

Is Prescribing Physical Activity for Older Adults Reliable and Applicable?

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Commented on: "Thornton, J. S., Morley, W. N., & Sinha, S. K. (2025). Move more, age well: Prescribing physical activity for older adults. *Canadian Medical Association Journal*, 197(3), E59–E67. DOI: <https://doi.org/10.1503/cmaj.231336>"

This article critiques a proposed solution for enhancing the health of elderly individuals through exercise, highlighting two key areas for improvement. First, it argues for more precise exercise descriptions tailored to specific races and sexes, citing differences in physiology and disease outcomes that necessitate individualized approaches to avoid potential harm. Second, it addresses the lack of guidance on monitoring patient compliance and assessing the effectiveness of prescribed physical activities, as current recommendations, including those from the WHO, fail to provide methodologies for post-prescription follow-up.

Keywords: Prescription; Exercise; Elderly Population; Reliability; Monitor; Outcomes

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Introduction

THIS solution to further the health of the elderly (> 65 y/o) is very thorough. Encompassing many different strategies and mindsets to increase the physical standing of the elderly and, in turn, lengthen the overall lifespan. One major topic you covered is the role risks (e.g., heart disease, hypoglycemia, arthritis, and cancer) play when devising the proper form of exercise for seniors. As I reviewed the list of medical conditions, I noticed that it was a general rundown of the common conditions. However, the list did not differentiate race/gender. The latter described the specific treatments exclusive for each condition listed above.

First, due to the different symptoms and outcomes of identical diseases in individuals with contrasting races/sexes, I believe there should be more precise descriptions of each exercise tailored to fit each race/sex. This can take into account the aspects of less muscle mass in women compared to men (including a faster rate of muscle deterioration in women) (Haizlip et al., 2015), perimenopause, a faster rate of BMD degradation for women (Daly et al., 2013), larger hearts in men, etc. Generally speaking, if these aspects are shunned, there will not be so much as an immediate threat, but a gradual onset of threats that collate into a more prominent one. For example, one might advise an elderly woman to do the same exercise routine as an elderly man

of the same age. However, due to menopause and a faster rate of muscle deterioration in women (Haizlip et al., 2015), she may feel an increase in stress, elevating the heart's function and leading to hypertrophic cardiomyopathy (Maron & Maron, 2012) and hypertension. This will cause larger problems, such as cardiac arrest and arrhythmia (Psaty et al., 1997). This scenario is applicable to the differences in condition owing to race as well. These differences can include a lower bone density in Caucasians vs. African Americans, higher rates of cardiovascular diseases in African Americans, higher rates of diabetes and hypertension in Hispanics (Farina et al., 2022) and African Americans (Chobufo et al., 2020), etc.

Second, as indicated by the authors in the title "*Move More, Age Well: Prescribing Physical Activity for Older Adults*," healthcare providers have the capacity to prescribe physical activities (Thornton et al., 2025). However, a pertinent question

arises regarding the methods by which practitioners can effectively monitor the compliance of patients to these prescriptions. This Canadian version of prescribing physical activity to older adults predominantly adheres to the recommendations set forth by the World Health Organization (WHO), demonstrating a commendable level of accountability. However, these recommendations do not address the applicability of the prescriptions or the methods for post-prescription follow-up to assess compliance and effectiveness. Consequently, an in-depth analysis is required to elucidate the methodology for assessing patients' compliance and the effectiveness of prescribed physical activities.

Therefore, once these issues have been addressed, these ideas would revolutionize health expectations in Canada and around the world. ■

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References

- Chobufo, M. D., Gayam, V., Soluny, J., Rahman, E. U., Enoru, S., Foryoung, J. B., Agbor, V. N., Dufresne, A., & Nfor, T. (2020). Prevalence and control rates of hypertension in the USA: 2017–2018. *International Journal of Cardiology Hypertension*, 6, 100044. DOI: <https://doi.org/10.1016/j.ijchy.2020.100044>
- Daly, R. M., Rosengren, B. E., Alwis, G., Ahlborg, H. G., Sernbo, I., & Karlsson, M. K. (2013). Gender specific age-related changes in bone density, muscle strength and functional performance in the elderly: a-10 year prospective population-based study. *BMC Geriatrics*, 13(1). DOI: <https://doi.org/10.1186/1471-2318-13-71>
- Farina, M. P., Kim, J. K., & Crimmins, E. M. (2022). Racial/Ethnic differences in biological aging and their life course Socioeconomic Determinants: The 2016 Health and Retirement Study. *Journal of Aging and Health*, 35(3–4), 209–220. DOI: <https://doi.org/10.1177/08982643221120743>
- Haizlip, K. M., Harrison, B. C., & Leinwand, L. A. (2015). Sex-Based differences in skeletal muscle kinetics and Fiber-Type composition. *Physiology*, 30(1), 30–39. DOI: <https://doi.org/10.1152/physiol.00024.2014>
- Maron, B. J., & Maron, M. S. (2012). Hypertrophic cardiomyopathy. *The Lancet*, 381(9862), 242–255. DOI: [https://doi.org/10.1016/s0140-6736\(12\)60397-3](https://doi.org/10.1016/s0140-6736(12)60397-3)
- Psaty, B. M., Manolio, T. A., Kuller, L. H., Kronmal, R. A., Cushman, M., Fried, L. P., White, R., Furberg, C. D., & Rautaharju, P. M. (1997). Incidence of and risk factors for atrial fibrillation in older adults. *Circulation*, 96(7), 2455–2461. DOI: <https://doi.org/10.1161/01.cir.96.7.2455>
- Thornton, J. S., Morley, W. N., & Sinha, S. K. (2025). Move more, age well: Prescribing physical activity for older adults. *Canadian Medical Association Journal*, 197(3), E59–E67. DOI: <https://doi.org/10.1503/cmaj.231336>