 2017;46(2):208-13. doi:10.1093/ageing/afw215.
8. Chan EY, Samsudin SA, Lim YJ. Older patients' perception of engagement in functional self-care during hospitalization: a qualitative study. Geriatr Nurs. 2020;41(3):297-304. doi:10.1016/j.gerinurse.2019.11.009.
9. Granados Santiago M, Valenza MC, Prados Román E, López López L, Muñoz Vigueras N, Cabrera Martos I, et al. Impacts of tailored rehabilitation nursing care on functional ability and quality of life in hospitalized elderly patients after rib fractures. Clin Rehabil. 2021;35(11):1544-54. doi:10.1177/0269215521102273.
10. Urquiza M, Echeverria I, Besga A, et al. Determinants of participation in a post-hospitalization physical exercise program for older adults. BMC Geriatr. 2020;20(1):408. doi:10.1186/s12877-020-01821-3.
11. Hshieh TT, Yue J, Oh E, et al. Hospital Elder Life Program: systematic review and meta-analysis of effectiveness. Am J Geriatr Psychiatry. 2018;26(10):1015-33. doi:10.1016/j.jagp.2018.06.007.
12. Sandberg L, Boström AM, Hagströmer M, et al. Feasibility of the Preventing functional decline in acutely hospitalized older patients (PREV_FUNC) study: a randomized pilot trial. PLoS One. 2024;19(6):e0304570. doi:10.1371/journal.pone.0304570.
13. Resnick B, Boltz M. Optimizing function and physical activity in hospitalized older adults to prevent functional decline and falls. Clin Geriatr Med. 2019;35(2):237-51. doi:10.1016/j.cger.2019.01.003.
14. Butler JI, Fox MT. Nurses' perspectives on interprofessional communication in the prevention of functional decline in hospitalized older people. Health Commun. 2019;34(9):1053-9. doi:10.1080/10410236.2018.1455141.
15. Liu B, Moore JE, Almaawiy U, et al. Evaluation of a multicomponent intervention to improve mobility in hospitalized older adults: a controlled pre-post study. BMC Geriatr. 2018;18:27. doi:10.1186/s12877-018-0710-1.
16. Tavares JPA, Grácio J, Nunes LV. Eficácia da implementação do cuidado centrado na funcionalidade no declínio funcional: um estudo quase-experimental. Rev Enferm Ref. 2020;5(2):e20012. doi:10.12707/RV20012.
17. Keenan GM, Yakel E, Yao Y, et al. Nursing care for hospitalized older adults with and without cognitive impairment. Nurs Res. 2020;69(2):116-26. doi:10.1097/NNR.0000000000000407.
18. Surkan MJ, Gibson W. Interventions to mobilize elderly patients and reduce length of hospital stay. Can J Cardiol. 2018;34(7):881-8. doi:10.1016/j.cjca.2018.04.033.

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