P28 A Commonly Used Single-item Physical Activity Question Fails to Discriminate Expected Blood Pressure-related Cardiovascular Risk in a General Community Sample

Martin Schultz, Dean Picone, Ricardo Fonseca, James Sharman

Menzies Institute for Medical Research, University of Tasmania, Hobart, Australia

ABSTRACT

Background: Completion of ≥150 minutes/week of physical activity (PA) is recommended for cardiovascular health, but this is achieved only by ~50% of Australian adults. Assessing self-reported PA via quick single-item question is desirable for large-scale cardiovascular research and health screening. We aimed to determine if a commonly used PA question elicits the expected discrimination of blood pressure (BP) related cardiovascular risk in a community population.

Methods: 958 individuals (aged 47 ± 15 years; 54% female) participated in a community BP screening campaign. BP was measured in triplicate using a validated oscillometric device and cardiovascular risk factors assessed by self-report. Adherence to PA guidelines was assessed via a single binary 'yes/no' question as to whether individuals met the guideline of ≥150 minutes of PA/week.

Results: A higher than expected proportion of participants (68% females, 74% males) reported meeting PA guidelines. There was no difference in SBP or DBP (127 ± 15 vs. 128 ± 15 mmHg, \( p = 0.144 \); 80 ± 11 vs 81 ± 11 mmHg, \( p = 0.232 \) respectively) between those reporting to meet or not meet PA guidelines. There were also no between-group differences in age, prevalence of diabetes, myocardial infarction, stroke or alcohol consumption (\( p > 0.05 \) all). Prevalence of BP ≥140/90 mmHg (26% vs 30%, \( p = 0.129 \)) and antihypertensive treatment (12% vs 12%, \( p = 0.801 \)) was similar between groups.

Conclusion: Assessment of PA via a commonly used research question did not elicit expected prevalence or discrimination of BP-related cardiovascular risk in this community sample. Further work is required to assess the usefulness of single item self-report PA questions for use in cardiovascular research and health screening.

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