Conducting Evidence-Based Programs in Senior Centers

Jill Jackson Ledford
National Council on Aging

2008 Florida Conference on Aging
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Objectives for Session

- Understanding the need for evidence-based programs
- Reviewing the national picture
- Planning and implementation - A case study from one community’s vision
- Increase knowledge about evidence-based programming and resources
Making the Case -

- Chronic Disease - An Epidemic of Unparalleled Proportions
  - Over 1.7 million Americans die of a chronic disease each year.
  - 80% of older adults have at least one chronic condition; 50% at least two.
  - Greater prevalence among minority populations
  - 95% of health care spending for older adults attributed to chronic conditions
  - Four chronic diseases - heart disease, cancer, stroke, and diabetes - cause almost two-thirds of all deaths each year.

Mensah: [www.nga.org/Files/ppt/0412academyMensah.ppt#18](http://www.nga.org/Files/ppt/0412academyMensah.ppt#18)
State of Aging and Health in America 2007: [www.cdc.gov/aging](http://www.cdc.gov/aging)
Chronic diseases account for most spent on health care.

1980
$245 billion
an average of $1,066 per person

2001
$1.4 trillion
an average of $5,039 per person

2011
$2.8 trillion
an average of $9,216 per person

Mensah: [www.nga.org/Files/ppt/0412academyMensah.ppt#21](http://www.nga.org/Files/ppt/0412academyMensah.ppt#21)
Life Expectancy by Health Care Spending

Our nation spends more on health care than any other country in the world

Mensah: www.nga.org/Files/ppt/0412academyMensah.ppt#22
US Federal Spending in Billions, 2006

- Medicare
- Medicaid
- AoA
- CDC
- CD

Spending in billions:
- Medicare: $350
- Medicaid: $50
- AoA: $100
- CDC: $200
- CD: $250
- Others: $300
- Others: $350

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Leading Causes of Death Age 65+
“Medical Diagnoses”

- Heart Disease 32%
- Cancer 22%
- Stroke 8%
- Chronic respiratory 6%
- Flu/Pneumonia 3%
- Diabetes 3%
- Alzheimer’s 3%

CDC-MIAH 2004; CDC/NCHS Health US, 2002
### “Actual Causes of Death”
#### Behavioral Risk Factors

<table>
<thead>
<tr>
<th>Behavior</th>
<th>% of deaths, 2000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Smoking</td>
<td>19%</td>
</tr>
<tr>
<td>Poor diet &amp; nutrition/ Physical inactivity</td>
<td>14%</td>
</tr>
<tr>
<td>Alcohol</td>
<td>5%</td>
</tr>
<tr>
<td>Infections, pneumonia</td>
<td>4%</td>
</tr>
<tr>
<td>Racial, ethnic, economic disparities</td>
<td>?</td>
</tr>
</tbody>
</table>
Threats to Health and Well-being Among Seniors

- 73% age 65-74 report no regular physical activity
- 81% age 75+ report no regular physical activity
- 61% unhealthy weight
- 33% fall each year
- 15%-20% clinically significant depression
- 35% no flu shot in past 12 months
- 45% no pneumococcal vaccine
- 20% prescribed “unsuitable” medications

www.cdc.gov/nchs
Healthy Aging - Evidence of Benefits to Older Adults

- Longer life
- Reduced disability
  - Later onset
  - Fewer years of disability prior to death
  - Fewer falls
- Improved mental health
  - Positive effect on depressive symptoms
  - Possible delays in loss of cognitive function
- Lower health care costs
NCOA’s Center for Healthy Aging

- Increase the quality and accessibility of health programming for older adults
  - Collaborate with diverse organizations to contribute to a broad-based national movement.
  - Identify, translate and disseminate evidence on what works – scientific studies and best practices.
  - Promote community organizations as essential agents for improving the health of older adults.
  - Advocate for greater support for strong and effective community programs.
The Center’s Work

- Evidence-based Prevention and Model Health Programs
  - Self care of chronic conditions
  - Physical activity
  - Fall prevention
  - Depression
  - Diet
- Physical Activity
- Falls Prevention
- Building Teams and Partnerships
  - Health care and aging
  - Public health and aging
  - Mental health and aging
Coordinating Growing Momentum in Fall Prevention 2004-2008

- Assess the “State of the Field” -
- Convene National Summit of leading organizations
- Develop and Release National Action Plan
  - > 84,000 copies National Action Plan distributed
- Organize and sustain Falls Free Coalition
  - Advocacy, clinical guidelines, home safety, e-news
- Support development of State Coalitions
- Share what we have learned via speeches, workshops, publications
- Develop National Advisory Committee

- Impact
  - Fall Prevention a priority at CDC Injury Center
  - Fall Prevention a priority in AoA grants
  - State and federal legislative action
  - Growing number of state and county coalitions
Launching a National Movement on Evidence-Based Prevention in Aging

- Assess the state of the field - national survey
- Assess the state of the science - expert reviews
- Develop and test evidence-based models
- Integrate aging, public health, health care, mental and research
- Design practical tools; define the field
- Educate and advocate
- Impact
  - Multi-year expansion of funding for now exceeds $25 million
  - Major component of Choices for Independence
  - New language in Older Americans Act and State Plans
  - CDC offers small grants program
  - AHRQ offers training to teams from 24 states
  - Programs attract diverse participants; deliver a health benefit
Where We’ve Been

- Early work - Identifying Best Practices - Physical Activity
- Four-year project, funded by the John A. Hartford Foundation, to develop, test, and disseminate evidence-based health promotion programs for delivery by aging service providers
  - Four programs and toolkits
- NCOA became the National Resource Center for Evidence-based Disease Prevention Programs, an Administration on Aging’s national initiative including 14 community-based organizations that replicated evidence-based healthy aging programs in their communities.
  - Improved health outcomes for older adults
  - Program manuals, reports on lessons learned and best practices, and tools
AoA’s Choices for Independence Initiative

- Empowers individuals to make informed decisions about their long-term support options
  - Aging and Disability Resource Centers
- Provides more choices and flexible funding for individuals at high-risk of nursing home placement
  - Community living incentive
- Enables older people to make lifestyle modifications that can reduce their risk of disease, disability, and injury
  - Evidence-based health promotion and disease prevention programs through local aging services provider organizations
Growing Momentum

- NCOA continues as National Resource Center for Evidence-based Disease Prevention Programs.
- Shaped a collaboration between The Atlantic Philanthropies and the Administration on Aging and its federal partners for a national grants program
- Evidence-based health promotion and disease prevention program Grants
  - All states to implement Stanford’s Chronic Disease Self-Management Program along with one other EBP
  - 2006 – 16 states funded
  - 2007 – 8 additional states funded
  - 2007 – 3 additional states - AP Challenge Grants
  - 2008 – 8 states funded through AP Sustainable Systems Grant
Growing Momentum

- Total national, state and local investment exceeds $25,000,000 since 2002
- AP grant to NCOA of $5,000,000
  - Embed the Stanford Chronic Disease Self-Management Program in five states
  - Foster diffusion of the CDSMP
  - Build and support networks of providers
  - Address policy and regulatory barriers
National Movement

27 Evidence-Based Prevention Program States

- Evidence-Based States-funded
- Evidence-Based States-unfunded

Prepared by the Center for Healthy Aging, NCOA
www.healthyagingprograms.org

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Local Level Work to National Success

Evidence-Based Disease Prevention Grants Program

- Impact - Of the 24 AoA states funded, more than 11,030 older adults have participated in at least one of 7 evidence-based programs. (May 2008)
  - 2007 grantees: 25 host organizations and 73 implementation sites
  - 2006 grantees: 73 host organizations and 422 implementation sites
Healthy Aging in America

The important role of the local level

Lowcountry Senior Center, Charleston, SC
## Impact at the Local Level

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</tr>
<tr>
<td>3%</td>
<td></td>
</tr>
<tr>
<td>Diabetes</td>
<td></td>
</tr>
<tr>
<td>3%</td>
<td></td>
</tr>
<tr>
<td>Alzheimer’s</td>
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</tr>
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Behavior % of deaths *

* 2000
Impact at the Local Level

- 73% age 65-74 report no regular physical activity
- 81% age 75+ report no regular physical activity
- 61% unhealthy weight
- 33% fall each year
- 15%-20% clinically significant depression
- 35% no flu shot in past 12 months
- 45% no pneumococcal vaccine
- 20% prescribed “unsuitable” medications

What can the senior center do to impact or change this behavior?
Local Aging Service Providers Can Make a Difference!

EnhanceFitness
What Does It Take?

- Know your customers and potential customers
- Know the trends and research
- Ask for input
Who Were Senior Centers Created to Serve?

- Individuals 60 years old and older
- GI Generation born 1901-1924
- Difficult to segment by age but there are some generalities

Value
- Collective Organization
- Patriotism
- Neighborliness

Generations: The History of America's Future, 1584 to 2069, Neil Howe, William Strauss
Who Were Senior Centers Created to Serve?

Experiences

- WWI
- Great Depression
- America’s first Boy Scouts and Girl Scouts
- Worked easily in groups

Translation

- Congregate dining
- Singalongs, bingo (familiar entertainment for a cohort raised before many families had TV)
- Congregate dining - vegetables well done
Who Are Senior Centers Serving Today?

Silent Generation (born 1925-1944)
Value
- More Individual Focus
- Rules and Policies
- Price Conscious

Experiences
- Post WWII
- Korean Conflict
- Cold War
- Civil Rights

Translation
- Smaller group dining
- Quality and Choices
- Willing to spend for quality
Who Are Senior Centers Serving Today?

Boomers (born 1946-1964)
- The largest population in the U.S.
- Best educated
- Most affluent
- Healthiest

Value
- Choice
- Quality
- Making a difference
Experiences
- Vietnam war
- Beatniks/Woodstock
- Civil rights
- Have evolved from Beaver the Cleaver to Hippie to bran eater to yuppie to post yuppie

Translation
- High quality programming
- Short-term/focused commitments
- Dining - small group, quality and choices
- They are on a quest for “self”
- Increase in dual income families
- Things that make their lives easier, more convenient
- Don’t have time to read lengthy marketing effort
- If you don’t capture their attention in seconds, then you’ll lose them
Know the Research

- Columbia University Research
  - Completed in 2001
  - Studied 1700 senior adults over 7 years
  - Participating in regularly scheduled classes and activities each week reduce the development of dementia
  - Supports the brain research currently being conducted
Research

- Research from **Successful Aging: The MacArthur Foundation Study**
  - Social Support helps one to obtain better or prompter medical care
  - Supportive behaviors have biological effects that directly increase one’s resistance to disease
  - Social support also increases conformity to group norms that are health promotive, such as regular exercise, good nutrition, medication management
Research
Chronic Disease Self-Management Course

- For 20 years or so, the Stanford Patient Education Research Center has developed, tested, and evaluated self-management programs for people with chronic health problems.
- Small-group workshops, 6 weeks long, meeting once a week for about 2 hours, led by a pair of peer/lay leaders -- meetings are highly interactive, focusing on building skills, sharing experiences and support.
- Participants, when compared to those who did not, demonstrated significant improvements in level of exercise, cognitive symptom management, communication with physicians, self-reported general health, health distress, fatigue, disability, and social/role activities limitations.
- Fewer days in the hospital, a trend toward fewer outpatients visits and hospitalizations. These data yield a cost to savings ratio of approximately 1:10. Results can persist for as long as three years.

http://patienteducation.stanford.edu/programs/cdsmp.html
Programming for Senior Center

- Based on the 6 dimensions of wellness
  - Emotional Wellness
  - Intellectual Wellness
  - Physical Wellness
  - Social Wellness
  - Spiritual Wellness
  - Vocational Wellness
Lowcountry Senior Center Model

- Wellness model - based on the 6 dimensions of wellness
- Holistic approach to programming, and aging
- Encourages self responsibility
- Self-management of chronic conditions
- Targeting age 50+ individuals
- Bringing together the social and medical fields
Year One - Lowcountry Senior Center

- Staffing 2.4 FTE’s
- Hours - 8:30 - 5:00 Monday - Friday
- Sunday rental
- Paid and Volunteer instructors
- Monthly newsletter (MS Word)
- Growth of membership from 120-600
- Budget $150,000
- 8 months - added 1 FTE for programming
Current Snap Shot

- FY 2006 - 54,000+ visits to center
- Average age of member - 69 years
- 18% - 22% - Minority
- 76% members joined at $85 level
- 33% members have an income of $25,000 or less
- 1200+ members served, 200-300 non-members served
Why Evidence-Based Programming?

- Attracts funding
- Attracts new members
- We know we help to improve the quality of lives — let’s prove it!
- Increased effectiveness/efficiency of programming
- Consumers will demand it!
- Creates credibility
- We have the infrastructure — create partnerships.
- Senior centers constantly adapt to the needs of the community
- Re-orient systems to prevention
- We want to offer the best to our customers.
The View at the Local Level

- Lowcountry Senior Center Journey
  - Developed substantial partnerships - healthcare, municipalities, AAA, etc.
  - Collected Outcomes for Senior Center attendance
  - National Senior Center Accreditation - partnerships plan
  - Watching the early development of CDSMP and other EBP
  - Developed an advisory group
  - Trained as Arthritis Self Help workshop leaders
  - Reviewed literature available
  - Developed business case
  - Developed action plan - which programs, when, etc.
  - Identified funding
  - Implementation plan
A Menu of Programs (2002-2008)

- Arthritis Self-Help
- EnhanceFitness
- Chronic Disease Self-Management Program
- Spirituality Programming/Sage-ing Circle
- Cyber Seniors (Outcomes)
- EnhanceWellness
- Healthy Eating Every Day
- Matter of Balance
- Powerful Tools for Caregivers (Outcomes)
- Arthritis Exercise Program
Matter of Balance

- Research by the Roybal Center for Enhancement of Late-Life Function at Boston University
- Designed to reduce the fear of falling and increase the activity levels of older adults who have concerns about falls
- Designed to benefit community-dwelling older adults who:
  - Are concerned about falls
  - Have sustained a fall in the past
  - Restrict activities because of concerns about falling
  - Are interested in improving flexibility, balance and strength
  - Are age 60 or older, ambulatory and able to problem-solve

http://www.mainehealth.org/mh_body.cfm?id=432
Matter of Balance

- Eight sessions, meeting weekly or twice weekly for two hours per session
- Meetings are led by volunteer lay leaders.
- A Master Trainer is responsible for teaching the Matter of Balance curriculum to the coaches and providing them with guidance and support as they lead the Matter of Balance classes.
- 10-12 participants (Minimum of 8, maximum of 14 )
What Are the Outcomes?

- After completing A Matter of Balance:
  - 97% of participants are more comfortable talking about fear of falling
  - 97% feel comfortable increasing activity
  - 99% plan to continue exercising
  - 98% would recommend MOB

- Participants demonstrated significant improvements in their level of falls management, falls control, level of exercise and social limitations with regard to concern about falling.

(Preliminary findings, Healy, McMahon, & Haynes, 2006).
Matter of Balance - What Does It Cost?

- Training for Master Trainer and Lay Leaders
- License Fee
- Materials for Workshop
- Space
- Volunteer Support
- Administrative Support
- Marketing
Chronic Disease Self-Management Program

- Created by Kate Lorig from the Stanford Patient Education Research Center
- Designed to address chronic diseases such as lung and heart disease, diabetes and arthritis
- Derived from focus groups with patients
- Shifts the sites of care from the medical setting to the community
- Evaluated in randomized trials for long-term outcomes

Source: Adapted from Kate Lorig presentation, AHRQ conference, 2006
Different Levels of Involvement

- Implement the programming (Host site)
- Partner with others to offer programs at the center (Implementation site)
- Help recruit lay leaders/instructors from volunteers, staff, older worker programs, etc.
How Does the Program Work?

- Small peer-led groups of 10-16 people
- Process is more important than content
- Empowerment and self-efficacy are key concepts
- 6 weeks - 2 ½ hour sessions each
- Standardized training for leaders
- Highly structured facilitation protocol
- Standardized participant materials
- Meetings are highly interactive, focusing on building skills, sharing experiences and support e.g., symptom management, action planning, problem-solving, communications, exercise, nutrition, advanced directives.

Source: Adapted from Kate Lorig presentation, AHRQ conference, 2006
What Are the Outcomes?

- For over 20 years, Stanford Patient Education Research Center has developed, tested, and evaluated self-management programs for people with chronic health problems.

- Participants, when compared to those who did not, demonstrated significant improvements in level of exercise, cognitive symptom management, communication with physicians, self-reported general health, health distress, fatigue, disability, and social/role activities limitations.

- Fewer days in the hospital, a trend toward fewer outpatients visits and hospitalizations. These data yield a cost to savings ratio of approximately 1:10. Results can persist for as long as three years.

http://patienteducation.stanford.edu/programs/cdsmp.html
What Does CDSMP Cost?

- Agency staff time
- License from Stanford
- Lay Leader Training
  - 2 Master Trainers
  - Food and materials (only for training)
- Participant books and tapes
- Marketing expenses
- Lay leader support
- Program evaluation
Enhance Fitness - How Does It Work?

- Low-cost, evidence-based group exercise program developed specifically for older adults
- Exercises packaged into a formal regimen focusing on four key areas important to the health and fitness of mature participants:
  - Stretching and flexibility
  - Low impact aerobics
  - Strength training
  - Balance
- Classes meet three times a week, providing social stimulation as well as physical benefits (10-25 participants per class).
- Senior Services, Inc., Seattle, Washington
Evaluation and Outcomes

- Outcomes testing is conducted in the first week of classes and repeated every four months.
- Tests include the Bicep Curl to test upper body strength, the 8 Foot Up and Go to test balance and mobility, and the Chair Stand to test lower body strength.
- University of Washington
What Are the Outcomes?

- 100 sites nationally since 1993
- The original independent study demonstrated that participants realized:
  - 13% improvement in social function
  - 52% improvement in depression
  - 35% improvement in physical functioning
- Cost analysis: Healthcare utilization costs of participants were 79% of non-participants' costs to their HMO after one year.

www.projectenhance.org/pro/fitness.html
Enhance Fitness - What Does It Cost?

- Training for class leaders (initial and annual updates)
- Certified instructors
- Master Trainer (optional)
- Instructor payment
- Weights
- Administrative costs
- License fees per site
- Volunteer support
- Space/Supplies
“Excovate” to Innovate - What Does It Cost?

- Communications
Healthy Aging in America

Local Service Providers Can Make a Difference!

- EBP programs based in research showing that they have a positive measurable health benefit
- EBP attracts members/participants
- Program outcomes can be used in work with funding sources and policy makers.
- Relatively inexpensive to replicate
- Helps provider to develop substantial partnerships
- EBP is of interest to healthcare systems
- Expands variety of programming
Other Evidence-Based Programs

- Healthy Ideas, Pearls, Active Living Every Day, Medication Management
  - www.healthyagingprograms.org

- On-Line Training Modules - Evidence-Based 101
  - http://www.healthyagingprograms.org/content.asp?sectionid=135
Resources - Center for Healthy Aging - NCOA

- www.healthyagingprograms.org
- Checklist for Structured Physical Activity Programs for Older Adults
- Checklist for Fall Prevention Programs
- From Their Study to Your Demonstration: Tracking Similarities and Differences in Evidence-Based Program Implementation
- Self-Assessing Readiness for Implementing Evidence-Based Health Promotion and Self-Management Programs
Resources You Can Use

www.healthyagingprograms.org

"With our Evidence-Based Prevention Program, we are taking health promotion and disease prevention to a new level and positioning the network as a sustainable vehicle for translating research into practice."

Joseph Carnevali, October 18, 2004

"As part of our mission to improve our society’s capacity to provide quality health programs for older Americans, the John A. Hartford Foundation started the Model Programs Project. Through practical, cost-effective programs administered by network partners, health-care and community service providers can successfully and reasonably improve the health of older adults."

Gwenet P. Sisk, Executive Director and President, The John A. Hartford Foundation

"A difference, to be a difference, must make a difference."

Anonymous
More Resources You Can Use

- www.healthyagingprograms.org
- www.thecommunityguide.org
- www.asaging.org/cdc/HealthWord
- www.uncioa.org/agelib/nchan_main
- www.re-aim.org
What It Takes

- Understanding the challenges we face as an aging nation
- Understanding that changing behavior and lifestyles can make a difference
- Support and commitment for evidence-based health promotion programs
- Developing partnerships to implement evidence-based health promotion programs
- Development of tools, resources and funding
- Ongoing research
- Commitment to systems change
Three Kinds of Senior Centers

- Make things happen!!!
- Watch things happen!
- Wonder what happened!
What It Takes -

Never doubt that a small, committed group of individuals can change the world, for indeed it’s the only thing that ever has-

*Margaret Mead*
Center for Healthy Aging

Jill Jackson Ledford, MSW
VP, Health Promotion

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Lowcountry Senior Center
www.rsfh.com/seniorcenter