

# Age-Friendly Health Systems



**Richard M. Allman, MD**

Professor Emeritus, University of Alabama at Birmingham

Clinical Professor, George Washington University School of Medicine and Health Sciences, Washington, DC

Adjunct Faculty, Gerontology & Geriatric Medicine, Wake Forest School of Medicine, Winston Salem, NC

Former Chief Consultant, Geriatrics & Extended Care, Department of Veterans Affairs, Washington, DC

[richard.mark.allman@gmail.com](mailto:richard.mark.allman@gmail.com)

# Conflicts of Interest

- I have no conflicts of interest relevant to this presentation.
- I serve as the manager for Allman Coaching, LLC. I serve as an Executive Life and Leadership Coach for healthcare leaders who are committed to improving patient care, research, education, quality improvement, and policy initiatives.

# Goals of This Presentation

- Define an age-friendly health system
- Understand facilitators and barriers to such a system
- Describe potential strategies for developing, implementing, and maintaining such a system
- Describe the role of leadership, education, research and quality improvement
- Elucidate outcomes for older adults

# Case Presentation

- BZP, a 76-year-old white, female widow
- Chief complaint of mid-back pain
- Developed acutely while cleaning her bathtub
- Pain worse when standing and coughing
- More than 100 pack-year smoking history
- Hysterectomy and oophorectomy age 35
- Chronic bronchitis and sinusitis
- Independent in BADLs and IADLs

# Case Presentation

- X-ray showed vertebral compression fracture
- Prescribed acetaminophen with codeine and bedrest
- Pain showed gradual improvement over six weeks but persisted
- BZP stopped going out to visit friends and limited driving after car wreck

# Case Presentation

| Functional Measure                                                                                                     | Before Fracture | After Fracture |
|------------------------------------------------------------------------------------------------------------------------|-----------------|----------------|
| <b>BADL difficulty</b><br>(eating, <i>bathing</i> ,<br><i>dressing</i> , toileting,<br>transferring)                   | 0               | 2              |
| <b>IADL difficulty</b> ( <i>house</i><br><i>chores</i> , telephone,<br>money management,<br><i>shopping</i> , cooking) | 0               | 2              |
| <b>Life-Space Mobility</b>                                                                                             | 82              | 48             |

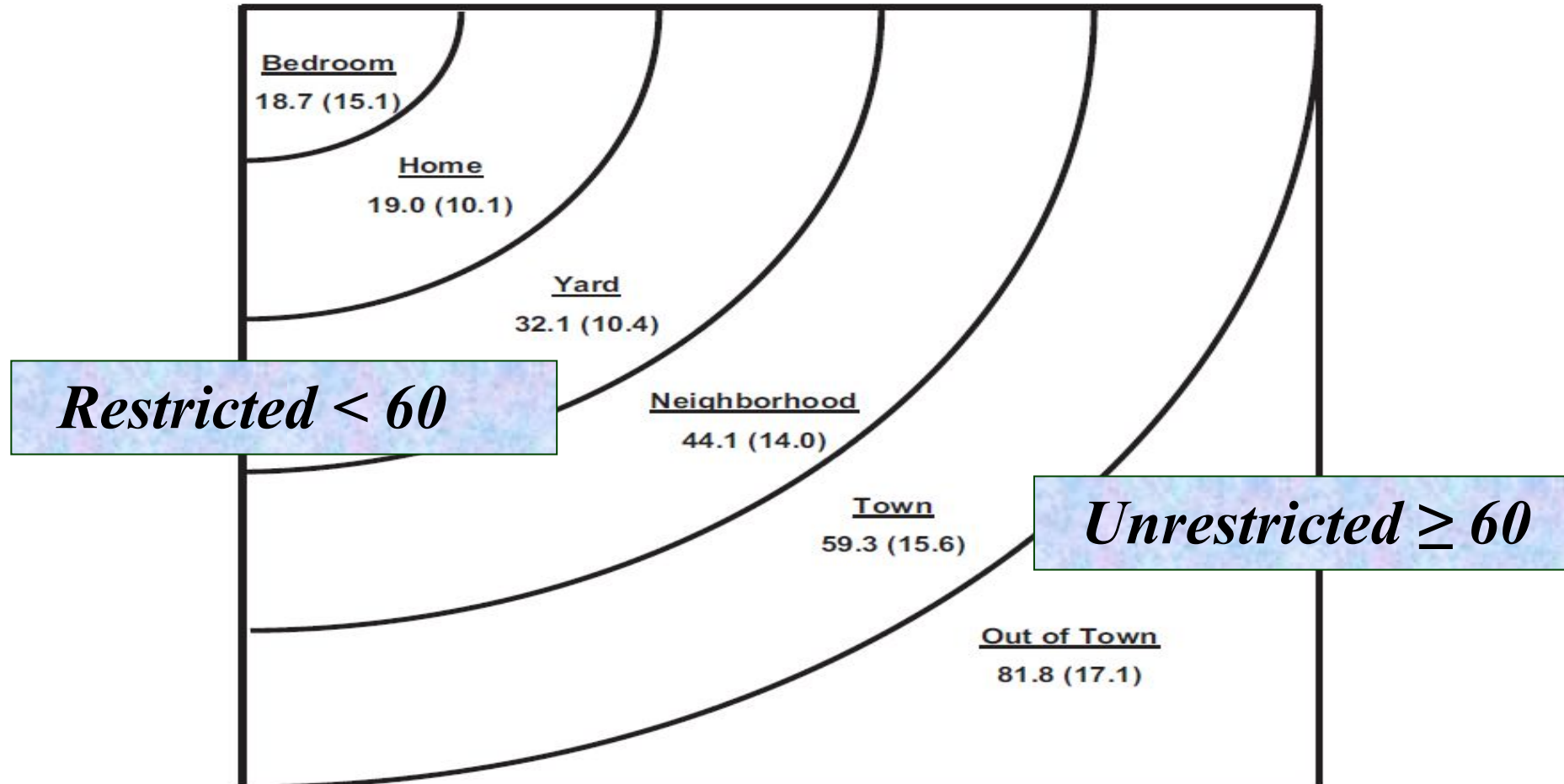
# The UAB Study of Aging Life-Space Assessment

| UAB Study of Aging Life-Space Assessment                                                                                                                                |  |                              |    |                   |                 |                                                                       |       |                                                                                            |  |                      |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|------------------------------|----|-------------------|-----------------|-----------------------------------------------------------------------|-------|--------------------------------------------------------------------------------------------|--|----------------------|
| Name:                                                                                                                                                                   |  |                              |    |                   | Date:           |                                                                       |       |                                                                                            |  |                      |
| These questions refer to your activities just within the past month.                                                                                                    |  |                              |    |                   |                 |                                                                       |       |                                                                                            |  |                      |
| LIFE-SPACE LEVEL                                                                                                                                                        |  | FREQUENCY                    |    |                   |                 | INDEPENDENCE                                                          |       | SCORE                                                                                      |  |                      |
| During the past four weeks, have you been to . . .                                                                                                                      |  | How often did you get there? |    |                   |                 | Did you use aids or equipment? Did you need help from another person? |       | Level<br>X<br>Frequency<br>X<br>Independence                                               |  |                      |
| <i>Life-Space Level 1. . . Other rooms of your home besides the room where you sleep?</i>                                                                               |  | Yes                          | No | Less than 1 /week | 1-3 times /week | 4-6 times /week                                                       | Daily | 1 = personal assistance<br>1.5 = equipment only<br>2 = no equipment or personal assistance |  |                      |
| <b>Score</b>                                                                                                                                                            |  | _____ X _____                |    | _____ X _____     |                 | _____ X _____                                                         |       | = <i>Level 1 Score</i>                                                                     |  |                      |
| <i>Life-Space Level 2. . . An area outside your home such as your porch, deck or patio, hallway (of an apartment building) or garage, in your own yard or driveway?</i> |  | Yes                          | No | Less than 1 /week | 1-3 times /week | 4-6 times /week                                                       | Daily | 1 = Personal assistance<br>1.5 = Equipment only<br>2 = No equipment or personal assistance |  |                      |
| <b>Score</b>                                                                                                                                                            |  | _____ X _____                |    | _____ X _____     |                 | _____ X _____                                                         |       | = <i>Level 2 Score</i>                                                                     |  |                      |
| <i>Life-Space Level 3. . . Places in your neighborhood, other than your own yard or apartment building?</i>                                                             |  | Yes                          | No | Less than 1 /week | 1-3 times /week | 4-6 times /week                                                       | Daily | 1 = Personal assistance<br>1.5 = Equipment only<br>2 = No equipment or personal assistance |  |                      |
| <b>Score</b>                                                                                                                                                            |  | _____ X _____                |    | _____ X _____     |                 | _____ X _____                                                         |       | = <i>Level 3 Score</i>                                                                     |  |                      |
| <i>Life-Space Level 4. . . Places outside your neighborhood, but within your town?</i>                                                                                  |  | Yes                          | No | Less than 1 /week | 1-3 times /week | 4-6 times /week                                                       | Daily | 1 = Personal assistance<br>1.5 = Equipment only<br>2 = No equipment or personal assistance |  |                      |
| <b>Score</b>                                                                                                                                                            |  | _____ X _____                |    | _____ X _____     |                 | _____ X _____                                                         |       | = <i>Level 4 Score</i>                                                                     |  |                      |
| <i>Life-Space Level 5. . . Places outside your town?</i>                                                                                                                |  | Yes                          | No | Less than 1 /week | 1-3 times /week | 4-6 times /week                                                       | Daily | 1 = Personal assistance<br>1.5 = Equipment only<br>2 = No equipment or personal assistance |  |                      |
| <b>Score</b>                                                                                                                                                            |  | _____ X _____                |    | _____ X _____     |                 | _____ X _____                                                         |       | = <i>Level 5 Score</i>                                                                     |  |                      |
| <b>TOTAL SCORE (ADD)</b>                                                                                                                                                |  |                              |    |                   |                 |                                                                       |       |                                                                                            |  | <i>Sum of Levels</i> |



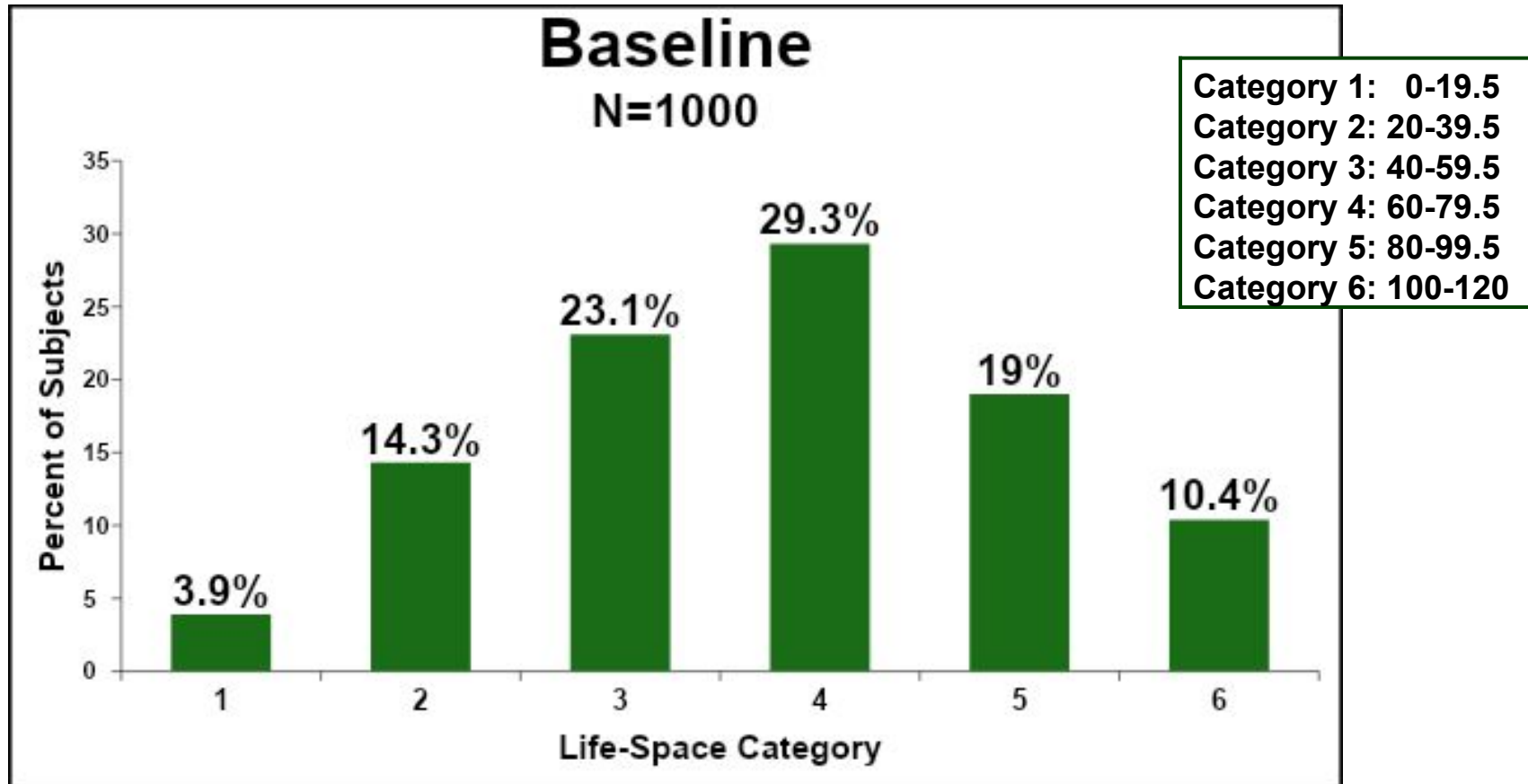
Physical Therapy. 2005; 85:1008–1019.

# Mean Life-Space Scores (SD) By Life-Space Level Achieved Independently





# Distribution of UAB Study of Aging Life-Space (N=1000)



# Case Presentation

- BZP had difficulty playing cards with friends
- Had intermittent exacerbations of back pain
- Started making lists to remember what medications to take
- Stopped cooking regular meals
- Several months after the vertebral fracture, she asked her son to come from out of state to move her to his home

# Case Presentation

- When son arrived, BZP's house was not as orderly and clean as usual
- The mother's gown had holes from multiple cigarette burns
- The mother was confused and somewhat agitated
- Admitted to hospital in the son's hometown
- Diagnosed with atrial fibrillation and moderately severe Alzheimer's Disease

# Case Presentation

- One-year later, BZP was admitted to skilled, assisted living facility for assistance with ADL and IADL
- Within six weeks of that admission, BZP fell and experienced a right trochanteric fracture
- After surgical pinning, delirium developed
- Discharged for post-acute rehab and began ambulation with a walker
- Developed pain in right hip with ambulation, but moved without pain from bedroom to dining room by self-propelling in a wheelchair

# Case Presentation

- Follow-up visit with ortho surgeon six weeks after hip fracture – surgical pin was loose
- Repeat hip replacement surgery recommended
- Life-space mobility was 22
- Should the recommendation be followed?
- Risk of post-op delirium and other complications
- Benefit – no increase in life-space mobility likely; pain only present with weight bearing; already able to participate in the social activities she could enjoy

# What is an Age Friendly Health System?

- Older adults get the best care possible
- Follows an essential set of evidence-based practices
- Health care related harms to older adults are dramatically reduced and approaching zero
- Older adults are satisfied with their care
- Value is optimized for all – patients, families, caregivers, health care providers and the system

# Characteristics of an Age-Friendly Health System

- Leadership committed to addressing ageism
- A care prototype specific to older adults
- Trained and expert clinical staff
- Care teams that demonstrate measurable results
- A systematic approach to care coordination
- A strategy to identify, coordinate with, and support family caregivers
- Process for developing care plans based on patient goals and preferences

# Leadership is required to overcome impact of discrimination based on prejudices about age

- Leaders assuming older adults will not benefit from access to professionals with special competencies in geriatrics or to programs and services designed to address their needs and those of their families
- Clinicians attributing a new symptom to age rather than looking for an underlying and treatable cause
- Clinicians assuming an older adult accompanied by a family member is cognitively impaired and talking with the family member while ignoring the older adult



# Building , Promoting and Sustaining an Age-Friendly Model

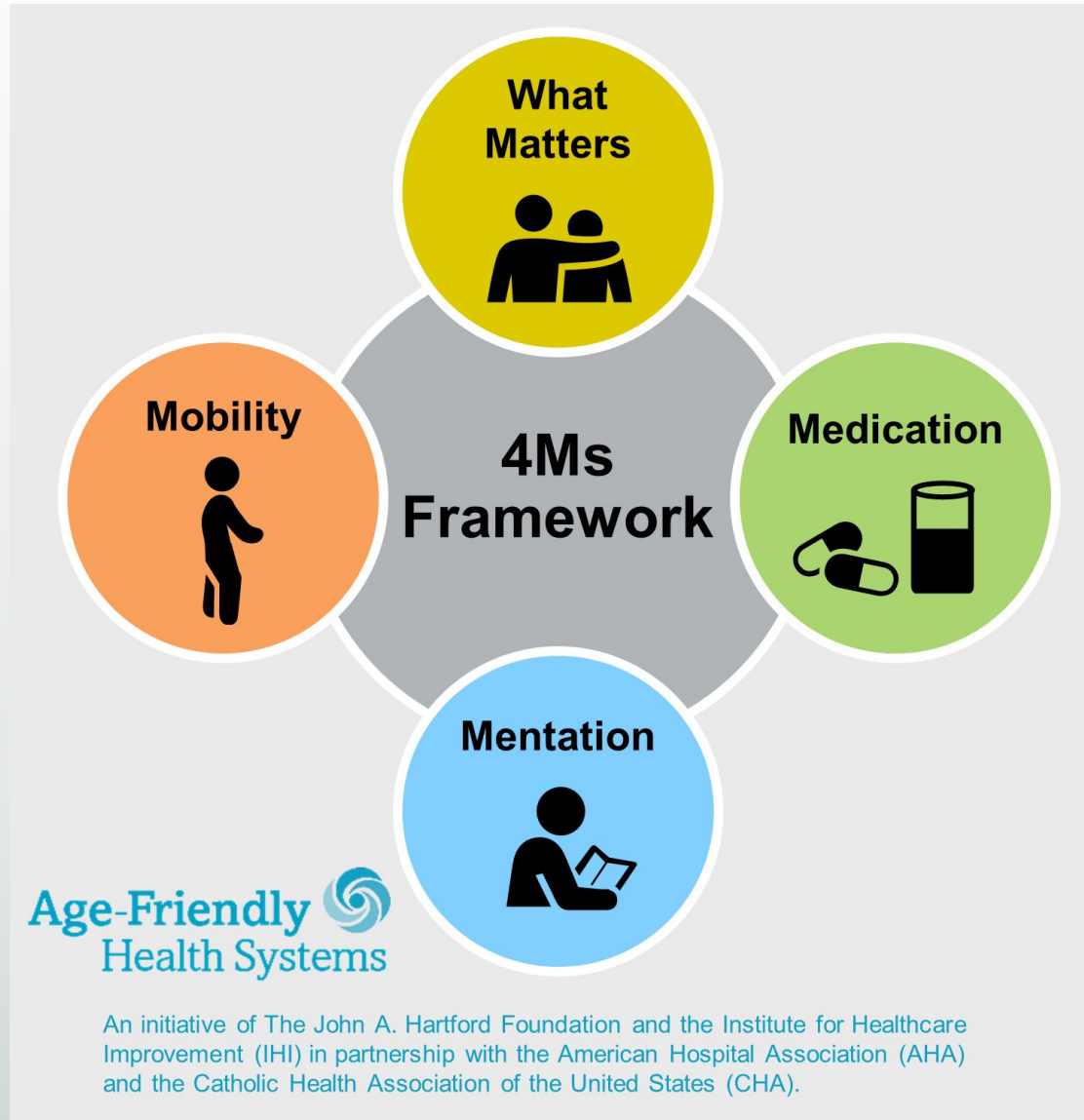
## Facilitators

- Leadership with vision and commitment to mission sustained over long period
- Environment promoting interdisciplinary community
- Partnerships and care coordination between outpatient, inpatient, home, community-based, & institutional care
- Educational, research, and quality improvement initiatives

## Barriers

- Inadequate number of appropriate workforce members to provide leadership, clinical service, education, to conduct research and support continuous improvement leaving system vulnerable to loss of leaders or staff
- Policies for funding, measuring care quality, and administering healthcare plans and systems

# Framework for an Age-Friendly Health System



# Assessments of the 4 MS

- Assess health care outcome goals and preferences using validated approaches
- Identify and avoid high-risk medicines; deprescribe
- Assess mental status (Mini-Cog, Montreal Cognitive Assessment (MoCA), St. Louis University Mental Status (SLUMS), Patient Health Questionnaire 9 (PHQ9), Confusion Assessment Method (CAM))
- Assessments of mobility (Timed Up and Go (TUG), Johns Hopkins-Highest Level of Mobility JH-HLMS) Scale)

# Putting the 4 Ms Into Practice

The 4 Ms as a set may be integrated into ongoing care by following six steps:

1. Understand your current state
2. Describe care consistent with the 4 Ms
3. Design or adapt your workflow to deliver care consistent with the 4 Ms
4. Provide care consistent with the 4 Ms
5. Study your performance
6. Improve and sustain care consistent with the 4 Ms
  - Repeat steps 2-6 as a loop aligned with Plan-Do-Study-Act cycles

# UAB Hospital Age-Friendly Programs

## Geriatric Scholar Programs

- Interprofessional Track with QI Projects
- Patient Support Track

ACE Unit

Virtual ACE  
(disseminating ACE  
process to non-ACE  
Units)

Hospital-Wide Safe  
Mobility Program

Hospital Elder Life  
Program

Hospital-Wide Geriatric  
Education

Geriatric Surgery  
Verification Program  
(American College of  
Surgeons Collaboration)

Geriatric ED

IHI Age Friendly Health  
System Specific Projects

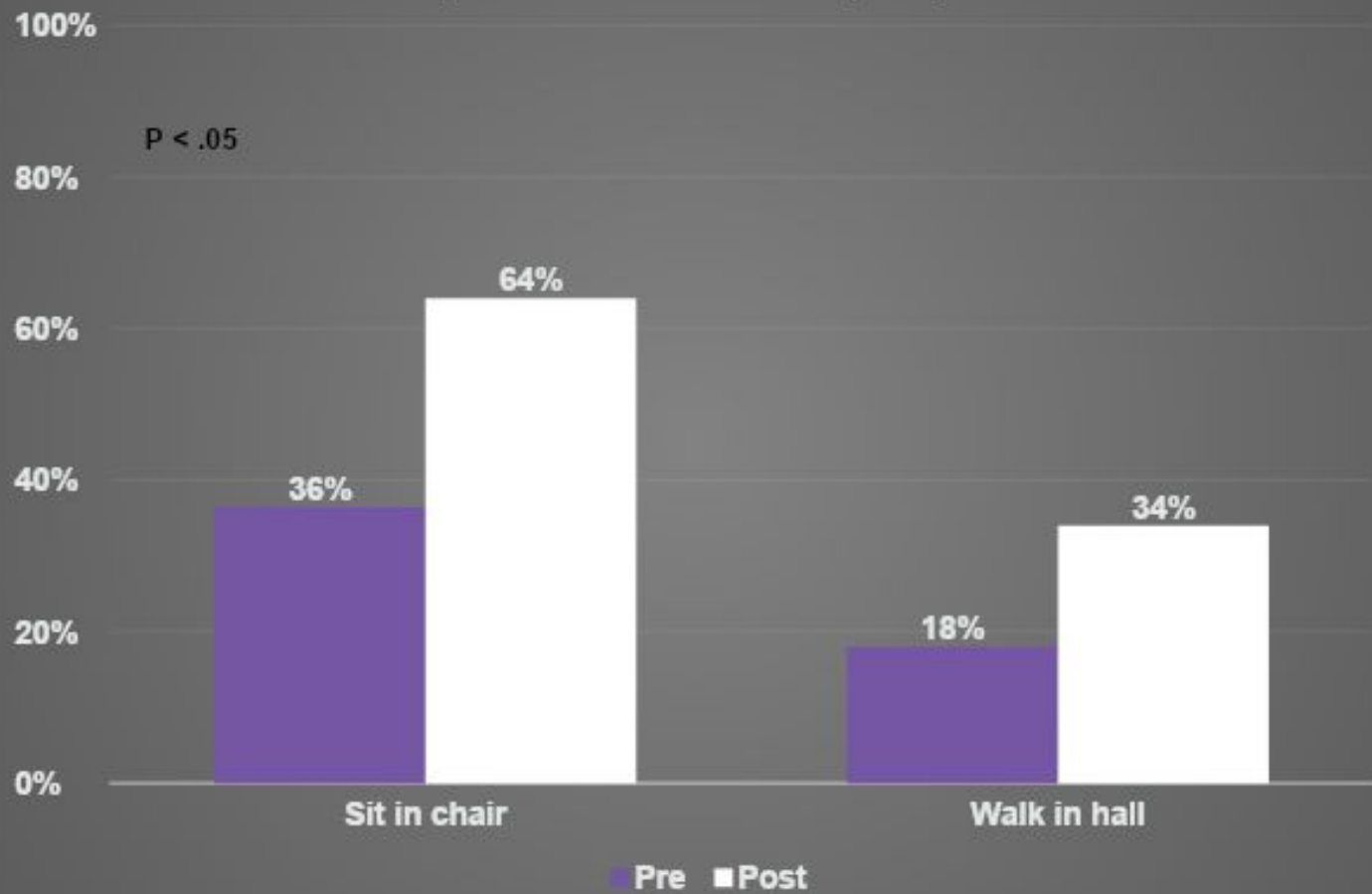
Inpatient Geriatric  
Consults

Wound and Diabetes  
Scholar Programs

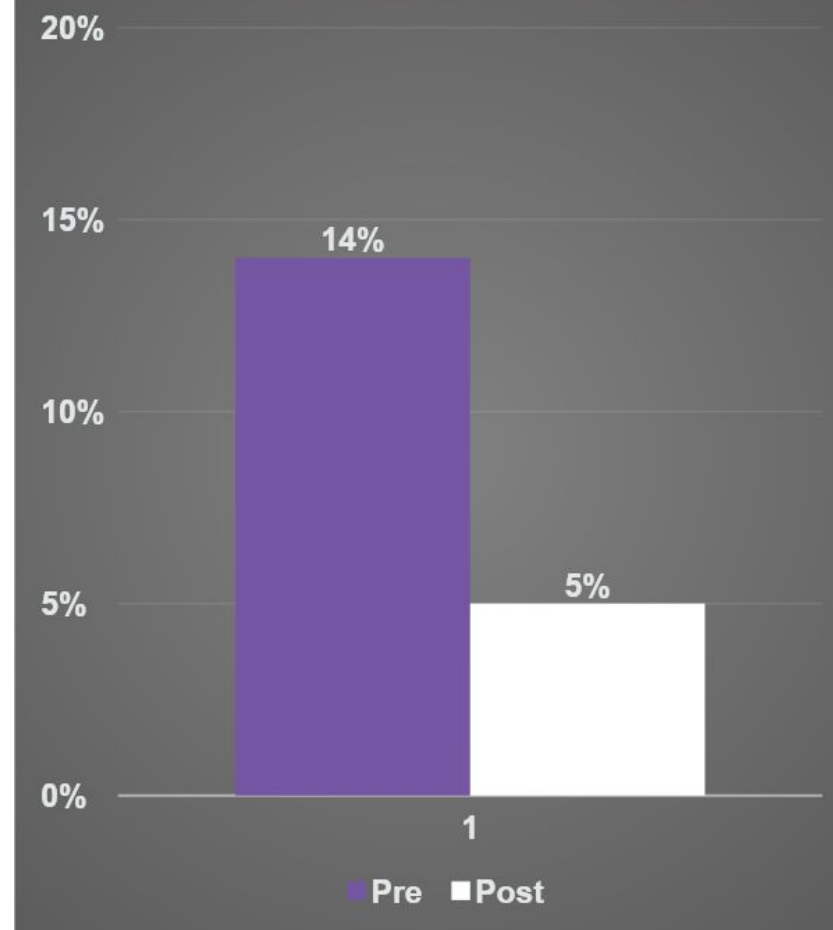
**Improving Geriatric Care Processes on Two Medical-Surgical Acute Care Units: A Pilot Study**

Katrina A. Booth • Emily E. Simmons • Andres F. Viles • Whitney A. Gray • Kelsey R. Kennedy • Shari H. Biswal • Jason A. Lowe • Anisa Khaja • Richard E. Kennedy • Cyrrhia J. Brown • Kellie L. Flood

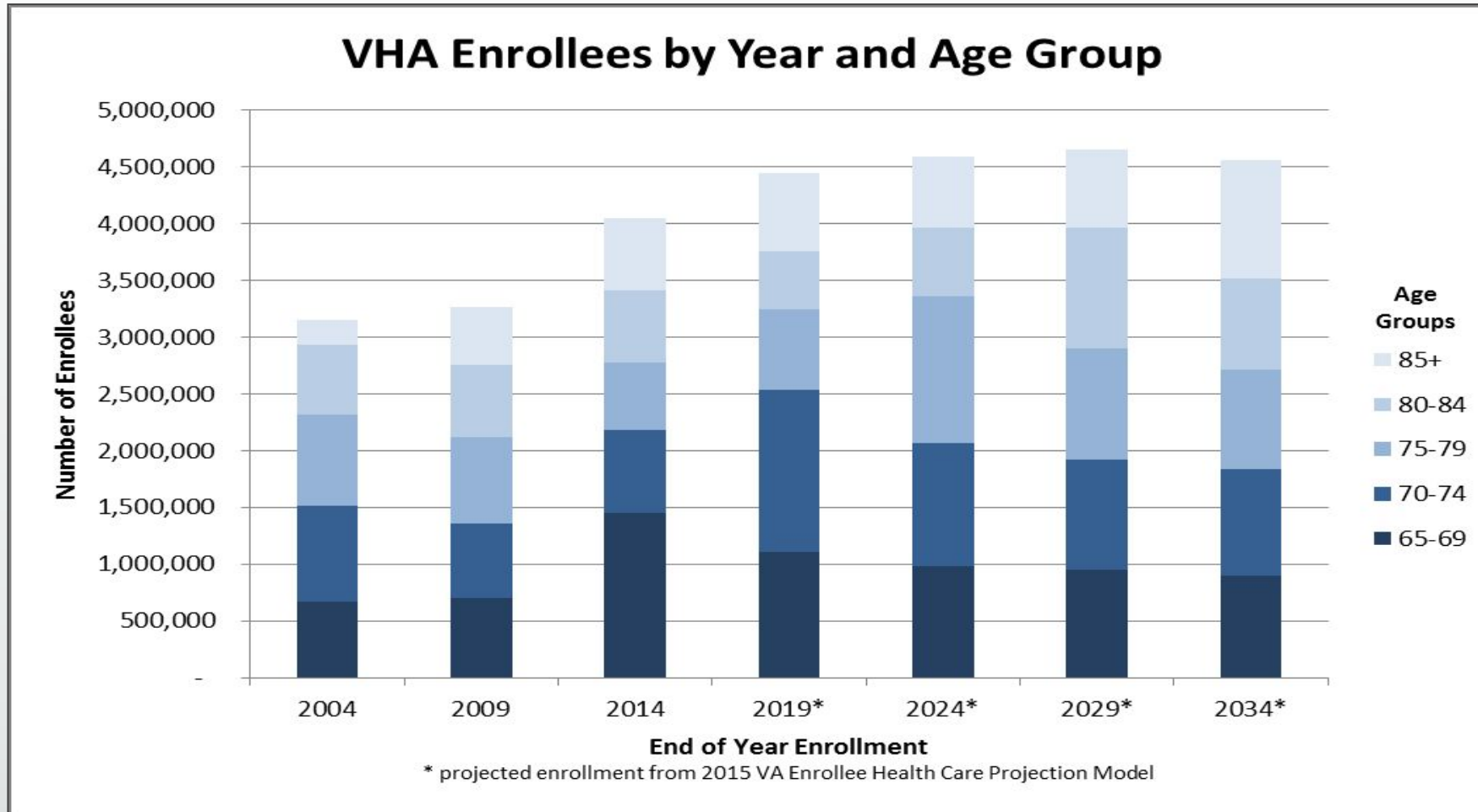
**Mobility: "In the last 24 hours, did you..."**



**Patients with Positive Delirium Screen**

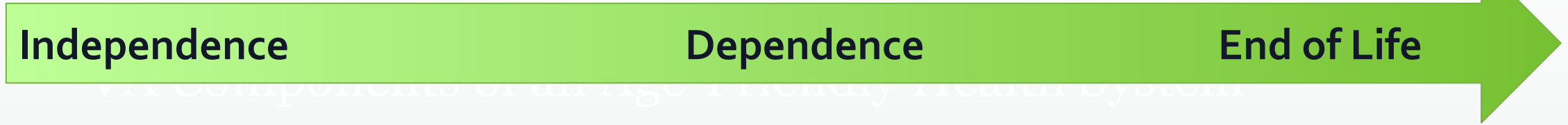


# THE VETERANS HEALTH ADMINISTRATION (VHA): A NATIONAL SYSTEM WITH AGE-FRIENDLY COMPONENTS



The Veterans Health Administration (VHA) is the largest integrated health care system in the United States, providing care at 1,298 health care facilities, including 171 VA Medical Centers and 1,113 outpatient sites of care of varying complexity (VHA outpatient clinics) to over 9 million Veterans enrolled in the VA health care program.

# Veterans Health Administration (VHA) – A Unique National Model for a Healthcare System Providing Continuum of Care Components of an Age-Friendly System



| Independence                                                                                                                               | Dependence                                                                                                                                                                                                                                                             |                                                                                                                             | End of Life                                                                                                                       |                                                                                    |
|--------------------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------|------------------------------------------------------------------------------------|
| <p><b>Ambulatory Care</b></p> <p>Geriatric Evaluation &amp; Management, Geriatric Primary Care (Geri-PACT), Outpatient Palliative Care</p> | <p><b>Home &amp; Community Based LTSS*</b></p> <p>Adult Day Health Care, Home Based Primary Care, <b>Homemaker &amp; Home Health Aide</b>, Community Residential &amp; Medical Foster Care, <b>Respite</b>, <b>Skilled Home Care</b>, <b>Veteran Directed Care</b></p> | <p><b>Inpatient Acute</b></p> <p>Geriatric Evaluation and Palliative Care Units, Geriatric and Palliative Care Consults</p> | <p><b>Facility Based Care</b></p> <p>VA Community Living Centers, <b>Community Nursing Homes</b>, <b>State Veterans Homes</b></p> | <p><b>Hospice Care</b></p> <p>VA Inpatient and <b>VA-paid in the community</b></p> |

\*LTSS = Long term services and supports

Red = purchased community care

Blue = both VA and purchased community care



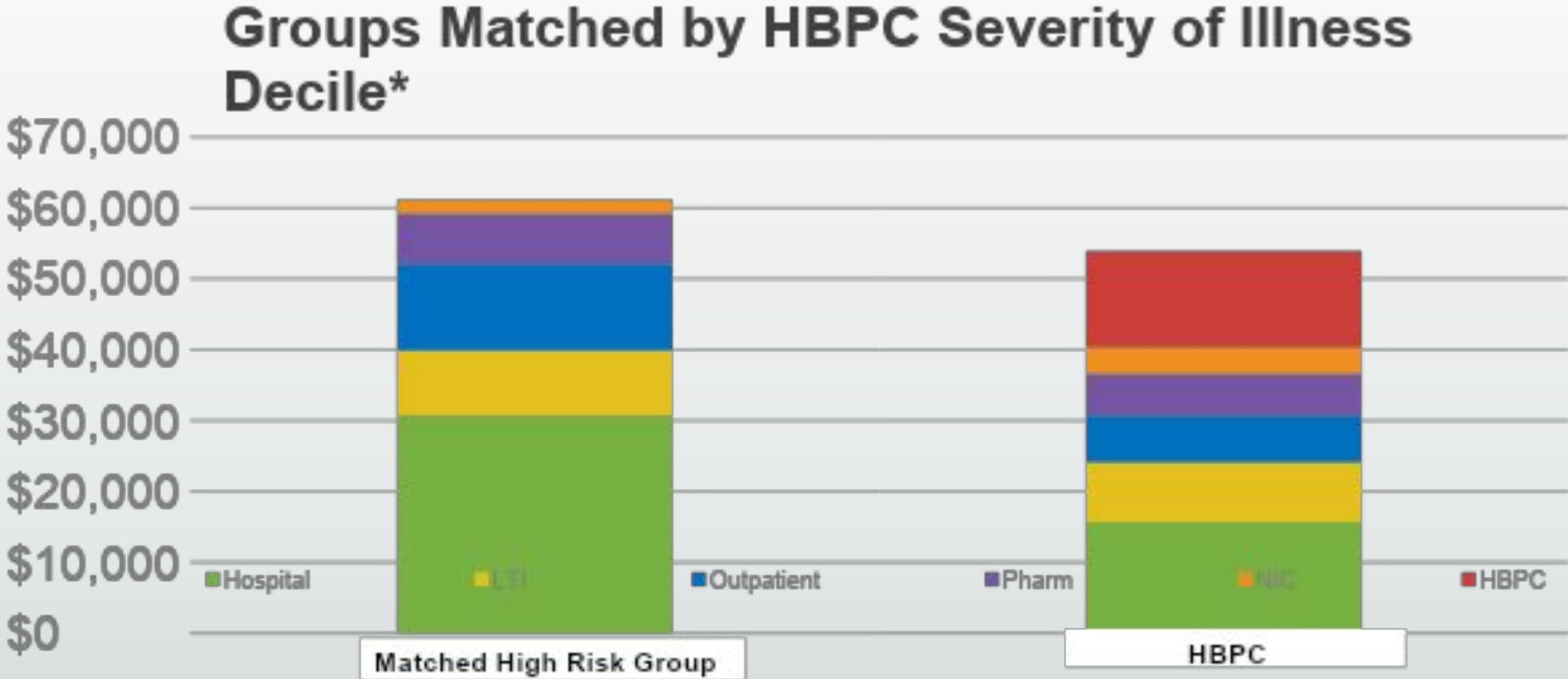
Dementia Care; Transitional Care; Telehealth; Healthcare Workforce Development; Geriatric Research, Education, and Clinical Centers (GRECCs); GEC Field Programs and Resource Centers



# VA Centers of Excellence in Geriatrics (GRECCs)



# Utilization and Costs for Veterans with Home Based Primary Care (HBPC) and a Matched High Risk Comparison Group (2013)



Matching done using VA-specific Nosos Score that predicts costs, Kinosian, Edes, et al

# VA Hospice and Palliative Care Program

- Interdisciplinary teams at every center
- ~50,000 consults per year, oversee 103 inpatient units, & growing outpatient program
- More Veterans die in hospice beds than in all of acute and ICU combined
- 84% of families of decedent Veterans report care was excellent or very good
- Teams are disseminating goals of care conversations training nationally

# Innovative VA Non-Institutional Care Models

- Advanced Care Planning
- Shared Decision Making
- Care Management
- Delirium Care
- Dementia Programs
- Geriatric Consultation
- Hospital in Home
- Home Based Primary Care
- Hospice and Palliative Care
- Medication Reconciliation
- Rehabilitation
- Mobile Care Units
- Programs of All Inclusive Care for the Elderly (PACE)
- Staff Geriatric Education
- Transitional Care
- Patient Priority Care
- Geriatric Patient Aligned Care Teams (GERI-PACT)

# Expected Outcomes of Age-Friendly Systems

- Care congruent with person's goals
- Promotes function and independence
- Prevents poly-pharmacy
- Addresses common geriatric syndromes
- Provides pain and symptom management, i.e., palliative care services
- Recognizes and supports the needs of family caregivers

# Expected Outcomes of Age-Friendly Health Systems

- Identifies at-risk populations and prevents needless decline
- Provides safe and effective hospital care
- Proactively arranges necessary supports and services during transitions between care settings, e.g., hospital to home
- Provides coordination between settings and providers

## **Follow-up on Case Presentation**

- Cataract extraction six months after hip surgery with marked improvement in vision and ability to interact socially with others
- BZP enjoyed weekly visits with son, daughter-in-law, and two grandchildren
- Regularly participated in social activities provided at the skilled assisted living facility
- Showed gradual decline in cognitive function
- Died peacefully at age 79, after falling asleep in her chair in the sitting room of the assisted living facility

# Follow-Up on Case Presentation

- What **Mattered** – connection with family and others
- **Mentation** – avoided medications resulting in declines in cognition and mobility limitation (haloperidol, alprazolam, anti-histamines, and general anesthesia)
- **Mobility** – avoided bedrest; did not repeat, high risk surgical intervention with little prospect of improving outcomes important to the patient; removed cataracts; treated depression symptoms and sleep difficulty with trazadone; pursued rehab and social interactions to enhance quality of life
- **Medication** – management focused on what mattered to BZP; treated pain with acetaminophen



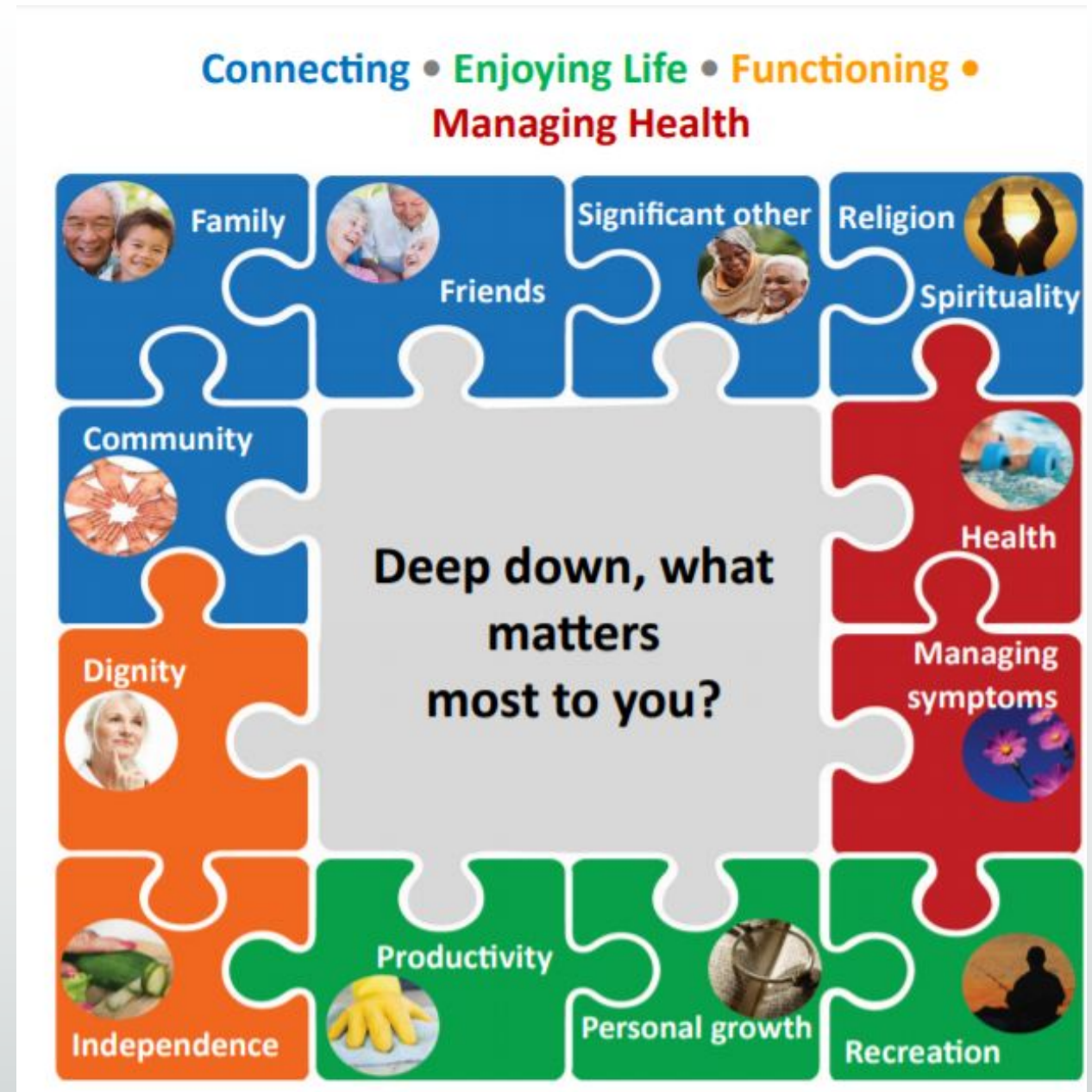
# Follow-up on Case Presentation



Betty Zane Patton

# What Matters to Older Adults?

*J Amer Geriatr Soc.* 2016 Mar;64(3):625-31 and <https://patientprioritiescare.org>



# Goals of This Presentation

- Define an age-friendly health system
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- Describe the role of leadership, education, research and quality improvement
- Elucidate outcomes for older adults

# Resources for Developing, Implementing, and Evaluating Age-Friendly Health Systems

- The John A. Hartford Foundation  
(<https://www.johnahartford.org/grants-strategy/current-strategies/age-friendly/age-friendly-health-systems-initiative>)
- The Institute for Healthcare Improvement  
(<https://www.ihl.org/Engage/Initiatives/Age-Friendly-Health-Systems/Pages/default.aspx>)
- The American Hospital Association  
(<https://www.aha.org/center/age-friendly-health-systems>)
- Catholic Health Association of the United States  
(<https://www.chausa.org/eldercare/creating-age-friendly-health-systems>)
- Patient Priority Care (<https://patientprioritiescare.org>)

# Age-Friendly Health Systems



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[richard.mark.allman@gmail.com](mailto:richard.mark.allman@gmail.com)