Anticipating an Aging Alberta
Where Should We Focus?
October 2, 2014

Seniors Health Strategic Clinical Network

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Ogden Nash 1902–1971

Crossing the Border

“Senescence begins and middle age ends the day your descendents outnumber your friends.”
Overview

In this presentation we will:

- Begin with an overview of aging and the principles of good medical and social care for older people,
- Introduce the Seniors Health Strategic Clinical Network (SH SCN),
- Outline the three priority areas for the SH SCN, while spending time outlining the considerations associated with dementia,
- Conclude with an overview of factors Alberta needs to consider when “Anticipating an Older Alberta”,
- Leave time for questions.
Components of the Aging Process
– from a focused biomedical perspective

- Diseases – potentially biological aging – at present progressive, irreversible, deleterious and possible open to strategies to prevent or to delay onset.

- Initially preventable or may be delayed, or modifiable by treatment or rehabilitation.

- Disuse and Deconditioning – Potentially preventable, treatable and reversible.
Contributions to the Aging Experience
– a broader Gerontological perspective

- Personality, cultural and cohort variables
- Biological age–associated changes
- Genetic variables and early development
- Cognitive and psychological variables
- Co–morbidity and frailty
- Age–associated diseases
- Social roles, expectations & social support
- Environment, diet and exercise, lifestyle
1966
Watershed year for Aging in Canada

- First Canadian Conference on Aging
  January 1966 Toronto

- Senate Report on Aging (Croll Report)
  followed by GIS 1967

- Bill C–227 Medical Care Act 1966 Passed
  December 1966 – “Medicare” Implemented July 1 1968

and......
Half the Canadian population aged 25 and under
Great-grandparents of “Geriatrics”
The principles of good medical and social care for older people are:

- Involvement of older people in the management choices of their & decisions on future care;
- To promote good health in late life;
- The prevention of illness;
- Reduction of disability;
- To support older people in their own homes;
- Preservation of dignity, autonomy and respect;

*British Geriatric Society, 2007*
Access to health services
Health promotion and illness prevention in the care of older persons
Particular needs of frail elderly persons
The health care team
Effective planning for geriatric services
Serving people in all regions of Canada
Ethical issues in the care of older persons
Legal issues in the care of older persons
Education in the care of older persons
Research in the care of older persons

http://www.cmaj.ca/content/162/13/1871.full
Seniors Health SCN

- Launched June 2012
- Core Committee (40 members)
- 4 Working Groups
- 300+ Community of Practice Members
- 80+ Researcher Network

Seniors Health SCN Leadership Team

Lynne Mansell, Senior Provincial Director
Duncan Robertson, Senior Medical Director
Heather Hanson, Assistant Scientific Director
Jayna Holroyd Leduc, Scientific Director
Mollie Cole, Manager
Dennis Cleaver, Executive Director
Alberta SCNs – April 2014

1) Diabetes, Obesity and Nutrition
2) Seniors Health
3) Bone & Joint Health
4) Cardiovascular Health and Stroke
5) Cancer
6) Addiction & Mental Health
7) Emergency
8) Critical Care
9) Surgery
10) Respiratory

SCNs Under Consideration for 2014:
11. Primary Care & Chronic Disease
12. Maternal, Child, Newborn & Youth Health
13. Kidney
14. Diagnostics (Imaging/Lab Medicine)
15. Gastrointestinal
16. Neuroscience, Vision, ENT
Mission: To make improvements to health care services and practices that enable Alberta’s seniors to optimize their health, well-being, and independence.

Platforms:

1) Healthy Aging and Seniors Care
2) Aging Brain Care
3) Anticipating an Aging Alberta

Pillars:

- Research and Innovation
- Engagement
- Communication
- Quality Improvement and Measurement
Seniors Health Strategic Clinical Network

2014-2017 Transformational Roadmap

Version 1.4
April 2, 2014

http://www.albertahealthservices.ca/7702.asp
1) Healthy Aging and Seniors Care

- Preventing, anticipating, optimizing and living with conditions that compromise health and functional abilities in later life.

- Minimize the impact of frailty, illness and disability on independence and quality of life:
  - falls prevention
  - delirium prevention
  - co-morbid depression
  - “elder friendly care” – acute care (e.g. Comfort Rounds)

- Resilience in seniors
Elder Friendly Care Strategies

- Delirium Prevention, Detection & Management
- Preventing Functional Decline (through mobility)
- Continence Management (reduced use of catheters)
- Nutrition & Hydration
- Comfort Rounds (being evaluated in Calgary Zone)
  - Scheduled nursing rounds at least q2h to improve inpatient care safety and quality
  - Includes communication, toileting, positioning, nutrition, hydration, & pain management
Why Elder Friendly Care?

- AHS/AH Priority – HQCA Ministerial Directive to reduce ALC days and occupancy in hospitals; Destination Home
- Builds on successful delirium screening component of Bone & Joint Hip Fracture Pathway
- Builds on Zone priorities:
  - **Calgary Zone**: Elder Friendly Care Project in hospitals already underway; Destination Home in Home Care
  - **Central Zone**: priority on improving elder care in Red Deer Regional Hospital
  - **Edmonton Zone**: alignment with Care Transformation Project in acute care hospitals
Elder Friendly Care – Appropriate Use of Catheters

What is the problem?

- Unnecessary use of catheters leads to high infection rates, antimicrobial resistance, immobility, delirium, falls, longer LOS and poor patient experience

- Risk is highest for seniors in emergency and inpatient units, especially those with dementia
2) Aging Brain Care (ABC)

- Preventing, anticipating, and living with conditions common in later life that result in cognitive changes
- Provincial framework and strategy for dementia
- Public education
- Dementia care in the community
- Assessment of technology
- Evidence-informed care pathway: health promotion to end of life care
  - evidence based modules
  - guidelines
  - protocols
  - for use by caregivers, seniors and health care providers
Exhibit 17
Current & Future Dementia Prevalence in Alberta, Total Population by Sex: 2008-2038

Prevalence of Dementia by Sex 2008 to 2038

Number of Canadians Living With Dementia

0 20,000 40,000 60,000 80,000 100,000 120,000

Year

2008 2010 2015 2020 2025 2030 2035 2040

Graph showing the prevalence of dementia by sex from 2008 to 2038, with separate lines for males, females, and the total population.
Memory Function: 101

- **Attention**: a prerequisite to memory
  - (focused, sustained, selective, alternating, divided)

- **Steps in memory**
  1. **Registration** (encoding): receiving, processing, linking
  2. **Storage**
  3. **Retrieval** (recall-free or cued)

- **Factors adversely affecting memory function**:
  - Delirium, Drugs, Alcohol, Fatigue, Sleep deprivation, Stress, Anxiety, Depression, Preoccupation
Expected Progression of Dementia

**Early stage**
- Memory loss
- Language difficulties
- Irritable
- Withdrawn
- Abusive language
- Mood swings

**Middle stage**
- Getting lost
- Delusions
- Hallucinations
- Agitation
- Aggression
- Anxiety
- Depression
- May hurt self or others

**Late stage**
- Lose speech
- Moving difficult
- Incontinent
- Swallowing issues
- Need help with all care
1. **Dementia is much more than poor memory.** To diagnose dementia you need to find evidence of aphasia, apraxia, agnosia or executive dysfunction, personality or behaviors and that the changes in cognition are sufficient to interfere with everyday activities.

2. **Very few people who come to a clinic or hospital alone complaining of memory problems have dementia.** Some have age associated memory changes (**AAMI**), depression, drug or alcohol related memory changes or mild cognitive impairment (**MCI**). When brought by family member unwillingly or miss appointments the probability of dementia is higher!

3. **MCI is defined as subjective and objective memory deficits without significant aphasia, apraxia, agnosia or executive dysfunction.** MCI may progress to dementia at a rate of 8–15% p.a. and some revert. MCI patients may not be functionally limiting if patients are appropriately supported. **MCI patients may succumb to other diseases before developing dementia.**
10 facts we all need to know about Dementia in Old Age (4–7)

4. Patients with Dementia and MCI, as well as others with neurodegenerative conditions are at high risk of developing delirium when they are sick, injured, post-operative and exposed to many drugs particularly anticholinergics and those on the Beer’s list.

5. Alzheimer’s Disease and mixed AD and Vascular dementia are the most common in older persons accounting for 50–70% of cases. Next in frequency DLB (Lewy-Body), PD (Parkinson’s Dementia) and FTD or FTLD (Fronto-Temporal Lobar Dementia– previously Pick’s Disease). NPH and HD are infrequent.

6. Most AD is sporadic. Between 5–10% of AD is familial. Even monozygotic twins are not 100% concordant. Having a close family member with dementia increases risk of developing AD.

7. There is no evidence that early treatment of patients with MCI with anti-dementia drugs will delay progression to dementia. Investigations to rule out potentially correctable and contributory causes of memory loss are indicated and treatment of vascular risk factors may delay or prevent progression in both AD and VaD.
10 facts we all need to know about Dementia in Old Age (8–10)

8. Other risk factors for Dementia include age, low level of formal education, vascular risk factors and head injury. Physical activity may be protective.

9. While not “normal aging” (dementia prevalence increases with age) <65<1%: 65 and over 8%: over 85–25–35%

10. Currently there is no drug to prevent, or reverse dementia. Current drugs may help some patients, with some symptoms for some time and are worth a trial if there are no contraindications. There are many treatments under investigation that influence beta amyloid and Tau protein metabolism, nerve growth factors and CNS inflammation.
On-Line Screening for Cognitive Changes

- **COGNIGRAM™** allows for regular and standardised testing of cognitive function to assist physicians to detect even subtle change that could signify the early stage of dementia. Patients are sent to a local testing centre with a COGNIGRAM™ referral from a physician. The testing centre provides a favorable environment to the patient. COGNIGRAM aims to establish an extensive network of registered Testing Centres to offer maximum patient access. – Developed in Australia, wholly owned by Merck. Testing sites being developed.
  
  [https://www.cognigram.com/](https://www.cognigram.com/)

- **Cogniciti™** Wondering "Is my memory normal or should I see my doctor?"
  A cognitive screening tool for home use by the age group with the greatest level of memory concerns: adults ages 50 to 79. It is not a diagnostic tool. Rather, it is an online direct-to-adult assessment aimed to assist test takers with memory concerns in deciding the right time to book a check up with their family physician.
  
  **Computer based testing developed in Canada 2014 by Baycrest, Toronto and MaRS**
  
  (* Our mission is to use our expertise to bring brain health solutions to people, businesses, and governments around the globe. *)
  
  [https://www.cogniciti.com/](https://www.cogniciti.com/)
Position of the Alzheimer Society of Canada:

Online self-assessments for Alzheimer’s disease and other dementias

May 26 2014

- People who are experiencing memory issues accompanied by difficulties in day-to-day activities and skills should contact their health-care provider.

- Alzheimer’s disease and other dementias are complex diseases of the brain and qualified health care providers should be involved in diagnosing these conditions.

- Online self-assessments of cognitive health are possibly useful for the screening of Alzheimer’s disease and other dementias and may pose risks to users unless completed following the advice of a health provider to do so.

- Scientists have raised ethical concerns with most online self-assessments for the diagnosis or screening of Alzheimer’s disease and other dementias, such as potential issues around the privacy and confidentiality of the information collected.

- The Alzheimer Society provides information, education and support to help people with dementia and their families live as well as possible.

www.alzheimer.ca and www.earlydiagnosis.ca
Dementia ABCs

*It’s More Than Memory!

- **A**DL (BADL, IADL, AADL)
- **B**ehaviour (BPSD)
- **C**ognition (memory, praxis, language, etc)
- **D**epression
- **E**ffect on Caregiver
“modules” on the Dementia Clinical Pathway

Evidence-based practice used by clinicians, seniors
3) Anticipating an Aging Alberta

- Address opportunities and challenges posed by Alberta’s demographic changes

- Influencing and informing health policies developed by:
  - Government of Alberta
  - Alberta Health Services
  - municipalities
  - professional groups
  - community organizations

- Partnering with educational institutions
Anticipating an Aging Alberta – Where Should we Focus?
Examples of social issues to be addressed when considering AAA:

- Ageism includes prejudicial attitudes toward older people, old age, and the aging process.

- Older Albertans in the workforce.

- More older Albertans will be driving.

- Supporting healthy lifestyles: diet / exercise
Future/current issues when anticipating an Aging Alberta

- Age Friendly Communities…how are communities going to prepare?
- Healthy aging. Can it reduce health care costs?
- Future taxpayers willingness to pay, intergenerational issues.
- World aging. Medical tourism of frail elders?
Future/current issues when anticipating an Aging Alberta
(continued)

- Elder Friendly Care...how are care services going to prepare?
- Widespread application of Geriatric principles across system.
- Primary care “medical home” and support from SGS.
- Team-based care; expanded roles of non MD practitioners
- Home based care and hospital avoidance
- ACP/PEOLC/PAD
Future/current issues when anticipating an Aging Alberta
(continued)

- Differential access to specialized services (urban/rural)
- Where should researchers focus?
- Who will be the future caregivers when there are so many older Albertans?
- What are the workforce planning issues? Availability of care-givers – family, professional and clinicians.
- Impacts on housing development?
Would you like to become involved in our work?
Join our Community of Interest

- Receiving bulletins and newsletters and notifications of teleconferences and webinars
- Respond to requests for input on key issues
- Active participation on working groups and committees
- Whatever you choose, we are always open to hearing your experiences, ideas and suggestions.

If you would like to be added to the group, please let Dennis Cleaver know to add your name.
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THE QUESTIONS