## Indirect Influence of Expectations of Aging on the Relationship between Age-Stereotypes and Sedentary Behaviour

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EXCELLENCEIN
POPULATIO
RESEARCH

## Background

- Lifespan positive and preventive health behaviours = ageing well
- MVPA

$\rightarrow$ Reduces health risks
$\rightarrow$ Declines with age


## ccpar

## Background

- Social Cognitive Models of Health - Motivation and Adherence
- Attitudes - Assumptions - Beliefs
- "age is related to inevitable physical and cognitive decline" (Golu\& \& Langer, 2007)



## Background

- Stereotype Embodiment Theory (evv, 2009)
- Internalised age-stereotypes


## Negative Stereotypes



Low Motivation

## Background

- Negative age-stereotypes asc with
- cardiovascular events over 20 yrs (everetal, 2009)
- Poorer functional health (Sargent-Cox et al 2012)
- Lower expectations of ageing asc with
- Reduced PA and healthcare seeking in older adults (Sarkisan 2002; 2005)



## Background

## Age

- Most work to date - older adults $55+$
- Lifespan Stereotype Embodiment
- $\uparrow$ exposure to stereotypes $=>$ internalisation
$-\therefore$ older $=$ stronger $r /$ ship between stereotypes and expectations


## Background

Gender

- "Double Jeopardy" ageism for females
- Potential for stronger effects of stereotypes on expectations for females



## ACTWell Survey

- September 2011 - 3000 randomly selected invitations - Canberra region
- 783 returned questionnaires (26\%)
- $20-97$ years $(M=57.5, S D=13.89)$
- 57.2\% male
- Majority married (65.8\%)
- Full time (64.7\%)
- Highly educated sample (23.9\% bachelor degree, 19.4\% HD)



## ACTwell Measures

- "Old people complain more than other people do"
- 10 items -4 pt- strongly disagree to strongly agree
- Expectations Regarding Ageing (ERA)
- "I expect that as I get older I will become more forgetful"
- 12 items -4 pt - definitely true to definitely false
- MVPA -
- 2 questions on amount / level PA in last 4 weeks
- Calculated based on Australian PA guidelines (2012)
- 0 - "met criteria for MVPA"; 1 - "sedentary"


## Sample Description

| Stereotypes | $\begin{gathered} 2.09 \\ (.43)^{*} \end{gathered}$ | 2.13 (.40) | 2.04 (.46) | 1.97 (.45) | 2.03 (.45) | 2.20 (.41) |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| ERA | $\begin{gathered} 52.30 \\ (16.07) \end{gathered}$ | $\begin{gathered} 50.57 \\ (16.51) \end{gathered}$ | $\begin{aligned} & 54.67 * \\ & \text { (15.17) } \end{aligned}$ | $\begin{gathered} \text { 56.95* } \\ (16.21) \end{gathered}$ | $\begin{gathered} 53.81 \\ (14.54) \end{gathered}$ | $\begin{gathered} 49.03 \\ (17.10) \end{gathered}$ |
| Sedentary | 37.8\% | 36.8\% | 39.1\% | 41.8\% | 38.5\% | 35.6\% |

## Descriptives - Stereotypes, Age \& Gender



## Results - Direct Effects


$ß=-16.27^{* * *}$

## Results - Direct Effects



## Results - Direct Effects



## Results - Indirect Effects



$$
B=0.35(95 \% C I=0.16,0.57)
$$



## Results - Moderation Effects

| AGE | GENDER | $\beta$ | $95 \% \mathrm{CI}$ |
| :--- | :--- | :--- | :--- |
| 39 years | Male | 0.44 | $0.11,0.86$ |
|  | Female | 0.11 | $0.00,0.28$ |
| 43 years | Male | 0.39 | $0.13,0.70$ |
|  | Female | 0.19 | $0.06,0.35$ |
| 58 years | Male | 0.33 | $0.11,0.58$ |
|  | Female | 0.24 | $0.08,0.43$ |
| 67 years | Male | 0.27 | $0.03,0.57$ |
|  | Female | 0.26 | $0.02,0.054$ |
| 75 years | Male | 0.22 | $-0.08,0.61$ |
|  | Female | 0.26 | $-0.09,0.68$ |

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## Discussion

- Significant indirect effect of stereotypes on sedentary behaviour thru ERA
- More negative age-stereotypes associated with poorer expectations of ageing which is associated with greater likelihood of being sedentary



## Discussion

- Significant indirect effect of stereotypes on sedentary behaviour thru ERA
- Less negative age-stereotypes associated with higher expectations of ageing which is associated with greater likelihood of NOT being sedentary



## Discussion

- Moderated by age and gender
- Males
- With age - this indirect relationship gets weaker
- Females
- Weaker indirect relationship compared to males
- In comparison to males r/ship appears to strengthen with age
- Age
- oldest adults - no indirect relationship


## Discussion

- Gender effects - not as expected
- Stronger relationships for males
- Domain specific stereotypes?
- "Physically Strong"
- Males may succumb earlier to "feeling old"? - particularly if they have stronger age-stereotypes
- Males show greater fear of aging across ages (Lasher \& Faulkender, 1993) - Is this an important driver for preventive health behaviors?


## Stereotype $\rightarrow$ ERA by Age and Gender



## Implications

- Theoretical / Research
- Consider age-expectations / attitudes along with age and gender - for $>$ understanding of adherence and motivation to exercise / preventive behaviour engagement
- Public Health and Social Policy
- Acknowledge and address influence of ageattitudes in health campaigns aimed at promoting health behaviours


## Acknolwedgements

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- ACTWell Participants

