Recommendations for conducting evaluations of scaled-up program delivery: Outcomes of scaling-up The Arthritis Foundation Walk With Ease program across Oregon.

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Setting: Oregon is one of 13 states to receive 5-year CDC grant funding to scale-up arthritis interventions via existing infrastructures. Goal: to reach 36,000 Oregonians by enrolling them in arthritis self-management programs by 2017. Primary partner – Oregon State University (OSU) Extension Service.

Program: Walk with Ease (WWE), an Arthritis Foundation walking program, is an evidence-based group intervention shown to improve arthritis symptoms, self-efficacy, balance, strength, and walking pace and decrease disability. Of the six programs recommended and supported by the CDC Arthritis Program, WWE requires the fewest resources and expenses to implement and maintain. Required resources include a trained community lay leader, participant workbooks, and a safe walking location. Because there are no licensing fees or special equipment for WWE, the only program costs are participant workbooks and one-time online leader training.

OSU Extension: Offices and Family and Community faculty in all 36 Oregon counties. Faculty are connected to their local communities through 4-H, SNAP-Ed, Master gardener programs, and are aware of local needs and resources. Faculty were expected to build on pre-existing relationships to recruit participants and leaders for WWE. Volunteer leaders and organizations were recruited by extension faculty to lead the WWE program throughout the state.

Methods:
- Program forms and participant surveys collected by volunteer leaders pre-program (n=432), and post-program (n=149)
  - Packets of forms and instructions sent to leaders, and returned in pre-stamped and addressed envelopes.
  - Importance of data collection reinforced during in-person leader trainings
- Program observations (n=33) and qualitative interviews conducted by research staff

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<th>RE-AIM Criteria</th>
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| Adoption        | Who delivered the program?  
  - Uptake of the program and characteristics of delivery organizations | Program Information Form, Qualitative Interviews with Program Leaders |
| Reach           | Was the appropriate target population reached?  
  - Number and characteristics of participants | Participant and Leader Surveys |
| Implementation   | Was the program delivered as designed?  
  - Quality of implementation | Qualitative Interviews with Program Leaders; Fidelity Checklists; Participant Satisfaction Surveys; Leader Satisfaction Surveys; Attendance Records |
| Efficacy        | Was the program successful?  
  - Program outcomes | Participant Survey (pre- and post-program) |
| Maintenance     | Will the program continue?  
  - Program sustainability | Qualitative Interviews with Program Leaders |

Results

Data collection
- Most sites (31/33) completed some data collection
A few classes didn’t complete the post-test paperwork, but 181 participants didn’t complete, or didn’t attend the class during which the final paperwork was distributed.

- Two sites didn’t complete any – one large workplace of n=166; one student-led program
  - Workplace cited difficulties in coordinating data collection activities

Participants

- Demographics: Female (82%), non-Hispanic white (90%), unmarried (65%), retired (65%). Age ranged: 22–98 years old, median age = 70.8 years (IQR = 61.0-79.8), had arthritis (70%). 38% met national physical activity guidelines for aerobic activity.
- Attendance: Mean=8.5 (SD=4.6) classes (18 sessions in the WWE program)
- Outcomes: Reduction in pain (β= -0.47; 95% CI= -0.81, -0.14) and fatigue (β= -0.58; CI= -1.1, -0.08) from pre-test to post-test. Changes remained constant when using inverse-probability censored weighting to account for missingness.
  - Increase in self-report of physical activity (β =2.5; CI = 1.0, 3.9), and exercise more days per week (β =0.86; CI=0.45, 1.3)

Conclusions:

- Volunteer leaders who were trained to collect data during in-person trainings were generally more willing and able to collect data; pre-packaged forms and envelopes were absolutely necessary
  - Leaders described data collection as a significant barrier to implementation
- Leader implementation of post-program forms, and retention were barriers to data collection
  - Future research is needed to follow-up with participants who dropped out or did not complete
- Funders only requires reporting of reach (e.g. registration), not completion
  - No funds provided for data collection or evaluation
- Scale-up research is needed to ensure that limited resources are maximized, and that programs selected for scale-up are compatible with target audiences
  - Funders need to include sufficient funding for monitoring and evaluation; simple increasing reach does not ensure impact on public health issues

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Selected References and Resources


Centers for Disease Control. A national public health agenda for osteoarthritis. 2010.