MON-LB692

DIET QUALITY IN LATE MIDLIFE IS ASSOCIATED WITH FASTER WALKING SPEED IN LATER LIFE IN WOMEN, BUT NOT MEN: FINDINGS FROM A BRITISH BIRTH COHORT

T. G. Tektonidis[1,2]*, P. Esser[1], S. Coe[1,2], J. Maddock[3], S. Buchanan[4], F. Mavrommati[1], J. M. Schott[4], H. Izadi[5], M. Richards[6], H. Dawes[1,7].

1. MOReS, Sport, Health Sciences & Social Work;

2. OxBCNH, Sport, Health Sciences & Social Work, Oxford Brookes University, Oxford;

3. CLOSER, Institute of Education;

4. Dementia Research Centre, Institute of Neurology, University College London, London;

5. School of Engineering, Computing & Mathematics, Oxford Brookes University, Oxford;

6. MRC Unit for Lifelong Health & Ageing, University College London, London;

7. Neurology, Nuffield Clinical Neurosciences, University of Oxford, Oxford, United Kingdom

* Corresponding author.

Rationale: Healthy diet has been linked to better physical functioning while ageing, but evidence on the prospective relationship of overall diet quality in late midlife and walking speed in later life is limited. Research on potential sex differences in this relationship is scarce.

Methods: This study investigated the association between overall diet quality, as assessed by the Healthy Eating Index-2015 at age 60–64 y, and measures of walking speed seven years later, among men and women from the Insight 46, a neuroscience sub-study of the Medical Research Council National Survey of Health and Development. Diet was assessed at age 60–64 y using five-day food diaries, from which total HEI-2015 was calculated. At age 69–71 y, walking speed was estimated during a four 10-meter walk at self-selected pace, using an inertial measurement unit. Multivariable linear regression models with sex as modifier, controlling for age, follow-up, lifestyle, health and social variables and physical performance were used. The final sample was 164 women and 167 men (n = 331).

Results: On average, women had higher HEI-2015 scores at age 60–64 y and slower walking speed than men at age 69–71 y. A 10 point increase in HEI-2015 was associated with faster walking speed seven years later among women (B:.024, 95% CI:.006,.043), but not men. The association remained significant in the multivariable model (B:.021, 95% CI:.003,.040).

Conclusion: In women in late midlife, but not men, higher diet quality is associated with better physical capability in later life.

References

1. Lane C.A., et al. Study protocol: Insight 46 – a neuroscience substudy of the MRC National Survey of Health and Development. BMC Neurol, 2017. 17(1): p. 75.

2. Robinson S.M., et al. Adult Lifetime Diet Quality and Physical Performance in Older Age: Findings From a British Birth Cohort. J Gerontol A Biol Sci Med Sci, 2018. 73(11): p. 1532–1537.

Disclosure of Interest: None declared.