Peer-led wheelchair training is feasible for older adults and improves how the wheelchair is used in the community.





Krista L Best^{1,2}, William C Miller^{3,4}, Janice J Eng^{3,4}, Francois Routhier^{1,2} CIRRIS¹; Université Laval²; University of British Columbia³; Rehabilitation Research Program⁴

Background

- >50% of older (65+) manual wheelchair (MWC) users require mobility assistance¹
- MWC use self-efficacy and MWC skills influence how the MWC is used^{2,3}
- ~ 55% of inpatients receive some MWC training during rehabilitation⁴ • ~ 8% of clinicians provide training in intermediate/advanced MWC skills
 - barriers include limited time, knowledge, and resources⁵
- Peers are a powerful yet overlooked source of health service provision⁶
- Peer trainers can:
 - improve MWC use self-efficacy and MWC skills in adults⁷
 - cultivate a unique learning experience through relatedness⁶
 - provide a credible source of information⁸
 - respond appropriately to unrealized potential⁶
 - elicit social benefits⁸

Objective

Evaluate the feasibility of Wheelchair training Self-efficacy enhanced for Use (WheelSeeU), a peer-led, goal-oriented MWC training program for older adults in the community.

Method

Design. Two-site (Quebec City, Vancouver), randomized controlled trial. **Sample.** Community-living older adults (50+) who had MWC mobility goals. **Intervention.** 6 x 1.5 h of WheelSeeU, an individualized, goal-oriented MWC training program facilitated by a peer (and support) trainer to a pair of MWC users in a research centre and the community.

Control. 6 x 1.5 h of informational resources for MWC use (iWheel), a didactic program delivered by a professional to a pair of MWC users in a research centre. **Outcomes**. Feasibility indicators = **Process, Resources, Management, Treatment**. Treatment indicators [baseline to post-intervention (T2)] = MWC skills [Wheelchair Skills Test - Questionnaire]; MWC use self-efficacy [Wheelchair Use Confidence] Scale]; and satisfaction with participation [Wheelchair Outcome Measure]) **Analysis.** Feasibility indicators were treated as binary (ie. successful, unsuccessful). Mixed-model ANOVA was used to evaluate treatment effects.

Results

- N= 40; WheelSeeU (n=18), iWheel (n=22)
- 65 ± 8 y of age; 40% female, 53 % married; 28% amputee/20% spinal cord injury; $7 \pm 11y$ of previous MWC experience.

References

[1] Shields. Health Reports 2004;15(3) [2] Sakakibara et al. Phys Ther 2014;94(5) [3] Sakakibara et al. Phys Ther 2014;94(11) [4] Kirby et al. Top Geriatr Rehabil 2015;31(1) [5] Best et al. Disabil Rehabil AT 2015;10(5). [6] Divanoglou et al. Spinal Cord 2017;55 [7] Best et al. APMR 2015; 97(1) [8] Standal et al. Adapt Phys Act Quart 2008;25.

Feasibility indicator Process

Recruitment rate

Consent rate Retention rate Perceived benefit Resources

Participant adherence WheelSeeU group

Control group Trainer adherence

Peer-trainer

Support-trainer

Data collection burde

Translations

Management Processing time Combining data

Protocol administration Intervention fidelity

Treatment

Safety

Treatment effect (bas MWC skills capacity MWC skills perform MWC use self-effication Satisfaction with pa

Discussion & Conclusion

- the the need for 'just-in-time' training.

Acknowledgements





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Table 1. Description of feasibility indicators, parameters for success and result (Y = successful; N = unsuccessful [ie. need for change to protocol before

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• A peer-led, goal-oriented approach to MWC training is a feasible intervention strategy to improve how MWCs are used by older adults. • Lower than expected *recruitment rate* and *processing time* may reflect

• Further evaluation is needed to explore: 'better' patient-reported outcomes; influence of *iWheel*; impact on clinician burden and cost.











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REHABILITATION

