

## Efek aktivitas berjalan kaki terukur terhadap fungsi kognitif usia lanjut dengan gangguan kognitif ringan = Effect of 12-week home based walking program on cognitive function in the elderly with mild cognitive impairment

Zenik Kusriani, author

Deskripsi Lengkap: <https://lib.ui.ac.id/detail?id=20518151&lokasi=lokal>

---

### Abstrak

Latar belakang: Peningkatan populasi usia lanjut diikuti dengan meningkatnya masalah kesehatan terkait penurunan kapasitas fungsional. Gangguan kognitif ringan sering dijumpai pada usia lanjut, yang merupakan fase transisi sebelum berkembang menjadi demensia. Aktivitas fisik yang bersifat aerobik terbukti bermanfaat mempertahankan fungsi kognitif usia lanjut dan mencegah terjadinya demensia pada populasi ini, namun studi berjalan kaki terukur menggunakan pedometer belum diteliti di Indonesia.

Metode: Studi ini bertujuan menilai efek aktivitas berjalan kaki terukur minimal 4000 langkah setiap hari selama 12 minggu terhadap fungsi kognitif usia lanjut dengan gangguan kognitif ringan. Studi ini adalah studi intervensi mixed method, quantitative and qualitative research, dilakukan pada 12 subjek, berusia 60-74 tahun, di Poliklinik Rumah Sakit Ciptomangukusumo. Penilaian fungsi kognitif menggunakan kuesioner MoCa-Ina berbahasa Indonesia, yang dinilai sebelum dan setelah intervensi.

Hasil: Rerata capaian jumlah langkah harian adalah  $5689 \pm 505,59$  langkah. Terjadi peningkatan rerata nilai MoCa-Ina sebelum dan setelah intervensi ( $26,0 \pm 3,16$  dan  $27,29 \pm 1,49$ ,  $p=0,175$ ). Pada akhir intervensi, dilakukan wawancara kepada seluruh subjek yang berhasil menyelesaikan program, didapatkan bahwa seluruh subjek merasakan peningkatan kebugaran fisik dan tidak ada efek samping yang terjadi selama intervensi.

Simpulan: Aktivitas berjalan kaki terukur minimal 4000 langkah setiap hari selama 12 minggu dapat mempertahankan fungsi kognitif usia lanjut dengan gangguan kognitif ringan.

.....Background: The increasing of elderly population followed by increasing health problems due to decreased functional capacity. Mild cognitive impairment commonly found in the elderly, which is a transitional phase before developing into dementia. Aerobic physical activity has been shown to be beneficial in maintaining cognitive function in the elderly and preventing dementia in this population, however, studies of walking-based pedometer have not been studied in Indonesia.

Methods: This study aims to assess the effect of 12 week of 4000-daily steps of the pedometer-home based walking activity on cognitive function in elderly with mild cognitive impairment. This study is a mixed method, quantitative and qualitative research intervention study, conducted on twelve subjects, aged 60-74 years, at the outpatient Ciptomangukusumo Hospital. Evaluation of cognitive function using the MoCa-Ina questionnaire Indonesian version, which was assessed before and after the intervention.

Results: The average number of daily steps count was  $5689 \pm 505.59$  steps. There was an increase in the mean value of MoCa-Ina before and after the intervention ( $26.0 \pm 3.16$  and  $27.29 \pm 1.49$ ,  $p=0.175$ ).

Interviews were conducted with all subjects who successfully completed the program, it was found that all subjects felt an increase in physical fitness and no side effects occurred during the intervention.

Conclusion: Twelve weeks of 4000 daily steps maintain cognitive function in the elderly with mild cognitive impairment.