Wisconsin's experience with Sure Step and Stepping On

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Falls Prevention Overview: Wisconsin

- History
- Two models
 - Stepping-On: Multifactorial group model
 - Sure Step: Multifactorial, individual model
- General design for each model
 - Uses, limitations
 - What we've learned so far

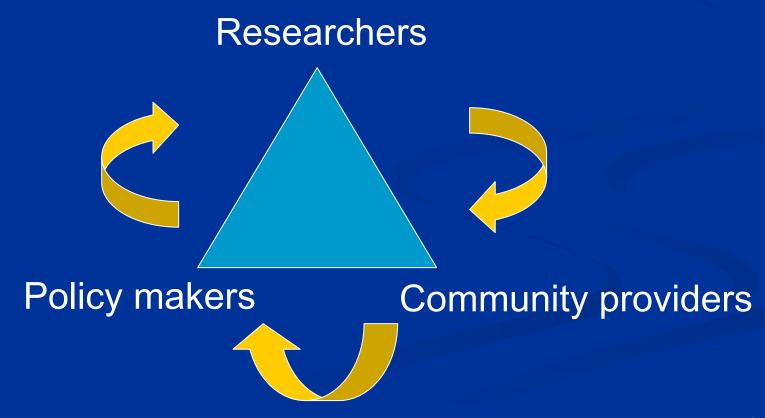
Building Collaboration

1999 – Falls identified as priority for State Injury Prevention Section

- 2000 Partners brought into discussion
 - State of Wisconsin, Injury Prevention Section
 - State of Wisconsin, Dept of Health and Family Services
 - UW School of Medicine
 - Local Aging and Disability Resource Centers
 - County Aging Units
 - Local Health Depts
 - Dane County Safe Communities

The triangle that moves the mountains

Wasi P, 2004; Bangkok: Health Systems Research Institute



Next steps with partners - 2000

- Identify existing research, current activities, resources available, and gaps
- Formulate vision
 - Implement Community-Medical Model
 - Use evidence-based programs
- Grow partnerships
 - Established regular meetings
 - Held half-day education session as part of Wisc Annual Long-Term Care Conference

2001 – Reaching out

- Infrastructure Statewide Falls Prevention Initiative
 - Quarterly statewide phone calls involving health professionals, health educators, Health Depts, Aging Network Members (Aging Units and ADRCs), State stakeholders
- Education
 - Educational sessions to Nutrition Site Coordinators
 - Day long session at Wisc Annual Long Term Care Conference
- Program Development
 - Falls intervention based on UW Medical School Falls Clinic piloted in 5 areas of Wisconsin in conjunction with State and community partners

2001-4: Collaborative Research on Effective Models

- 2001- 4: Kenosha County Falls Prevention Study (became Sure Step)
 - Kenosha County Aging and Disability
 Resource Center in partnership with Univ of Wisconsin
 - Funded by Wisc DHFS, BLTCAR
 - Individualized, multifactorial model for highrisk older adults

Kenosha County Dissemination: 2 different multifactorial models

- Why two models?
- Stepping On: Australian Model, group-based
 - Appropriate for those willing/able to go to classes
 - Probably not appropriate for those with cognitive impairment
- Sure Step: individual model (based on Kenosha County Falls Prevention Study)
 - Appropriate for those with cognitive impairment, if live with a caregiver
- 3-year Wisc Partnership Program Grant in collaboration with Univ of Wisc (2006-8)

Multifactorial Intervention, **Group**Model "Stepping On"

Clemson, JAGS, 2004:

- Age 70+, fall in last yr or concern about falling
- 7 weekly classes + 1 home OT visit + 1 booster to improve self-efficacy, encourage behavioral change, reduce falls
- Focus on balance and strength exercises, improving home and community environmental and behavioral safety, encouraging vision screen and med review
- Included balance exercise as direct part of intervention
- 31% reduction in falls; RR = 0.69 (0.5 to 0.96)

What is Stepping On?

- 7 weekly classes, 1 home visit, 1 booster class
- Balance and strength exercise each class
- Discussion sessions with invited expert
 - home and community mobility
 - Environmental safety
 - Vision screens, coping with low vision
 - Medication review
- Emphasizes self-efficacy, adult learning

Original study vs implementation in Wisconsin

Original study

Led by OT, but could be other health professional

- No co-leader
- Home visit by OT

Wisconsin

- Led by broader group of professionals (experience with older adults, knowledge of falls prevention, facilitation skills)
- Peer co-leader
- Home visit or phone call

Wisconsin experience with Stepping On

- Initially (2006) Kenosha County trained 9 leaders, 3 co-leaders in 5 counties
 - 153 participants in first wave of classes
- DHFS wrote and received AoA grant to disseminate and evaluate CDSMP and Stepping On
- 2007 Leader's manual re-written (S Cech, Clemson)
- 2nd wave of trainings winter 07-8
 - Funded by AoA grant and State of Wisc prevention grants to ADRCs

Stepping On implementation

- Training
 - 2-1/2 day training for leader and co-leader
 - Leader, co-leader must lead and co-lead a practice class as part of training
- As of March 08, in 18 counties, have trained:
 - 53 leaders
 - 12 co-leaders
 - 2 trainers
 - 1 lead trainer
- 6 classes, 60 participants since winter trainings

Implementation of Stepping On: who and where

Who has been trained?

- Staff of senior centers, meal sites, aging units, health depts (SW, RN, health educator, dietician)
- Home health, clinic, medicaid managed care (OT, PT, RN)

Where are classes held?

- Senior centers
- Community centers
- Retirement apts
- YMCA
- Hospital, clinic
- library

Issues with starting Stepping On

- Standardization, training, fidelity
 - Attendance screen
 - Fidelity check session 3
- Outcomes evaluation
 - Mobility efficacy scale
 - Falls Behavioral Scale
 - Compliance questions
 - Collect exercise logs
 - Rate exercise level, class 1 and 7
- Likely to reach only small fraction of target group

Successes and barriers with Stepping On

Successes:

- Participants, leaders, co-leaders, invited experts love it
- Easier administrative buy-in than individual model

Barriers:

- Winter
- Rural areas may have trouble getting invited experts
- Some aspects of program may be difficult for community organizations to do
 - Home visit
 - Community organizations may not have access to PT, OT, RN to lead class

Dissemination research in falls prevention: "Stepping On" in a Wisconsin community

- 4 year grant from Centers for Disease Control and Prevention, 2007-11
- Purpose: to develop Stepping On program package for national dissemination.

Research questions

- Is home visit a core element?
- Is having leader with a health professional degree a core element?
- What settings are likely to have success?
 - Retirement communities
 - Parish nurses
 - Senior centers
- How successful will the program be in rural areas (difficulty locating speakers, attendance barriers)?

Study Procedure and Timeline

- Year 1 Define key elements
- Year 2 Convene focus groups to advise on program package
 - Pilot program
- Year 3 Revise program
 - Repeat program and evaluate to answer research questions
- Year 4 Complete evaluation of research questions
 - Prepare final package for dissemination

Stepping On plus technical assistance

- Medical College of Wisconsin Injury Research Center 3 year grant from CDC
- How do we make Stepping On sustainable?
- Does technical assistance to help a county develop a broad falls coalition improve the likelihood that Stepping On will be sustained in that county?

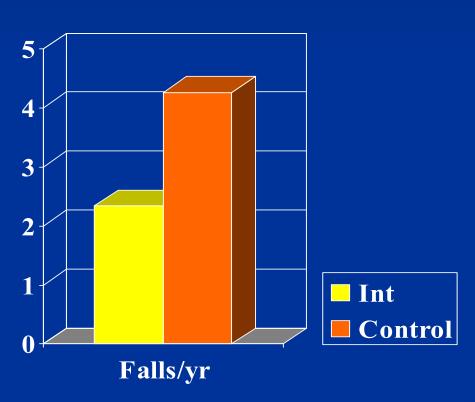
Kenosha County Falls Prevention Program Dissemination (2006-8)

- Why 2 models?
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Kenosha County Falls Prevention Study (Sure Step)

- Follows guidelines of American Geriatrics Society
- Target group: older adults living in the community with 2 falls in past year, or 1 fall in past 2 years with gait/balance problems or injury (n=349)
- Individualized, multifactorial intervention delivered by health professional, similar to Tinetti (1994) but utilized existing health care systems for referral
- Intermediate-intensity: 2 home visits plus 11 monthly phone calls
 - Low-intensity models (< 4 contacts/year) in general have not been efficacious

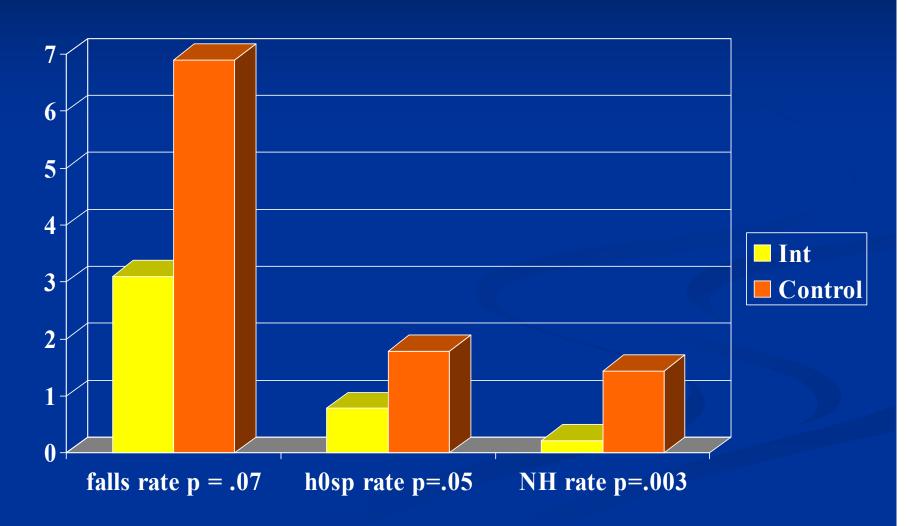
Subgroup with MMSE of 27 or less (n=131): falls rate



- Int group = 2.3 falls/yr
- Control = 4.3 falls/yr
- 45% reduction in falls in intervention group
- P=0.05

5/2/2008

Results for those with MMSE 27 or below who live with someone (n=70)



Sure Step Model

- In-home, individualized multifactorial intervention utilizing algorithm
- PT, RN, NP, or OT with cross-training to perform multidisciplinary exam (3-days training)
 - Medications, cognition, chronic disease, gait/balance, function, neurologic contributors, vision, depression
- Make recommendations to physician and participant
- Make referrals to physical therapy, podiatry, optometry, occupational therapy, community services as indicated by assessment algorithm

Structure of intervention – Sure Step

- Home visit (2 hours)
- Follow-up visit (1 hour) to make individualized recommendations
- 11 monthly phone calls to encourage compliance and problem-solve
- Family member encouraged to be present at assessment and follow-up, take active role in problem-solving and obtaining care

Implementation of Sure Step

- 3-day training followed by
 - Biweekly phone call opportunity with trainers
 - First 10 assessments reviewed by trainer
- Now in year three:
 - 8 trainings to date
 - 56 people trained (approx 1/3 OT, 1/3 RN, 1/3 PT)
 - Approximately 70 older adults seen
- Current Settings: health professionals in County Aging Units (ADRCs), Medicaid managed care programs, rehab depts, retirement communities, adult days care, home care

Successes and Barriers with Sure Step

Successes:

- Well-received by MDs and patients
- Trainees feel it has enhanced their care

Barriers

- Challenging to get administrative buy-in
- Much of it not paid for by Medicare
- Not easy fit for community aging services providers
 NOR for health care providers
- Best fit is for those with some cognitive decrement and caregiver in home

Summary

- Tailor intervention to target group
 - Need more than 1 falls prevention program in order to reduce falls among high risk older adults
 - Group model effective and good uptake, but reach may be limited
 - Individual intervention effective for subgroup older adults with cognitive decrement who have a caregiver
- Collaboration and partnerships are key
 - funding
 - Policy-making
 - Local buy-in
 - Developing a culture that falls are preventable!

Collaborators

- University of Wisconsin:
 - Terry Shea, PT, Bob Przybelski, MD, Ron Gangnon, PhD
- Australia
 - Lindy Clemson, OT, PhD
- Kenosha County Division of Aging:
 - LaVerne Jaros, Director, Sandy Cech, RN, Alice Schwalbe PT
- State of Wisconsin:
 - Dept of Health and Family Services, Division of Aging (Gail Schwersenska) and Injury Prevention Section (Linda Hale, Brianna Kopp)
- CDC
 - Judy Stevens, PhD
- Medical College of Wisconsin Injury Research Center
 - (Peter Layde, MD Ann Christiansen, MPH)

Thank you

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