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Beyond the Fall: Building Safer Pathways in Post-Acute and Long-Term Care

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Agenda

1. The challenge of falls in facilities
2. Clinical assessment
3. Falls as a geriatric syndrome

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Background

> An event which results in a person coming to rest inadvertently on the ground or floor or other lower level.

World Health Organization
Fall definition

“Fall” refers to unintentionally coming to rest on the ground, floor, or other lower level, but not as a result of an overwhelming external force (e.g., resident pushes another resident). An episode where a resident lost his/her balance and would have fallen, if not for another person or if he or she had not caught him/herself, is considered a fall. A fall without injury is still a fall. Unless there is evidence suggesting otherwise, when a resident is found on the floor, a fall is considered to have occurred

CMS Fall Definition

SOM - Appendix PP

Epidemiology

3 million emergency dept visits annually due to older person falls

1 million fall related hospitalizations annually

Injuries related to falls cost $31 billion (in 2015) and is estimated to cost 74 billion by 2030

Falls are the leading cause of both fatal and nonfatal injuries in adults aged 65 and older

In 2023 41,400 deaths from falls in older adults

1.3 million people fall in nursing facilities every year

57.9% of individuals living in long term care fall every year and 24% of these cases result in hospitalization

Falls are the leading cause of injuries in long term care

Cost of falls in facilities

Facilities must allocate resources for staff training, environmental modifications and technology to enhance safety

Facilities spend an average of $380,000 a year on fall related expenses

1/3 of lawsuits in the US against nursing homes alleged that a potentially avoidable fall contributed to injury under review

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The human experience of falls

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Poll Question: Have you fallen in the past 30 days?

1.) Yes

2.) No

Falls can profoundly impact lives, affecting not only physical health but also emotional well being

44% of seniors report feeling ashamed after falling

43% report increased anxiety after a fall

Safely you 2022 state of falls report

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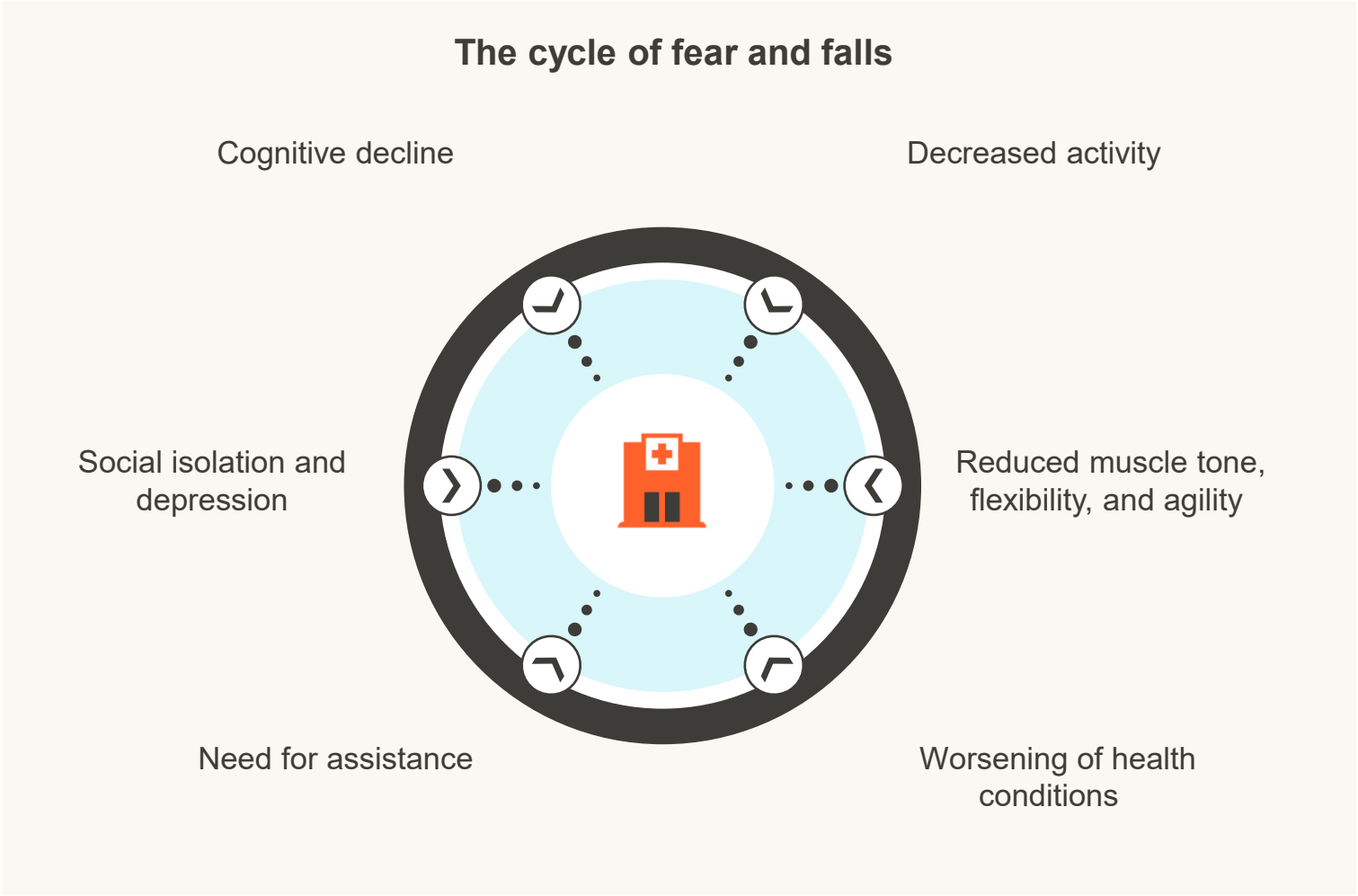
A turning point



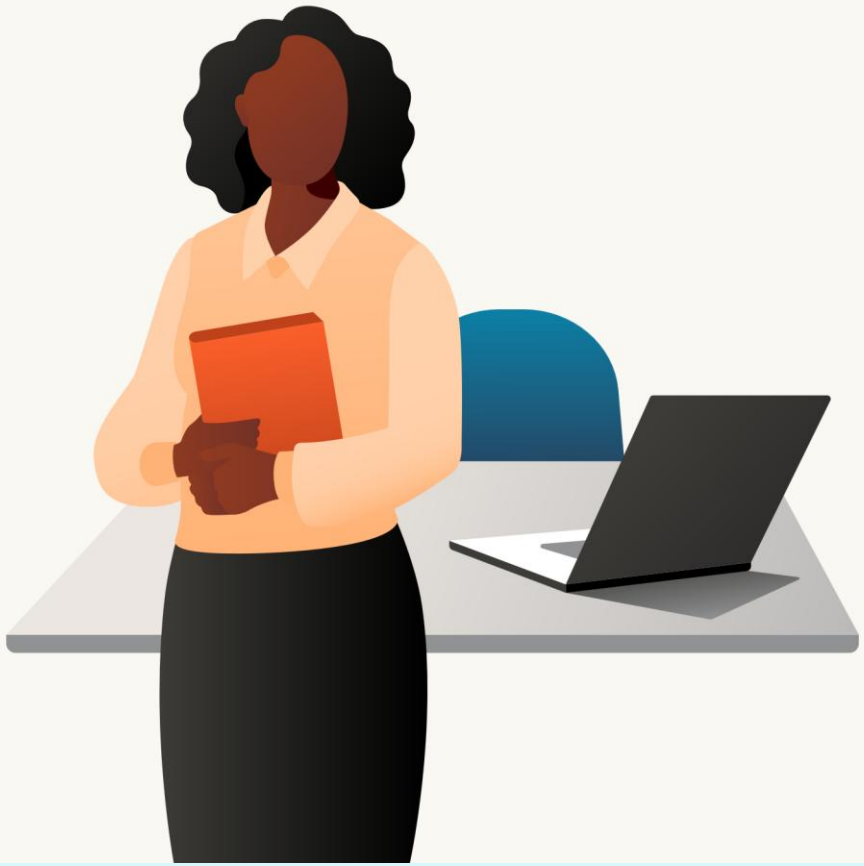
Why do most seniors fear falling

Loss of independence is the hardest psychological effect of falls

The challenge of falls in a facility

F 689

§483.25(d) Accidents • The facility must ensure that –
(1) The resident environment remains as free of accident hazards as is possible;
and
(2) Each resident receives adequate supervision and assistance devices to prevent accidents.



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CMS requirements for SNF

Skilled nursing facilities are required to maintain a current log of all falls, any fall with major injury must be self-reported to the CMS hotline.

All falls require an investigation by the facility to determine cause and an intervention to prevent recurrence implemented

All falls can be reviewed by CMS surveyors to establish if it was avoidable VS unavoidable, and to determine if the facility was compliant or non-compliant with the F tag

Updated definition

A fall with major injury is defined as a fall that results in a fracture, subluxation,dislocation, internal organ injury, amputation, spinal cord injury, head injury or crushtype injury

“Avoidable Accident” means that an accident occurred because the facility failed to: • **Identify environmental hazard**s and/or **assess individual resident risk of an accident**, including the need for supervision and/or assistive devices; and/or • Evaluate and analyze the hazards and risks and **eliminate** them, if possible, or, if not possible, identify and **implement measures to reduce the hazards/risks** as much as possible; and/or • **Implement interventions**, including adequate supervision and assistive devices, consistent with a resident’s needs, goals, care plan and current professional standards of practice in order to eliminate the risk, if possible, and, if not, reduce the risk of an accident; and/or • **Monitor the effectiveness of the interventions and modify the care plan as necessary**, in accordance with current professional standards of practice.

Numerous and varied accident hazards exist in everyday life. Not all accidents are avoidable. The frailty of some residents increases their vulnerability to hazards in the resident environment and can result in life-threatening injuries. It is important that all facility staff understand the facility’s responsibility, as well as their own, to ensure the safest environment possible for residents.

CMS guidance

Key elements of non-compliance

To cite deficient practice at F689, the surveyor's investigation will generally show that the facility failed to do one or more of the following:

- Identify and eliminate or reduce all known and foreseeable accident hazards in the resident’s environment, to the extent possible
- Provide appropriate and sufficient supervision to each resident to prevent an avoidable accident
- Provide assistive devices necessary to prevent an avoidable accident from occurring

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Quality measures

Care Compare

All skilled nursing facilities are required to submit data on specified quality measures through the use of standardized resident assessments such as the MDS, this information is then compiled and presented in the care compare tool on medicare.gov to help consumers make informed decisions

Falls with major injury

Falls with major injury is a key metric in the SNF quality reporting program (AKA star ratings) one of both short and long stay publicly reported quality measures

Facility staff is required to:

- *identify and evaluate hazards and risk for all residents;*
- *implement interventions to reduce hazards and risks;*
- *and monitor for effectiveness and modify interventions when necessary.*

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Clinical Assessment

Poll

Antipsychotics use

History of prior fall

Dementia

Rugs, bugs, and drugs

Which is the strongest clinical predictor of falls?

Fall history

History of 2 or more recent falls

Document on problem list

Kazdan 2026

Algorithm for fall assessment

Does the resident have a history of falls?	Is the resident at risk of falling?	Has the resident just fallen?	Evaluate the factors associated with the resident’s fall	Identify the resident's actual and potential complications of falls
A history of prior falls is the strongest predictor of future falls	Intrinsic Factors Extrinsic Factors	• Initial Assessment • Post stabilization	• Nature of falls • Frequency • Review the chain of events that preceded the fall • Determine whether the fall is new or recurrent • Causes	• Falling sideways poses an increased risk of fracture. • Posterolateral falls carry the highest risk of hip injury. • The energy and speed of a fall influence the risk of injury.

“

All care home residents should be considered at high risk of falling

World guidelines for falls prevention and management for older adults; a global initiative.

Monter-Odasso 2022

Multifactorial assessment

PALTmed 2011

TABLE 3
Checklist for Assessing Fall Risk

Risk Category	Assessing Fall Risk
Fall history	◆ Review patient's history of falls.
Medications	◆ Review patient's record for medications or combinations of medications that could predispose the patient to falls.
Underlying conditions	◆ Assess patient for underlying medical conditions that may predispose to falls, including conditions that affect balance or cause dizziness or vertigo. ◆ Assess heart rate and rhythm and blood pressure. ◆ Assess patient for orthostatic hypotension and conditions predisposing to it. ◆ Assess for underlying medical conditions that may increase the risk of injury from falls. ◆ If the patient is not on Vitamin D, supplementation should be considered.
Functional status	◆ Assess level of mobility. ◆ Assess gait as well as standing and sitting balance. ◆ Assess lower extremity joint function. ◆ Assess ability to use ambulatory assistive devices (e.g., cane, walker). ◆ Review appropriateness and safety of any current restraints. ◆ Review activity tolerance. ◆ Review bowel and bladder continence status. ◆ Assess sitting positioning in wheelchairs; make sure cushions are positioned properly. Ensure that wheelchairs are maintained in proper working order. ◆ Assess balance deficit using a standardized assessment, when feasible.
Neurological status	◆ Assess patient for conditions that impair vision (e.g., cataracts, glaucoma, macular degeneration). ◆ Assess for sensory deficits, including peripheral neuropathies. ◆ Assess muscle strength, proprioception, reflexes, and cerebellar function.
Psychological factors	◆ Review for delirium, impaired cognition, judgment, memory, safety awareness, and decision-making capacity.
Environmental factors	◆ Assess presence of environmental factors that could cause or contribute to falls. ◆ Assess whether patient's footwear may be contributing to fall risk.

Medications

Medication Classes Associated with an Increased Risk of Falls in Older Adults

- Antiarrhythmics
- Anticonvulsants
- Antidepressants (SSRIs, TCAs, others)
- First-generation antihistamines or anticholinergic drugs
- Antihypertensives
- Antimuscarinic incontinence agents
- Antipsychotics, first- and second-generation
- Benzodiazepines
- CNS-active agents (avoid >3)
- Dementia medications, acetylcholinesterase inhibitors (associated with increased risk of syncope)
- Insulin
- Loop diuretics
- Nonbenzodiazepine hypnotics
- NSAIDs
- Opioids
- Parkinson drugs
- Proton pump inhibitors
- Skeletal muscle relaxants
- Systemic glucocorticoids

Smith L. GRS12 2025.

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Deprescribing is the planned and supervised process of dose reduction or stopping of medication that might be causing harm or that might no longer be providing benefit. - Thompson 2013.

Be deliberate
Be thoughtful

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The benefits of this medicine do not clearly outweigh the risks for people like you.

I do not feel that you need this medicine anymore.

Given your age and other health problems, I do not think this medicine will help you.

Given your age and other health problems, I'm worried that you are at increased risk of side effects from this medicine.

Taking this medicine requires extra effort for you. It's another pill to swallow, costs you money, and requires periodic blood tests.

I think it could be harmful for you to be on this many medicines.

Patient preferred language in deprescribing

Green AR, 2021.

Inconsistent data on vitamin D supplementation

Consider prescribing to individuals at **highest risk** such as those with vitamin D deficiency or osteoporosis

American Geriatrics Society

Provide Vit D at least 800 IU/d for residents independent in transfers at risk of falls (strength A).

World guidelines for falls

Most residents in care homes are deficient in vitamin D. Recommend routine nutrition optimization and supplementation

Underlying conditions

Tailor risk assessment and interventions to specific underlying conditions

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Checking orthostatic blood pressure takes time

5 minutes

Blood pressure and heart rate

1 to 3 minutes

Alternative: Sit up

Watch for lightheadness, dizziness

Compare lying and standing BP and HR

Abnormal if

Decr systolic BP ≥ 20 mm

Decr diastolic BP ≥ 10 mm, or

Incr HR ≥ 20 bpm

Functional status

Assess

Mobility

Gait

Standing

Sitting balance

Activities of daily living

Use Tools

4-Stage Balance

30-Second Chair Stand

Berg Balance

Timed Up and Go

Gait speed

Adapt

Cane

Walker

Wheelchair

Therapy

Exercise

Optimize rehabilitation therapy

① Instruct the patient:

When I say "Go," I want you to:

1. Stand up from the chair.
2. Walk to the line on the floor at your normal pace.
3. Turn.
4. Walk back to the chair at your normal pace.
5. Sit down again.

NOTE:
Always stay by the patient for safety.

CDC STEADI. Stock image

Neurological, psychological, ethical assessments

Neurological

Vision and hearing
Sensory deficits, peripheral neuropathies
Strength
Cerebellar function, proprioception, reflexes

Psychological

Delirium
Impaired cognition, judgment, memory, or safety awareness
Decision-making capacity

Ethics

Weigh risks and benefits
Frame with resident's goals of care
Involve caregivers

Environmental factors

Table 9
Environmental Factors Associated With Falling

- Clutter in the room (eg, assistive devices, commodes, furniture)
- Defective, inadequate, or inappropriate assistive devices
- Ill-fitting or inappropriately soled footwear (eg, barefoot, sandals, slippers, socks)
- Inappropriate bed or chair height—patient should be able to sit on the bed or chair and be able to have both feet planted on the floor
- Inadequate lighting
- Inappropriate seating or positioning while sitting
- Incorrect or poorly fitting eyewear and hearing aids
- Lack of grab bars in bathrooms
- Loose carpets and throw rugs
- Malfunctioning emergency call systems
- Presence of animals
- Uneven flooring
- Unfamiliar environment
- Use of full-length side rails
- Wet or slippery floor

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INTERACT Care Path after a fall

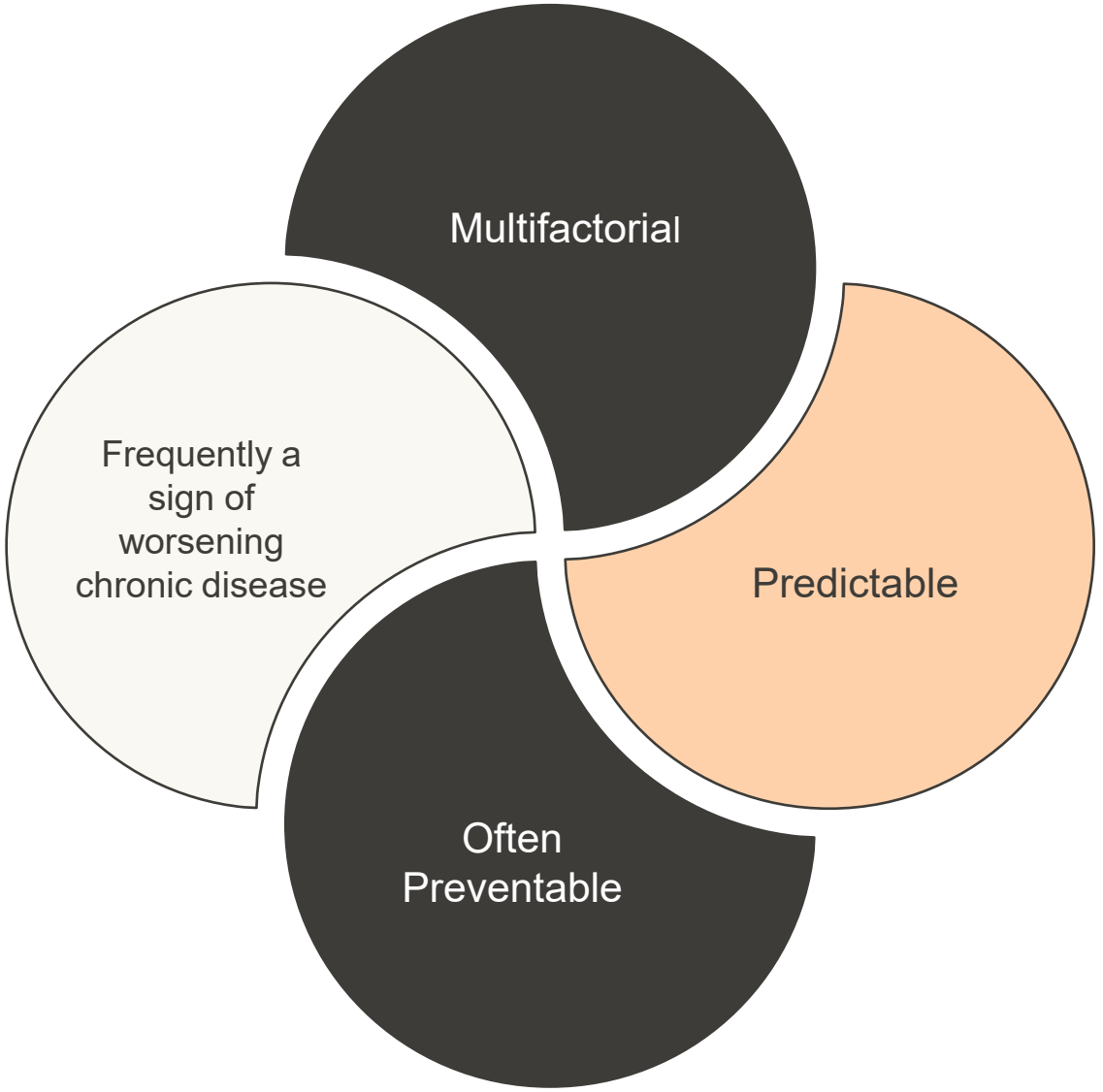
CARE PATH
Fall

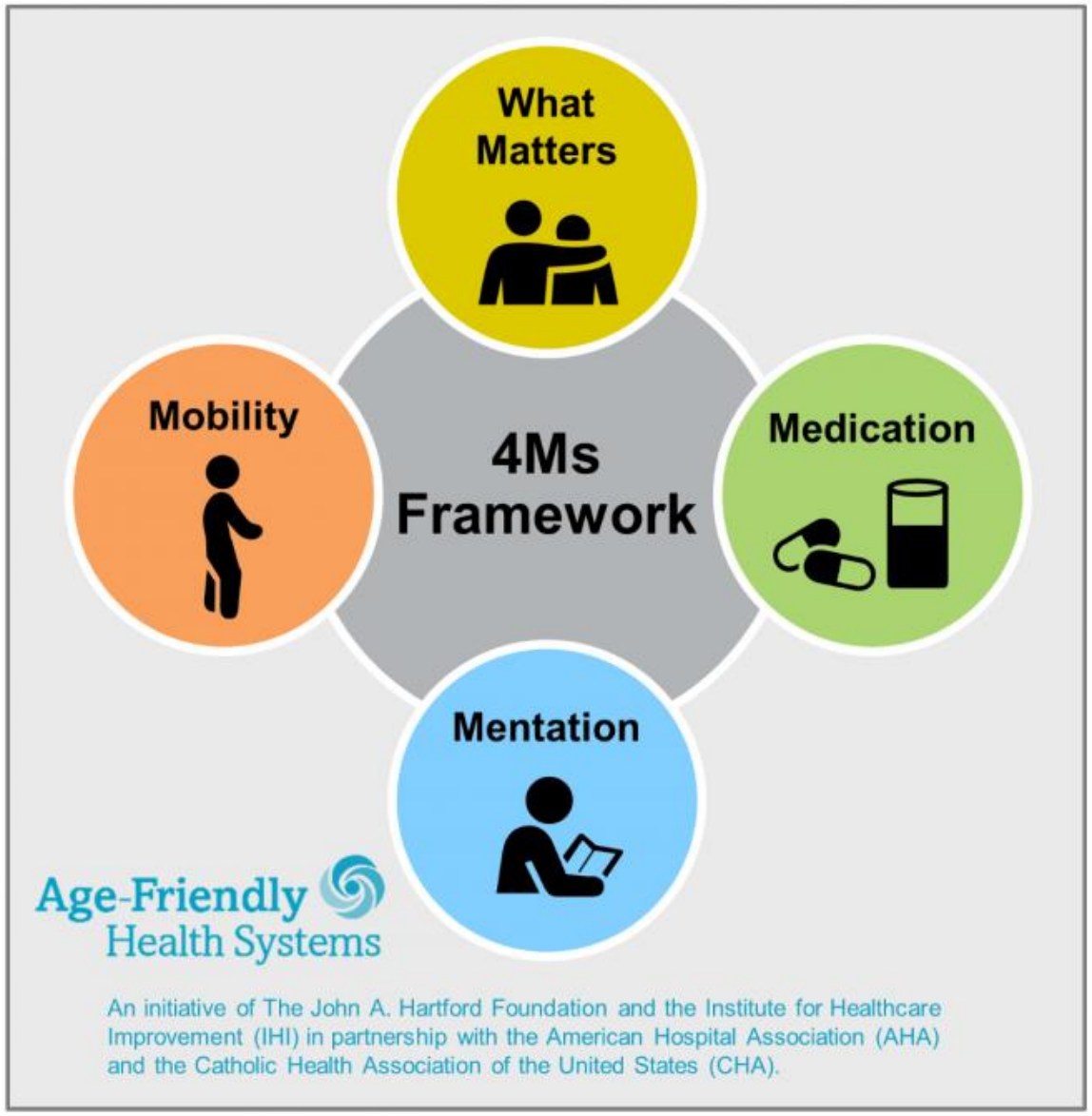
INTERACT®
Version 4.5 Tool

https://pathway-interact.com/interact-tools/interact-tools-library/

Falls as a Geriatric Syndrome

Mobility: Falls As A Geriatric Syndrome





For related work, this graphic may be used in its entirety without requesting permission.
Graphic files and guidance at ihi.org/AgeFriendly

What Matters

Know and align care with each older adult's specific health outcome goals and care preferences including, but not limited to, end-of-life care, and across settings of care.

Medication

If medication is necessary, use Age-Friendly medication that does not interfere with What Matters to the older adult, Mobility, or Mentation across settings of care.

Mentation

Prevent, identify, treat, and manage dementia, depression, and delirium across settings of care.

Mobility

Ensure that older adults move safely every day in order to maintain function and do What Matters.

What Matters

Pain management

Preferences concerning lucidity vs pain control

Staying Connected with Family and Friends

Being able to return to their prior level of activity

Assessing what is important to older adults in both their health care and their personal lives, care can be aligned with the individual's goals and preferences

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Mentation

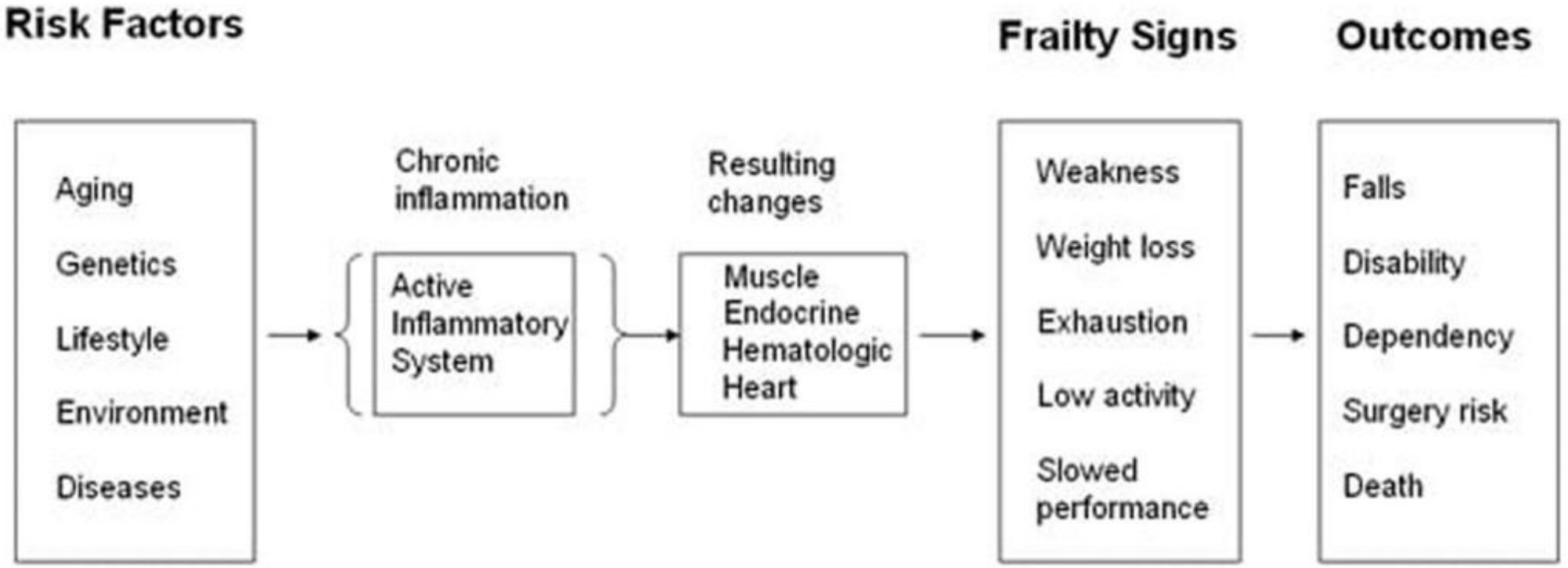
Identification and Management of Delirium, Depression, and Dementia

Facility staff should be educated on the ways in which these conditions can present

Chronic Conditions that Drive Falls

Conditions	Mechanisms
Dementia and Neurocognitive Disorders	Impaired Judgement, Wandering, Poor Safety Awareness, Visuospatial Deficits, Agitation, Parkinsonian Gait
Parkinson's Disease and Stroke	Freezing of gait, Rigidity, Postural instability, Hemiparesis, Spasticity
Chronic diseases (COPD, CHF, CKD, etc)	Orthostatic Hypotension, Polypharmacy, Poor Functional status, Acute exacerbations
Osteoporosis and Frailty	Sarcopenia, Poor Balance, Reduced Reaction Time, Low bone density

Frailty in Elderly



Modified from: Chen et al Clinical Interventions in Aging 9:436, 2014

Evidence

Frailty increases Fall Risk and strongly predicts recurrent falls

4.9 times risk

Death within one-week post fall

41%

Falls as a Trajectory Marker

Pattern	What it Suggests
Single Mechanical Fall	Environmental or Acute Issue
Clustered Falls	Disease Progression
Falls + Weight loss	Frailty Progression
Falls + Delirium	Acute Medical Trigger
Falls + Functional Decline	Transition to higher level of care/ Goals of care discussion/Hospice Referral

Hospital Transfer Decisions:

- Acute change in neurological status or cognition
- Acute new-onset pain
- Deformity of limbs
- Laceration in which bleeding cannot be stopped with compression and ice
- Suspected major fracture or fracture likely to require surgical intervention
- Uncontrolled bleeding (internal or external)
- Review patient's current orders (including Do Not Hospitalize) and consider their goals of care

Treatment

Develop an Individual, Person-centered plan

Manage the Cause(s) of Falling

Implement Relevant General Measures to Address Falling and Fall Risks

Assess the Interventions used for patients with a fall risk or fall history

Establish Quality Improvement Activities

Role of Interdisciplinary members

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Role of Interdisciplinary Team members

Roles of the interdisciplinary team

Executive Director

Resource allocation, oversight of all processes, monitor data and trends, coordination of the IDT

Director of Nursing

Training, competency testing, investigation of falls, implementation, evaluation and analysis of interventions

Social Services

Family and staff support in the event of an accident, recognition and communication of cultural and social influences

Maintenance

Ongoing review, maintenance and improvement of the environment to prevent hazards

Activities Department

Coordinated activities, safety awareness

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Nursing Assistants

Observe and Report Gait Changes

Changes in Cognition or Behavior

Nursing

- Daily Functional Surveillance
- Orthostatics
- Sedation Awareness
- Delirium Screening

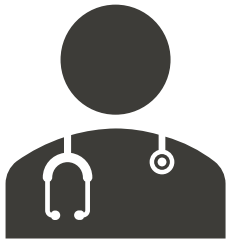
PT/OT

Gait, balance, transfer safety

Assistive device optimization

Environmental modifications

Pharmacist



Medication Review

Deprescribing high risk meds

Medical Director and Clinical Practitioners

Establishing Safety Expectations

- Leadership must communicate clear fall prevention priorities and reinforce standards consistently across staff.

Policy Development and Implementation

- Comprehensive fall prevention policies guide staff with tools, reporting, and environmental assessments.

Education on Fall Causes

- Staff training focuses on medical causes of falls like medication effects and gait abnormalities for timely intervention.

Ongoing Quality Improvement

- Continuous evaluation and Clinical Practice Guidelines help identify gaps and improve fall prevention outcomes.

Integrating Palliative Care into Fall Programs

Palliative care prioritizes quality of life, symptom relief, and autonomy.

Falls must be considered in context of goals of care.

- Align fall plans with resident goals, deprescribe high-risk meds, adapt mobility expectations, include family in shared decisions.
- Emphasis on comfort, dignity, minimizing burdensome interventions.

References : Section 1- Meckel

- Kimura, M., Ruller, S., Frank, C., Bell, A., Jacobson, M., Pardo, J. P., Ramsey, T., Sobala, M., Fung, C., & Kobewka, D. (2023). Incidence Morbidity and Mortality From Falls in Skilled Nursing Facilities: A Systematic Review and Meta-Analysis. Journal of the American Medical Directors Association, 24(11), 1690–1699. https://doi.org/10.1016/j.jamda.2023.07.012
- Costs of Falls Among Older Adults. Centers for Disease Control and Prevention, Home and Recreational Safety, U.S. Department of Health & Human Services, Bethesda, MD. 2016. Retrieved 2 December 2016.
- Hadjistavropoulos T, Delbaere K. The Psychology of Fall Risk: Fear, Anxiety, Depression, and Balance Confidence. In: Lord SR, Sherrington C, Naganathan V, eds. Falls in Older People: Risk Factors, Strategies for Prevention and Implications for Practice. Cambridge University Press; 2021:160-171.
- Facts About Falls | Older Adult Fall Prevention | CDC
- The Inaugural 2022 State of Falls Report | SafelyYou

References – Section 2 Palat

- Centers for Disease Control and Prevention. Algorithm for Fall Screening, Assessment, and Intervention. Resource Algorithm for Fall Risk Screening, Assessment, and Intervention. Accessed 1/2/26.
- Green, AR, Aschmann H, Boyd C, et al. *Assessment of Patient-Preferred Language to Achieve Goal-Aligned Deprescribing in Older Adults.* JAMA Network Open. 2021;4(4):e212633. Doi:10.1001/jamanetworkopen.2021.2633
- INTERACT Tools Library – Pathway INTERACT. Accessed 2/2/26.
- Montero-Odasso M.et al. World guidelines for falls prevention and management for older adults; a global initiative. *Age and Ageing* 2022; **51:** 1–36 https://doi.org/10.1093/ageing/afac205
- Kazdan, C et al. Falls and Fall Prevention in the Post-Acute and Long-Term Care Setting Clinical Practice Guideline. JAMDA 27 (2026) 106033. https://doi.org/10.1016/j.jamda.2025.106033
- Post-Acute and Long-Term Care Medical Association. Falls and Fall Risk Clinical Practice Guideline. Columbia, MD: PALTmed 2011.
- Smith L. in Geriatric Review Syllabus Teaching Slides 12th Edition. Farrell T. et al eds. American Geriatrics Society 2025.
- Thompson W, Farrell B. *Deprescribing: What is it and what does the evidence tell us?* Can J Hosp Pharm 2013;**66**(3):201-2.

References- Section 3- Jones

- Home - Patient Priorities Care
- The Conversation Project - Have You Had The Conversation?
- By the 2019 American Geriatrics Society Beers Criteria® Update Expert Panel. American Geriatrics Society 2019 Updated AGS Beers Criteria® for Potentially Inappropriate Medication Use in Older Adults. J Am Geriatr Soc. 2019 Apr;67(4):674-694. doi: 10.1111/jgs.15767. Epub 2019 Jan 29. PMID: 30693946.
- IHIAgeFriendlyHealthSystems_GuidetoUsing4MsCare.pdf
- Kakara R, Bergen G, Burns E, Stevens M. Nonfatal and Fatal Falls Among Adults Aged ≥65 Years — United States, 2020–2021. MMWR Morb Mortal Wkly Rep 2023;72:938–943. DOI: http://dx.doi.org/10.15585/mmwr.mm7235a1.
- Miura T, Kanoya Y. Fall Risk Assessment and Prevention Strategies in Nursing Homes: A Narrative Review. Healthcare (Basel). 2025 Feb 7;13(4):357. doi: 10.3390/healthcare13040357. PMID: 39997232; PMCID: PMC11855185.
- Incidence and Risk Factors of Falls Among Older People in Nursing Homes: Systematic Review and Meta-Analysis
  Shao, Lu et al. Journal of the American Medical Directors Association, Volume 24, Issue 11, 1708 - 1717

Q&A

Conclusion

Facility challenges

- Intentional investment for fall prevention
- Identify and evaluate hazards and risk for all residents;
- Implement interventions to reduce hazards and risks
- Monitor for effectiveness and modify interventions when necessary

Clinical assessment

- All care home residents are at risk for falls
- History of falls is strongest risk factor
- Use a checklist for medications, medical conditions, function, neuro/psych, and environment

Geriatric syndrome

- Falls are a predictable and often preventable geriatric syndrome
- Review mentation, mobility, medication, and what matters
- Utilize interdisciplinary team members in assessment, evaluation, and treatment

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