Project report for

Tracking shifting trajectories: Understanding employment status, musculoskeletal discomfort, and total physical activity amongst active older Albertans (PI Doan, 2021-2022)

Overview

The purpose of this research was to prepare to survey a third wave of peri-retirement Albertans about their transitional employment status and lifetime work history, along with leisure and work-related physical activity and work-related musculoskeletal discomfort using a structured retrospective questionnaire. Two related experimental hypotheses followed this purpose:

- 1) Older Albertans with transitional employment will report more total physical activity than either fully retired or fully employed older adults, including relatively high levels of <u>both</u> work and leisure physical activity; and
- 2) Work-related musculoskeletal discomfort will be equally high among transitionally employed and fully employed older Albertans, due to a failure to age-appropriately reduce physical and mental stressors at work.

> 200 fully completed surveys were collected at both of the 2009 and 2015 Alberta 55+ Winter Games, and isolated analysis on some data from both Games has been completed and published in traditional academic outlets. This work is the foundation for a third data collection wave in 2023-2024.

Outcomes of Prentice funding

Graduate research assistant completed the following tasks during their paid assignment to this project:

- 1) Verified, re-organised, cleaned, and securely stored 2009 and 2015 data (440+ subject files)
- 2) Updated literature base on transitional employment and bridge employment with health and musculoskeletal connections
- 3) On-going prep on manuscript
 - a. Doan JB, Copeland JL, Tosh C, Truba T. Bridge employment, work demands, and musculoskeletal discomfort: Findings from an active Albertan cohort. INT J AGING RES, in final preparation.
- 4) Outline for two additional manuscripts
 - a. Active transportation behaviour, MSK health, and health-related QoL amongst fully employed and bridge employed older adults.
 - b. Balance confidence and total physical activity amongst bridge employed, fully employed, and fully retired adults.
- 5) Established contact with 2023 Alberta 55+ Summer Games local and provincial organisers (Brooks-Newell, August 17 to 20 2023)
- 6) Developed initial proposal for data collection at 2023 Alberta 55+ Summer Games.
- 7) Refined existing survey package for use in 2023. Refinements include developing first summer version (all sports, some questions) plus streamlining and improving instructions.
- 8) Early revisions on existing 2015 human subjects research ethics package for 2023 data collection.

Next steps

Will use snowball communication through Prentice colleagues to identify others who might be interested in collecting data amongst Alberta 55+ games participants and will develop a full ethics application package for submission in early June.

Will use two summer 2023 undergrad research assistants to collect data in Brooks.

Will look for graduate student starting January 2024 to start three wave analysis here plus look at 2024 Alberta 55+ Winter Games as either wave four or three prime.