The University of Nebraska Medical Center

Pender Geriatric Assessment Clinic Evaluation

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Critical Issues in Geriatrics: The Annual NEBGEC Updates Conference
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• Kinman-Oldfield Family Foundation

I have no conflicts of interest to disclose.
Objectives

• Describe changes in the process of care resulting from a rural geriatric assessment clinic

• Identify how the “Big 5” of teamwork skills supports effective geriatric team care

• Examine the impact of a geriatric assessment clinic on a rural community
Background

• Define comprehensive geriatric assessment

• Why do we need to increase access to comprehensive geriatric assessment in rural areas?

• How did we evaluate the rural geriatric assessment clinic in Pender, NE?
Comprehensive Geriatric Assessment

- Interprofessional process for evaluating an older adult in the medical, cognitive, emotional, functional & social domains to optimize quality of life
  - Increase function
  - Decrease polypharmacy
  - Increase patient/family satisfaction
  - Focus on
    - Prevention & early detection
    - Preferences and Planning
    - Integration of care with local resources

- Not achievable in 15 minute office visit!

Why GACs in Rural Nebraska?

“The challenge of providing for the large numbers of elderly anticipated over the next quarter century is...a major crisis for health care and for society…”

AMA White Paper on Elderly Health

- Aging of population; concentration of elderly in rural areas
  - Poorer health status of rural elderly
  - Prevalence of multiple chronic health problems in elderly
- Decreased access of rural elderly to providers trained in geriatrics
Percent of Population 65 Years or Older in Nebraska Counties

Percent of Population 65 and Up

- 8.3% - 15.5%
- 15.51% - 19.9%
- 19.91% - 23.9%
- 23.91% - 28%

www.census.gov

Produced by: Department of Health Services Research and Administration, University of Nebraska Medical Center College of Public Health, 2010.
Cartography by: Nicole Vanosdel.
Pender Geriatric Assessment Clinic
Mixed Methods Evaluation of an Interdisciplinary Geriatric Assessment Clinic in Rural Nebraska

- NEBGEC Objective 3
- Completed by a team
  - Natalie Manley, MD, MPH
  - Katherine Jones, PT, PhD
  - Anne Skinner, RHIA
  - Carrol Baier, RN
  - Sally Hand
- Supported by a team
  - HRSA
  - Kinman-Oldfield Family Foundation
Mixed Methods: Quantitative + Qualitative

**Qualitative**
- Interviews (Patients/Family)
  - Purposive Sampling
  - 5 patients
  - 4 spouses
  - 5 adult children
- Focus Group (providers, hospital CEO, and administrative staff)
- Direct Observation

**Quantitative**
- Chart Review
- Surveys
  - Area Agency on Aging
  - Senior Center (members)
  - Peer Providers (4 MDs & 2 PAs)
Mr U and Family

N: What are your general thoughts about your experience with the Geriatric Clinic?
Dtr: I thought it was a great thing. It gave us a chance to hear the doctors. You know we had started with the testing with my dad because we were concerned that he had Alzheimer’s. So that is why we did the testing because we had some concerns there. It was nice to hear that. We said things to my dad before but it would be nice for him to hear it from a doctor and that our concerns were just not nagging him or different things like that and for him to really hear our concerns. It was definitely a help. We have seen a big change in him just being on the depression medication that he is on. He has totally turned around. He should have been on it a long time ago. He had been on something once and it was not the right dose it would make him sleepy and he just gave up on that and did not take his medication. I think he has realized the change it has made and that it is a good thing. He is more outgoing also and that was a good thing.
N: So when you say he has completely turned around in what ways has he completely turned around?
Dtr: He used to be really moody and quiet and just being more open and more outgoing. It was definitely good for him.
N: Have you noticed a change in your own family I mean among the relationship within your family since then?
Why Qualitative?

• Used to answer descriptive and exploratory questions
• The lived experience of patients and families provides a richer understanding of outcomes than numbers alone
• Enables development of theories that can be tested with subsequent quantitative studies
Theoretical Models as a Foundation

• Pronovost’s Strategy for Organizational change
  – Engage, Educate, Execute, Evaluate, Expand and Endure

• Salas’ Big 5 of Teamwork and Supporting Mechanisms
  – Team Leadership, Mutual Performance Monitoring, Back-up Behavior, Adaptability, Team Orientation
  – Shared Mental Model, Closed Loop Communication, Mutual Trust
Figure 1: Graphical Representation of High-Level Relationship Among the Big Five and the Coordinating Mechanisms Including Research Propositions
Objective One

Describe changes in the process of care resulting from a rural geriatric assessment clinic...

• Chart review results for 45 patients seen May 2008 – December 2009
  – Majority (62%) referred by family
  – Majority (82%) NOT hospitalized in past 6 months
  – Majority (51%) taking 6 or more prescription drugs
  – Presenting problems addressed represent typical geriatric syndromes
  – Health maintenance issues addressed
  – More medications started than stopped
### Demographics of Patients at Presentation to the GAC

<table>
<thead>
<tr>
<th>Variable</th>
<th>Number (%) n = 45</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age</td>
<td>80.58 (62-91)</td>
</tr>
<tr>
<td>Female Sex</td>
<td>30 (66.7)</td>
</tr>
<tr>
<td>Ethnicity</td>
<td></td>
</tr>
<tr>
<td>Caucasian</td>
<td>39 (86.7)</td>
</tr>
<tr>
<td>American Indian</td>
<td>3 (6.7)</td>
</tr>
<tr>
<td>Marital Status</td>
<td></td>
</tr>
<tr>
<td>Single, never married</td>
<td>3 (6.7)</td>
</tr>
<tr>
<td>Married</td>
<td>19 (42.2)</td>
</tr>
<tr>
<td>Widowed</td>
<td>23 (51.1)</td>
</tr>
<tr>
<td>Education</td>
<td></td>
</tr>
<tr>
<td>Grade 12</td>
<td>22 (48.9)</td>
</tr>
<tr>
<td>Post High School Education</td>
<td>12 (26.7)</td>
</tr>
<tr>
<td>Living Environment</td>
<td></td>
</tr>
<tr>
<td>Alone in home</td>
<td>12 (26.7)</td>
</tr>
<tr>
<td>In home with spouse</td>
<td>16 (35.6)</td>
</tr>
<tr>
<td>Referral Source</td>
<td></td>
</tr>
<tr>
<td>Physician</td>
<td>10 (22.2)</td>
</tr>
<tr>
<td>Family Member</td>
<td>28 (62.2)</td>
</tr>
<tr>
<td>Area Office of Aging</td>
<td>1 (2.2)</td>
</tr>
<tr>
<td>Health Status at Presentation</td>
<td>Number (%) n = 45</td>
</tr>
<tr>
<td>-------------------------------</td>
<td>------------------</td>
</tr>
<tr>
<td><strong>ER Visits in the previous 6 mo</strong></td>
<td></td>
</tr>
<tr>
<td>Zero</td>
<td>41 (91.1)</td>
</tr>
<tr>
<td>One</td>
<td>4 (8.9)</td>
</tr>
<tr>
<td><strong>Hospital Admissions in the previous 6 mo</strong></td>
<td></td>
</tr>
<tr>
<td>Zero</td>
<td>37 (82.2)</td>
</tr>
<tr>
<td>One</td>
<td>8 (17.8)</td>
</tr>
<tr>
<td><strong>Intact Activities of Daily Living (ADLs) (out of 30)</strong></td>
<td>26.3 ± 5.2 (13-30)</td>
</tr>
<tr>
<td><strong>Intact Instrumental ADLs (out of 30)</strong></td>
<td>21.2 ± 7.1 (8-30)</td>
</tr>
<tr>
<td><strong>Number of Prescriptions Drugs</strong></td>
<td></td>
</tr>
<tr>
<td>Zero</td>
<td>1 (2.2)</td>
</tr>
<tr>
<td>1-5</td>
<td>18 (40)</td>
</tr>
<tr>
<td>6-10</td>
<td>14 (31.2)</td>
</tr>
<tr>
<td>11-15</td>
<td>9 (19.9)</td>
</tr>
<tr>
<td><strong>Number of Non Prescription Drugs</strong></td>
<td></td>
</tr>
<tr>
<td>Zero</td>
<td>10 (22.2)</td>
</tr>
<tr>
<td>1</td>
<td>11 (24.4)</td>
</tr>
<tr>
<td>2</td>
<td>9 (20)</td>
</tr>
<tr>
<td>3-5</td>
<td>9 (20)</td>
</tr>
<tr>
<td><strong>Geriatric Syndromes</strong></td>
<td></td>
</tr>
<tr>
<td>Decreased Vision</td>
<td>42 (93.3)</td>
</tr>
<tr>
<td>Depression</td>
<td>29 (64.4)</td>
</tr>
<tr>
<td>Dementia</td>
<td>27 (60)</td>
</tr>
<tr>
<td>Difficulty Walking 1 Block</td>
<td>23 (51.1)</td>
</tr>
<tr>
<td>Decreased Hearing</td>
<td>23 (51.1)</td>
</tr>
</tbody>
</table>
Problems Addressed

- Durable Power Of Attorney for Health Care.......100%
- Code Status .............96%
- Other common problems addressed
  - Vision and Hearing
  - Dementia
  - Depression
  - Walking
  - Medication management
  - Caregiver burden

- Process reflects domains of geriatric assessment and geriatric syndromes
  - Medical
  - Cognitive
  - Emotional
  - Functional
  - Social
Average # meds started per patient = 3.9

Average # meds stopped per patient = 1.04
<table>
<thead>
<tr>
<th>Variable</th>
<th>Male</th>
<th>Female</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Colonoscopy reminder</strong></td>
<td>10 (66.7)</td>
<td>17 (56.7)</td>
</tr>
<tr>
<td><strong>Colonoscopy stop</strong></td>
<td>4 (33.3)</td>
<td>13 (43.3)</td>
</tr>
<tr>
<td><strong>Dexa Reminder</strong></td>
<td>5 (33.3)</td>
<td>23 (76.7)</td>
</tr>
<tr>
<td><strong>Dexa Stop</strong></td>
<td>2 (13.3)</td>
<td>7 (23.3)</td>
</tr>
<tr>
<td><strong>Dexa not addressed</strong></td>
<td>8 (53.3)</td>
<td>0 (0)</td>
</tr>
<tr>
<td><strong>Calcium and Vitamin D reminder</strong></td>
<td>7 (46.7)</td>
<td>26 (86.7)</td>
</tr>
<tr>
<td><strong>Calcium and D stop</strong></td>
<td>1 (6.7)</td>
<td>0 (0)</td>
</tr>
<tr>
<td><strong>Calcium and D not addressed</strong></td>
<td>7 (46.7)</td>
<td>4 (13.3)</td>
</tr>
<tr>
<td><strong>Bisphosphonate Reminder</strong></td>
<td>0 (0)</td>
<td>7 (23.3)</td>
</tr>
<tr>
<td><strong>Bisphosphonate stop</strong></td>
<td>0 (0)</td>
<td>2 (6.7)</td>
</tr>
<tr>
<td><strong>Bisphosphonate not addressed</strong></td>
<td>15 (100)</td>
<td>20 (66.7)</td>
</tr>
<tr>
<td><strong>Breast Cancer Screening reminder</strong></td>
<td></td>
<td>20 (66.7)</td>
</tr>
<tr>
<td><strong>Breast Cancer Screening stop</strong></td>
<td></td>
<td>10 (33.3)</td>
</tr>
<tr>
<td><strong>Prostate screening reminder</strong></td>
<td>11 (73.3)</td>
<td></td>
</tr>
<tr>
<td><strong>Prostate Screening stop</strong></td>
<td>3 (20)</td>
<td></td>
</tr>
<tr>
<td><strong>Prostate Screening not addressed</strong></td>
<td>1 (6.7)</td>
<td></td>
</tr>
<tr>
<td><strong>Influenza Vaccine reminder</strong></td>
<td>15 (100)</td>
<td>28 (93.3)</td>
</tr>
<tr>
<td><strong>Influenza Vaccine not addressed</strong></td>
<td>0</td>
<td>1 (3.3)</td>
</tr>
<tr>
<td><strong>Pneumovax reminder</strong></td>
<td>15 (100)</td>
<td>29 (96.7)</td>
</tr>
<tr>
<td><strong>Zostavax Reminder</strong></td>
<td>0</td>
<td>1 (3.3)</td>
</tr>
<tr>
<td><strong>Zostavax Not Addressed</strong></td>
<td>15 (100)</td>
<td>28 (93.3)</td>
</tr>
<tr>
<td><strong>Tetanus Reminder</strong></td>
<td>15 (100)</td>
<td>28 (93.3)</td>
</tr>
</tbody>
</table>
Objective Two

Identify how the “Big 5” of teamwork skills supports effective geriatric team care (are essential tools)

• Interviews (Patients/Family)
  – Purposive Sampling
  – 5 patients
  – 4 spouses
  – 5 adult children

• Focus Group with (providers, hospital CEO, and administrative staff)
Teamwork in GACs

Complementary skills
Interdependent tasks
Clear role expectations

Common purpose
Performance goals
Mutual accountability
Role of Teamwork in GACs

• Only a team can...
  – Evaluate and plan across medical, psychological, functional & social domains to optimize quality of life
  – Have extensive knowledge of aging process
  – Provide proactive, longitudinal care
  – Coordinate care and link to community resources
  – Use communication skills to elicit and integrate patient’s values, goals, preferences into care plan
  – Ensure safe, continuous care across settings

Provider Themes Coded ≥ 10%...reveal impact of teamwork skills
Provider1: “I think they [get an understanding of all of the issues facing them]...especially when we are talking about change in living status...We want to try to keep them in their homes as long as we can, as safely as we can. Family input does help to get those things out in the forefront and then they start to realize that they do need to make some changes and that mom or dad really need this or that.”
Themes: Shared Mental Model, Communication, Team Members, Clarity, Team Orientation,

Provider2: “We all pretty much have the same goals ... a lot of times we all kind of catch the same drifts at the same time...I know it sounds impossible, but really it does happen.”

Provider1: “I do not think anyone is too proud—that they need control. If they hear one of the other [team] members say, ‘well maybe this would be a good idea,’ if that is different than what I came up with, no one is going to say, ‘well no, it's my way or the highway’.”
Provider1: “I probably need to do a better job [following up with referring physicians and] actually call them before they get the assessment and let them know that we saw the patient and that they will be getting it. We usually always fax or mail [the assessment results] right away as soon as I sign off on it so they have all the information. But, Sometimes it is nice to just pick up the phone and call to let them know what your initial thinking is on that patient.”
Patient/Caregiver Themes Coded ≥ 10%
Patient/Caregiver Themes

Caregiver: “I knew they had tested him for Alzheimer’s and dementia... [I thought, ]‘Am I going to have to go home and really pull myself together...or is this something we can work out?’ Then when I got into [the family meeting]...they had not completely confirmed the Parkinson’s, but they said it was a pretty sure thing. I thought, ‘ok, this [is something] we can live with.’ So, then I was more calm.”

Themes: Caregiver, Communication, Process, Clarity

Caregiver: “I have never heard a doctor tell her to take more Vitamin D and Calcium, they never talk about that. Provider1 ... told her to take more; that this was going to help her.”

Caregiver: “We could get the whole picture...What should we do with our family member? Do we want to keep them at home? Should we take them to live with someone? How it is all going to work? At least families are able to ask those questions.”

http://www.lifeworksnw.org/Portals/0/images/older-adults.png
Patient/Family vs. Provider Focus Group

- Caregiver
- Evaluate
- Mental
- Communication
- Process
- Clarity
- Social
- Outcomes
- Geriatric KSA (knowledge)
- Accepting change
- Dignity
- Support
- Medical
- Physical
- Functional
- Complexity

* Represents significant differences between family/caregiver and focus group perspectives.
Effective teamwork enables clarity in problem identification and planning

“One of our patients really summed it up for me, that this was just a defining moment...She sat while [we were] doing the recommendations and her family was there and we brought up a lot of issues that were problems for her that she could not talk about to them... She could not say, ‘I need help with this or I am having these kind of problems.’ She said, ‘I am so glad we are able to talk about this and bring it out in the open’.”
Effective teamwork enables clarity in problem identification and planning

Interviewer: “What did you like about [the team approach]?”
Male Patient: “They (GAC team) are all sitting there, and they can talk amongst themselves [about] what should be done. Otherwise, if you go see one and then wait an hour and go see another one, then you don’t know what is getting communicated and what is not.”
Objective Three

Examine the impact of a geriatric assessment clinic on a rural community

Clarity in problem identification and planning achieve goal of geriatric assessment... improved quality of life
Objective Three
Examine the impact of a geriatric assessment clinic on a rural community

Family Member: “It sure helped us. ....what should we do with our family member? Do we want to keep them at home? Should we take them to live with someone? How it is all going to work? At least families are able to ask those questions. Find out resources—I think Provider1 has been one of the only ones that has shown an interest to do that.

Objective Three
Examine the impact of a geriatric assessment clinic on a rural community

“It’s amazing how someone comes in and they’re a mess in the morning and in the afternoon or by the follow-up they have this figured out in their head. Where do I live, their meds and all that stuff. It is all straightened out.”
Objective Three

Examine the impact of a geriatric assessment clinic on a rural community

Caregiver: “She (LMHP) enlightened us about things that we could [do]...nursing home, getting their money and financial situations in order because you never know....We handled a lot of family financial things—a Power-of-Attorney medically and financially; put money in a trust. You know, that kind of stuff.”

http://www.homehelpersnyc.com/
Summary

What are the essential structures and processes needed to evaluate complex geriatric patients in a rural community?

✓ Team Members
✓ Evidence-based processes of comprehensive geriatric assessment
✓ Value the “Big Five” of teamwork as a means to achieve comprehensive geriatric assessment
✓ Support from administration and peers
Team structure is essential

Provider1: “You do need to have somebody that is willing to look for the key players to implement the ideas as you cannot do it on your own.”

Provider4: “There are no major egos here. We're all just there to help.”
Support from administration and peers is essential

CEO: “Honestly, financially it is not going to be a huge money maker—but I do not think that is what is important. There are a lot of services that we provide because they provide tremendous benefits [to the patients and families].”

Peer Physician: “...following very thorough evaluation [at the GAC and] many changes in care implemented—[the patient] has been more active, more up-beat, and repeat visits have been decreased.”
Previous Tools

What are the essential structures and processes needed to evaluate complex geriatric patients in a rural community?

Evidence-based processes of care... tools summarized by Dr. Timm last year; tool kit available at http://www.unmc.edu/intmed/geriatrics/nebgec/index.cfm?conref=46

- GAC Pre-Visit Questionnaire
- Berg Balance Scale
- Geriatric Depression Scale
- Mini Mental State Exam
- Montreal Cognitive Assessment
- Physician Orders
- Physician Physical Assessment
New Tools

• General Screening Recommendations for Chronic Disease and Risk Factors in Older Adults
  – From The Hartford Institute for Geriatric Nursing
  – American Geriatrics Society: health screening decisions for older adults should be individualized and based on the patient’s life expectancy, preferences, plan for what the patient may or may not want to do further if screening had positive findings as well as degree of burden to the patient.

New Tools

• Multidisciplinary Competencies in the Care of Older Adults at the Completion of the Entry-level Health Professional Degree
  – From The Partnership for Health in Aging; convened by AGS in 2008
  – 23 geriatrics core competencies that all healthcare providers should have to better care for elderly patients

New Tools

• Teamwork Attitudes Questionnaire
  – T-TAQ assesses attitudes toward the core components of teamwork

• Developed as part of Agency for Healthcare Research and Quality’s National Implementation of TeamSTEPPS

• Complete instructions available at http://teamstepps.ahrq.gov/abouttoolsmaterials.htm
Other Findings…

- Extended Family and referring physician need to be included as integral members of the team
- Need to follow-up with patients/families 6 mo - 1 yr after assessment to evaluate outcomes
- Community resources for older adults not well known
- Stigma associated with clinic name
Policy Issues

• CMS does not reimburse for
  – Family counseling in absence of the patient
  – Record Review
  – Outpatient nutrition assessment in Critical Access Hospital setting

• Need for more providers with minimal competencies in geriatrics

• Healthcare reform addresses geriatric issues

http://www.americangeriatrics.org/advocacy_public_policy/health_care_reform/
Future Research

• Role of adult children in GAC... If adult children are not involved in the GAC process, then recommendations are less likely to be carried out.

• Role of onsite pharmacist...If an onsite pharmacist specialized in geriatrics is not available, then fewer medications will be stopped.
Questions?