

Maintaining & Improving Mobility for Dementia Residents

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Epidemiology

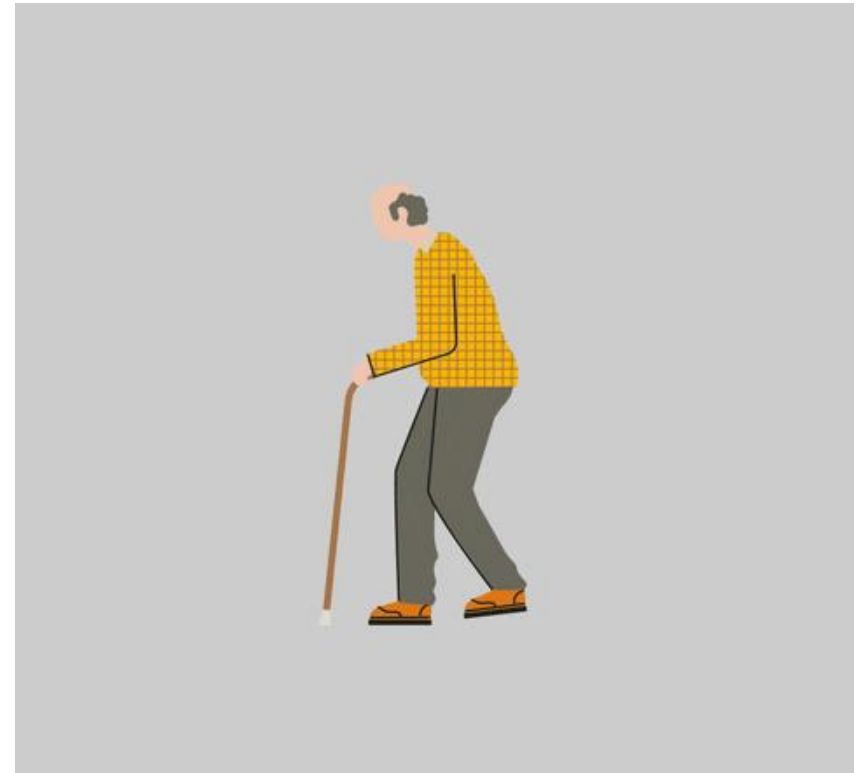
- ▶ By 2050 the number of people with dementia will reach **131.5 million**.
- ▶ Besides cognitive impairments, people with dementia have **balance, gait, and movement deficits** even when the **cognitive impairment is mild**.
- ▶ People with dementia are less likely to participate in regular physical activity when compared with their counterparts with normal cognition.

Epidemiology

- ▶ Physical inactivity gives rise to further decline in physical functioning.
- ▶ Explaining why people living with dementia are **2 times more likely to fall** compared with their peers without dementia.
- ▶ People with dementia have a higher risk of major fall-related injuries, such as hip fractures.

Exercise has been shown to:

- ▶ Increase strength
- ▶ Increase step length and walking speed (shortened step length and slowed walking speed are associated with falls)
- ▶ Improve balance
- ▶ Increase walking distance



How do we maintain and improve mobility?

Music therapy

- ▶ Increases participation and motivation with daily activity.
- ▶ Increases arousal.
- ▶ Improves mood and decreases agitation.
- ▶ Increases mobility.
- ▶ Significant superiority of rehabilitation with music over the one without music.



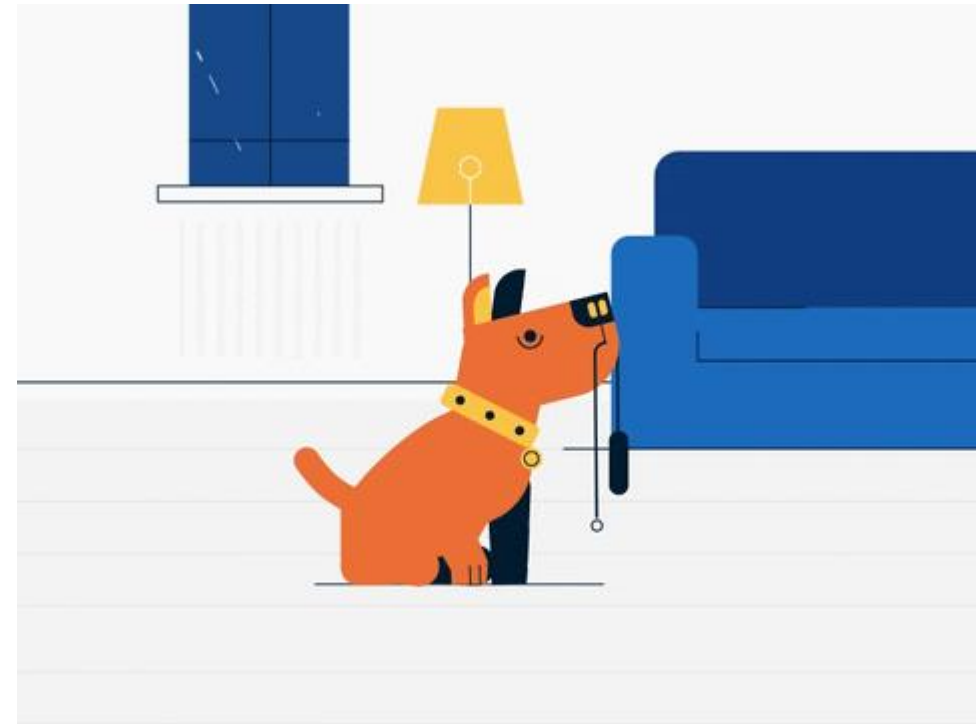
Assistive devices

- ▶ With **proper** instruction and training people with dementia can use assistive devices safely.
- ▶ Assistive devices can increase mobility for people with dementia.



Therapy dogs

- ▶ Therapy dogs have been shown to increase motivation arousal.
- ▶ Therapy dogs increase motivation for movement.



Activity of daily living training

- ▶ A 6-month ADL training benefitted executive functions, physical endurance, and depression for people living in skill nursing more than exercise alone.



Eating



Bathing



Dressing



Transferring



Toileting



Walking or moving around

Henskens M, Nauta IM, van Eekeren MCA, Scherder EJA. Effects of Physical Activity in Nursing Home Residents with Dementia: A Randomized Controlled Trial. *Dement Geriatr Cogn Disord*. 2018;46(1-2):60-80. doi: 10.1159/000491818. Epub 2018 Aug 24. PMID: 30145595; PMCID: PMC6187838.

Walking and talking

- ▶ Walking with talking has been shown to increase cognition.
- ▶ Walking with talking has been shown to increase balance.
- ▶ Walking with talking has been shown to increased motivation with activity.



Exercise in daily routine

- ▶ Program of people with dementia in a long term care unit used an exercise checklist.
- ▶ When exercises were completed throughout the day they were ✓ off.
- ▶ Resulted in greater leg strength, gross and fine motor coordination in 4 weeks.



Conclusion

- ▶ Movement is essential.
- ▶ Movement with a cognitive activity is better.
- ▶ Motivation can come from music, animals, and you.

