Enhancing Communication for Individuals with Dementia

JB Orange, PhD, Reg. CASLPO, SLP(C)
Professor
School of Communication Sciences and Disorders
International Consortium for Communication, Aging &
Neurodegeneration Lab

Scientific Director
Canadian Centre for Activity and Aging

Associate Scientist
Lawson Health Research Institute

T 519-661-2111 X 88921
F 519-661-3894
JBOrange@UWO.ca
http://www.uwo.ca/fhs/bio/profile/orange_j.html





Aging, Rehabilitation & Geriatric Care

Disclosure

- 1. I do not hold currently and have not held in the past a financial interest, financial arrangement or financial affiliation with the Alzheimer Society of London and Middlesex that could be perceived as a direct or indirect conflict of interest in the content of today's program.
- 2. I do not have an affiliation (financial or otherwise) with a pharmaceutical, medical device or communications organization (e.g., media outlets, publishing company, etc.).
- 3. I confirm that my presentation and any recommendations are balanced and reflects the current scientific literature.

Disclosure

- 4. I hold currently the following grants:
 - a. SSHRC-PEG: HAroLD and social participation
 - b. OBI-ONDRI: Multidimensional analyses of dementias
 - c. CCNA: Multidimensional analyses of dementias
 - d. CCABHI-SPARK: HAroLD and modifiable risk factors for dementia
 - e. Employment Skills Development Canada Be EPIC: Communication education and training of PSWs in person-centred care of persons living with dementia

Outline

- Complexity of human communication
- Dementia and communication
- 3. Importance of communication to caregivers
- 4. Strategies to enhance communication
 - a. Individualized
 - b. What is your agenda or purpose?
 - c. Optimize residual skills
 - d. Levels of success

Speech

(production and perception)

- Medium of oral communication that employs a linguistic code
- Communication through vocal symbols (i.e., sounds)
- Complex, dynamic neuromuscular processes
 - > Articulation
 - Resonance
 - Phonation
 - Respiration
 - Prosody (e.g., pitch, speech rate, stress, etc.)

Language

- A shared set of mutually agreed upon symbols used to represent concepts or ideas
- Symbols governed by set of rules:
 - Phonology/Phonotactics (sound positions and combinations)
 - Grammar (The boy randed to the store.)
 - Syntax (to store the boy the ran)
 - Semantics (define "car")
 - Pragmatics (multiple interpretations of words, phrases, clauses, or sentences - contextual influence, e.g., "run", "cold shoulder")

Communication

- Exchange of concepts or ideas between two or more entities
 - > Dynamic role exchange between speaker and listener
- Mechanism whereby we establish, maintain and change relationships
- Consists of multiple forms
 - Socially motivated and mediated = interactional
 - Agenda driven = transactional (e.g., ordering food in a restaurant)

Speech, Language, Hearing and Communication

Output/Expression

Input/Understanding

- Spoken
- Written
- Nonverbal (e.g., gaze, facial expression, posture, proximity, touch, gestures, pantomime, finger spelling, sign language, etc.)

- Auditory (listening) comprehension
- Reading (seeing) comprehension
- Nonverbal
- Senses of smell, touch and taste

Cognition

- Mental processes where sensory information is transformed, reduced, elaborated, stored, recovered and used
- Processes of gaining knowledge, organizing information (new or old), and using what has been learned
- Includes, but is not limited to:
 - Memory systems and processes
 - Attention systems and processes
 - Judgment
 - Reasoning decision making
 - Insightfulness
 - Other systems and processes

All-Cause Dementia – NIA and AA (McKhann et al., 2011)

Revised version of NINCDS-ADRDA (McKhann, et al. 1984; Sensitivity 81%, Specificity 70%)

Cognitive or behavioural (neuropsychiatric) symptoms that:

- 1. Interfere with ability to function at work or usual activities
- 2. Represent a decline from previous levels of functioning and performing
- 3. Are not explained by delirium or major psychiatric disorder
- 4. Cognitive impairment detected and diagnosed through:
 - a. Hx from client and knowledgeable informant
 - Objective cognitive assessment (mental status or neuropsychological testing)

All-Cause Dementia – NIA and AA (McKhann et al., 2011)

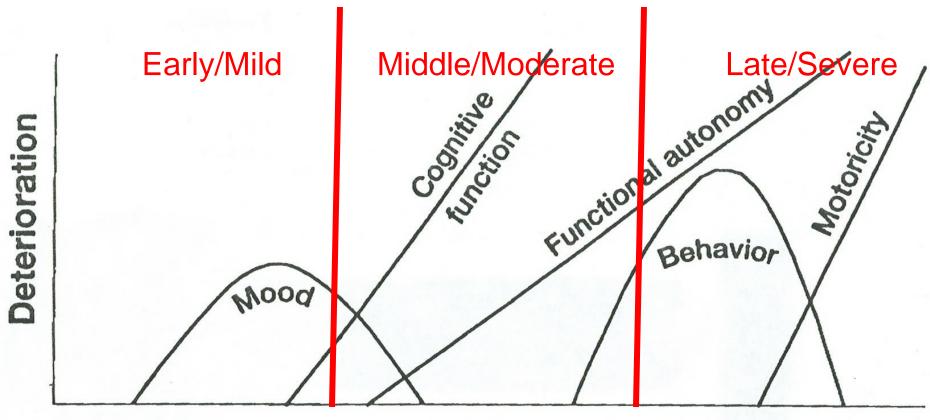
- 5. Cognitive or behavioural impairment involves a minimum of two of the following:
 - a. Impaired ability to acquire and to remember new information (e.g., repetitive questions or conversations, misplacing personal items, forgetting events or appointments, etc.)
 - b. Impaired reasoning and handling of complex tasks (e.g., poor understanding of safety risks, poor-decision making, inability to manage finances, etc.)
 - Impaired visuospatial abilities (i.e., agnosia and apraxia) (e.g., inability to recognize faces, common objects, or environment; inability to operate simple implements or orient clothing to body
 - d. Impaired language functions (e.g., speaking, reading, writing difficulty thinking of common words while speaking, hesitations; speech, spelling and writing errors)
 - e. Changes in personality, behaviour or comportment (e.g., uncharacteristic mood fluctuations agitation, impaired motivation and initiative, apathy, loss of drive, social withdrawal, decreased interest in previous activities, loss of empathy, compulsive or obsessive behaviours, socially unacceptable behaviours)

Dementia – DSM-5 (2013)

- Categorized as <u>major</u> or <u>minor</u> neurocognitive disorders (NCDs)
- NCDs exist on a spectrum of cognitive and functional impairment
- Subtypes distinguished based on combination of:
 - Time course, domains affected and associated symptoms

Diagnostic Criteria

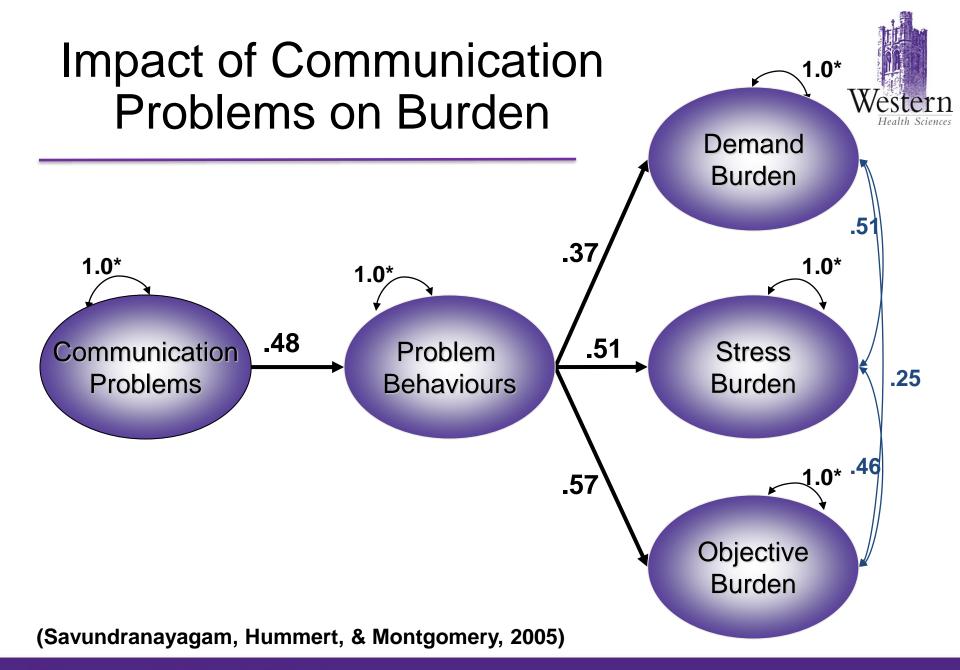
- A. Significant cognitive decline from previous ability in one (or more) cognitive domains
 - 1. Complex attention
 - 2. Executive function
 - 3. Learning and memory
 - 4. Language
 - 5. Perceptual-motor
 - 6. Social cognition



Progression of Alzheimer's disease

Figure 1. The intensity of symptoms in various domains throughout the progression of AD. Reprinted from: Clinical Diagnosis and Management of AD". Editor, Serge Gauthier.

(Gauthier, Thal & Rossor. In S. Gauthier, ed., 1996, p. 360)



Reducing Responsive Behaviours

- Challenging behaviours often the result of the inability to communicate effectively (Burgio, Allen-Burge, Roth, Bourgeois, Dijkstra, et. al, 2000)
- Document problem behaviours and the situations surrounding them; what are the triggers? (Teri & Logsdon, 2000)
- Educating and training caregivers strategies to deal with these behaviours combined the use of memory aids reduces caregiver burden and problem behaviours (Burgio et. al, 2000)

Spouses' Perceptions

"Sometimes I find it difficult when he is home that he sits there not talking. I have to do the talking, but it's like to the wall. I don't get anything back" (Small, Geldart, & Gutman, 2000, p. 297).

"He is not the man he once was. You lose your husband. When I come home now, full of stories, I don't tell them. It takes such a long time to explain. His language is seriously affected, understanding as well as saying things" (Murray, Schneider, Banerjee, & Mann, 1999, p. 664).

Spouses' Perceptions (Cont'd)

"I cannot confide in him anymore. It upsets him, and he couldn't understand. We talk about simple things — what to wear, what day it is, what time it is. I have been exhausted by his repeated questions" (Wright, 1993, p. 49)

"I cannot have a conversation with him. He cannot understand me and gets angry" (Murray et al., 1999, p. 664)

Parent-Child Relationships

In other words, we never had anybody to talk to anymore ... He was there physically, but he wasn't there ... He didn't recognize who I was, I sort of lost that thing, the father-son relationship, and it was hard. (Parsons, 1997, p. 398)

It had to curtail my social life, things I wanted to do. It's almost better if a person were dead because it is final. (Parsons, 1997, p. 398)

SLP as Spouse

Based on my years of listening to (his) (sic) speech and language, I have concluded that effective conversation is not predictable. It meanders, going from topic to topic and containing an element of surprise. (SLP and Family caregiver - Neustadt, 2001, p. 6)

Goals of Communication Enhancement for Individuals with Dementia and their Caregivers

- 1. Optimize communication
 - a. Information transfer (e.g., safety, ADLs, IADLS)
 - b. Relationships
- Optimize quality of life well-being
 - a. Persons with dementia
 - b. Families
 - c. Caregivers
- 3. Minimize responsive behaviours

Communication Enhancement Considerations – Education and Training Programs

1. What is your agenda (i.e., purpose)?

- a. Why are you communicating?
- b. Why do you want to communicate with the person?
 - i. Social connectedness, personhood and dignity
 - ii. Task or activity driven

Consider multiple options

Strategies may work well then not work well later – heterogeneity

Communication Enhancement Considerations (Cont'd)

- 3. Partnership (speaker and listener; alternating roles)
- Be an active listener
- Know strengths and limitations of yourself and your partner
- 6. Optimize existing skills
- Raise your awareness of <u>how</u>, <u>what</u>, <u>where</u> and <u>when</u> you communicate

Communication Enhancement Considerations (Cont'd)

- Not a 'cookbook-recipe approach'
- 9. Need to become a problem solver



- Most strategies emphasize enhancing the 'self', personhood and quality of life
- 11. Focus on the person, not the disease
- 12. Do not turn communication into a test

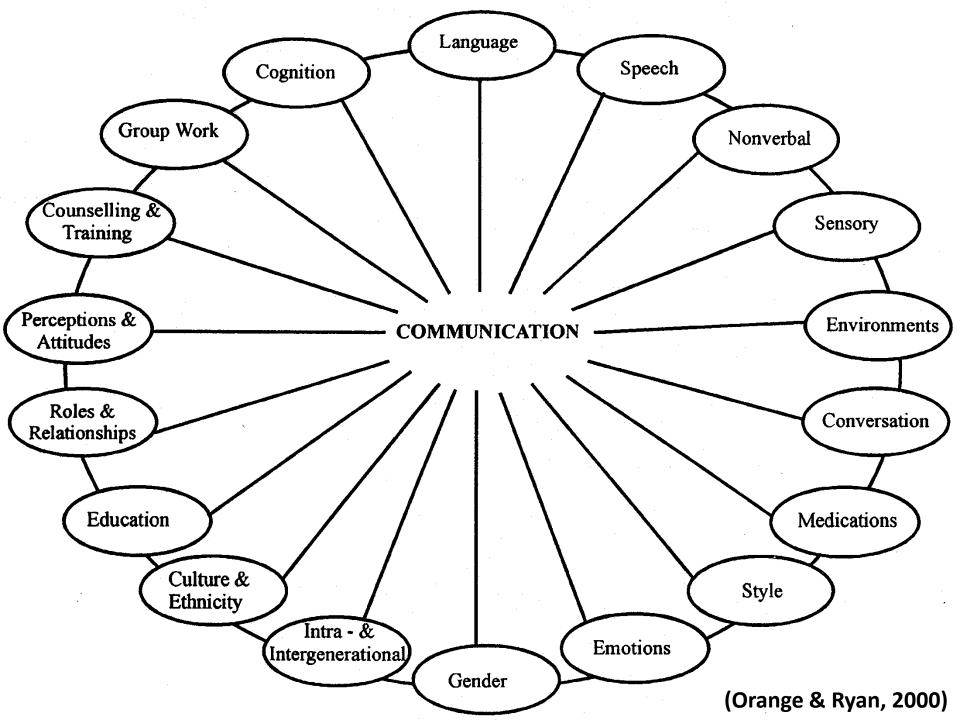
The 'Self' and Personhood

Sabat's (2001) Concept of 'Self"

- 1. The self of personal identity "I", "Me", 'My", "Mine", etc. used by persons with dementia
- 2. Self attributes descriptions of past and present characteristics, beliefs, abilities, and talents
- 3. Self as public personae profile of self in society
 - profession, volunteer, public figure, award winner, etc.

Kitwood's (1997) Positive Care Interactions – Personhood

- Recognition person known by unique characteristics or name(s)
- Negotiation person is consulted about preferences, choices, and needs
- Validation acceptance of reality, and acknowledging feelings, connectedness and person
- 4. Collaboration align with the person with dementia to engage together in tasks; work together to achieve goals
- 5. Facilitation enable person to accomplish what he/she would otherwise be unable to do by providing missing parts of intended actions



Indirect Interventions – Selected Examples

Computer Technology

- Prospective Memory Aids
- Augmenting Short-Term Memory to Support Conversation
- Life History Videos
- > Robots
- A House as a Cognitive Orthotic
- Virtual Reality Technology

- Music and music Rx
- Having Something to Nurture
- Facilitating Orientation
- Facilitating Prospective Memory

Bayles, K.A. & Tomoeda, C.K. (2014). Cognitive-communication disorders of dementia – 2nd Ed. San Diego, CA: Plural Publishing, Inc.

Language Strategies

Repetition Problems - Strategies

- Listen patiently
- Respond with same answer
- Respond with novel answers (therapeutic lying/bending reality) (Elvish et al., 2010)
 - Going along with a misperception
 - >With-holding truth
 - >Little white lies
 - ➤ Use of tricks
- >Ignore
- Validate potential underlying emotional element(s)

Repetition Problems - Strategies (Cont'd)

- Change the topic (linguistic distraction)
- Person reads answers (shift language processes)
- Use memory wallets or conversation notebooks (Bourgeois, 1996, 1999, etc.)
 - Increased use of trained and novel statements
 - Written and behavioural responses to reduce verbal repetition
- Change activity shift mental and physical sets (food preparation, laundry, family videos, etc.)

- Closed ended (forced choice and Yes/No) questions (Small & Perry, 2005; Veall & Orange, 2001) more successful than open ended questions (e.g., Wh questions)
 - May need to avoid Wh questions in middle and later clinical stages
- Semantic memory based questions more successful than episodic memory based questions (Small & Perry, 2005)
- Recent memory based questions more successful than remote memory based questions (Small & Perry, 2005)

- Use 1 idea or concept per sentence (Rochon et al., 2001; Wilson et al., 2012)
 - Minimize conjunctions (and, when, as, although, etc.), coordinators (but, yet, because, etc.), and compound sentences
- Place modifiers after nouns and verbs
 - For example:
 - "Do you want juice, apple or orange?"
 - "Let's go walking slowly."

Wilson et al., 2012

- 12 caregiver— moderate to severe AD dyads in LTC during ALD hand washing routines real-time videorecorded at 6 separate sessions
- Transcribed interactions
- During successful task completion, caregivers most frequently provided:
 - > 1 direction or idea at a time
 - Closed-ended questions
 - Paraphrased repetition

- Monitor your use of figurative language ("...gave you the cold shoulder.") and words with multiple meanings ("run") (Kempler et al., 1988, 1998)
- Use direct wording see "Gender" (Tannen, 1990)
- English as Second Language (ESL)
 - Learn 'social lubricants'
 - Volunteer partnering (staff, family, neighbours, students, etc.)
 - Videos or large print books on tape (CNIB)
 - Translation material (books, notes in chart)
 - (See references on bilingualism and dementia)

- Use humor but not sarcasm or 'play on word meaning(s)' (Kempler et al., 1988, 1998)
- Use frequently occurring and <u>personally</u> relevant vocabulary avoid jargon
- Place primary clause at beginning of sentence
 R branching (Kempler 1998)
 - For example:
 - "You must be happy your son Evan visited before he left for Montréal."

VS.

"Before he left for Montréal, your son Evan's visit must have made you happy."

Cognition

- Capitalize on episodic autobiographical memories
 - Remote vs. recent memories
- Use memory notebooks and wallets for episodic memory cues (Bourgeois 1990, 91, 92, 96, 97)
- Montessori programming and spaced retrieval training (e.g., Camp et al., 1996, 2006; Cherry et al., 2004; Hawkley et al., 2004; Hopper et al., 2005; Mahendra, et al., 2006)

Cognition: Memory – Conversation Books

- External, compensatory memory aids that cue, evoke and reinforce specific behaviours
- Draw on preserved skills sets"
 - Recognition
 - Long term episodic memory (biographical)
 - Habitual and over-learned skills
 - Oral reading skills
- Includes declarative sentence and picture:
 - Biographical, daily routine, orientation information

What are They?

- Memory wallet: collection of declarative sentence and picture stimuli which are designed to prompt recall of the stated facts and other related factual information
 - > Topics: biography, family, daily life/schedule, orientation, information
 - Wallet-type cover
 - 20-30 index cards
 - Easy to carry around
- > Memory book: enlarged version of memory wallet
- > iPad also can display pictures and sentences

Cognition: Memory – Conversation Books

- Generally consist of biographical information, photos of family members, and descriptions of important events
- Brief and simple memory aids seek to capitalize on patient's automatic communication abilities, with the goal of improving the structure and quality of communication with others
- Provide semantic support in to the form of sentences, words and images, and access to other semantic information stored in LTM.
- The written support can be used to compensate for certain comprehension deficits that may appear when instructions are provided verbally.
- Can remind individual or current tasks or topic of conversation thus enabling them to better participate in conversations

(Bourgeois et al., 1990, 1992, etc; Egan et al., 2010)

Developing a Memory Aid Stimuli

(Bourgeois, 2007)

Size, format, and number of pages based on clients' needs and desired functions

- Typically 20-30 statements related to 3-4 themes with picture
- Determining size of the font
 - notice the ease or difficulty the client reads at different font sizes
- Bourgeois Oral Reading Screen

Information chosen

- Facts that are important to the client, that he/she wants to talk about
- Facts important to the caregiver

Sentences

- Short MLU (early = 12-15; later stage 8-10)
- ➤ Simple structure single active declarative (uses the verb to be or to have, ("Dean and Myriam go grocery shopping on Mondays.")

- Use the person's vocabulary
- How would the person say the sentence?

Pictures

- There are always ways to illustrate sentences even if photographs are not available
- Chose graphically simple visually uncluttered pictures
- Adjust the size of the picture
- Take your own photos

Getting the Conversation Started and Keeping it Going

- Asking individual to have a conversation
- Guiding the conversation onto specific topics and redirecting the conversation back to the topic if needed
- Reassuring the person and helping out when she/he get stuck or can not find right word
- Smiling and acting interested
- Thanking the person for talking with you
- What to avoid during conversations
 - Do not quiz the person
 - Do not correct or contradict

iPad use to Enhance Conversations Between Persons with Dementia and their Family Caregivers

Dynes, K. A., Orange, J.B.^{1,2}, Savundranayagam, M. Y.^{1,3}, Murray, L.^{1,2}

¹Health and Rehabilitation Sciences Program, Health and Aging Field, ²School of Communication Sciences and Disorders, ³School of Health Studies

Statement of the Problem & Research Questions (RQ)

Researchers have yet to look at overlap among 3 concepts, specifically using an electronic notebook on an iPad

RQ:

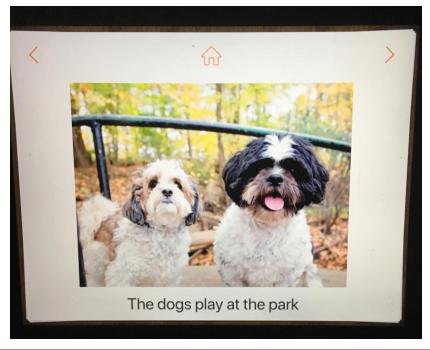
- 1. Does the collaborative use of an electronic conversational memory notebook increase the use of person-centred communication in dementia family caregiver dyads?
- 2. Does previous knowledge and familiarity with using iPads impact participants' abilities to apply person-centred communication strategies?
- 3. Do participants perceive that their knowledge of person-centred communication increased after completing the study?

Participants

- 7 persons diagnosed with mild to moderate AD, 7 family caregivers (6 spouse, 1 adult-child)
- > 40 photos uploaded to iPad Pictello software
 - > 20 baseline, 20 intervention



Pictello Application



Timeline and Procedures

Week 1

- Screened on cognition, vision, hearing, depression, relationship harmony
- Questionnaire on iPad and person-centred communication knowledge

Week 2

Discussed first group of 20 family photos 2-3x/wk

Week 3

- Received specialized education and training on personcentred communication
- Typed and recorded simple active declarative sentences for intervention phase photos

Timeline and Procedures

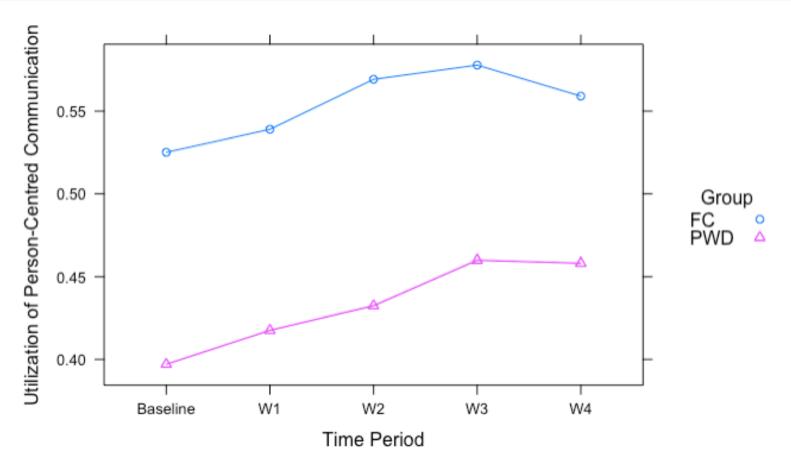
Weeks 3 - 6

- Practiced applying person-centred communication strategies to conversations about photos
- > Recordings collected every 2 weeks

End of Week 6

Administered second questionnaire on iPad and perceived person-centred communication knowledge

Person-Centred Strategy use over Time



Note. FC= Family Caregiver; PWD = Person with Dementia

Results

RQ 2

No significant change in iPad knowledge for both persons with dementia and family caregivers

RQ3

- ➤ Significant change in perceived personcentred communication knowledge for both persons with dementia and family caregivers
 - \triangleright Persons with dementia: t(6) = 5.73, p = .001
 - Family Caregivers: t(6) = 5.00, p = 0.002

Discussion-RQ 1

Main Effects

> Beneficial way to promote meaningful engagement

≻Group Differences

- Family caregivers play primary role in self-identity
- Family caregivers did not face cognitive impairments

>Time Differences

>Active engagement in education and training

Discussion-RQ 1

Interaction Model

- **≻**Group Differences
 - ➤ Persons with dementia are still able to learn new information
- >Time Differences
 - > Highly harmonious relationships

Discussion - RQ 2 and 3

RQ 2

- ➤ iPad use could have impacted ability to apply person-centred communication
- ➤ Many participants had previous knowledge

RQ3

- ➤ Supports RQ 1
- ➤ Both proportion increase and perceived increase

Cognition (Cont'd)

- Obtain attention before communicating
 - Verbal title and name
 - Appropriate touching alerting
 - Eye contact
 - At person's level
- Eliminate distractions/noise across all senses
- Do not argue the logic of an idea 'Reality Orientation' is not often useful

Cognition – Reminiscence Rx

- Reminiscing is a type of discourse that recalls "long forgotten", personal experiences from one's past
- Emphasis is placed on remembering life experiences for the pleasure of reexperiencing happy or satisfying occasions, and for sharing experiences
- Activates attention, semantic and episodic memory processes, and language associated with relevant concepts, events, and feelings
- Gives the person with dementia conversational control
- Can enhance narrative discourse, conversational discourse, and verbal and nonverbal skills
- Can also improve self-esteem, provide relief from depression, and increase spiritual well-being
- RT provides an opportunity for professional caregivers to listen and interact with patients on a personal level

(Kim et al., 2006; see Woods et al., 2005 for Cochrane Review)

Cognition – Simulated Presence Rx

- Family member or caregiver makes an audio- or video-recording about positive events in life of the person with dementia; played to simulate presence of Fx
- Family member should convey positive emotion through voice and content
- Creates environment that is reassuring and familiar; can reduce problem behaviours through stimulation of preserved memories and create positive emotions through stimulation of those memories
- Shown to reduce social isolation, agitation, and verbal or physical aggression
- Evidence only for moderate-severe dementia, but may have a positive impact on people with mild dementia as well (Bayles et al., 2006)

Cognition – Reminiscence Rx (Cont'd)

- Use multi-sensory personally relevant stimuli (e.g., books, pictures, objects, music, videos, etc
- Small group size (i.e., 4 to 8); enables participants to develop trust and willingness to share personal information
- Participants with similar cognitive-linguistic and social skills; however, various ages, employment, education, and socio-economic backgrounds can increase richness
- Topic selection 'event' approach-historical themes; 'calendar' approach holidays; 'ladder of life' approach-developmental milestones of life

Bruce, Hodgson, & Schweitzer (1999) Resource – Reminiscing with People with Dementia; A Handbook for Carers

Spaced Retrieval Training (SRT)

Camp (1989)

"Gives individuals practice at successfully recalling information over progressively longer intervals of time"

- "To enable individuals to remember important information for clinically meaningful periods of time"
 - http://www.myersresearch.org/SR_info.pdf

SRT (Lee et al., 2009)

- Based on "expanding rehearsal technique"
- Spacing vs. massed practice + reduced cognitive effort
- Reduced learner effort
- Errorless learning
- Difficulty of items matched to learner's ability
- Training is social and enjoyable

Speech

- Normal rate (~150-180 words/min) (Bourgeois et al., 2003;Burgio et al., 2001;Dijkstra et al., 2002; Small, Andersen, & Kempler, 1997; Small, Kemper et al., 1997;Tomoeda et al., 1990)
- Normal pitch or slightly lower
- Highlight important information
 - Sound and syllable stress
 - Clear intonation patterns
 - Pauses (chunk information)
- Person sitting or standing supports respiration vs. lying down

Nonverbal

- Use calm, non-threatening and 'inviting' gestures, facial expressions, posture and position
 - > Eye contact culturally, age and sex dependent
- Match nonverbal with speech and language
 - See 'Elderspeak'
- Use appropriate touch (limbs vs. central part of body) along with spoken language to gain attention
- Get to person's level sitting or standing

Sensory

- Have hearing, vision and tactile sensations tested routinely
 - Effects on mobility
- Use supportive devices regularly
 - Glasses, hearing aids and other assistive listening devices, lens magnifiers, book holders, etc.
- Hearing aids, listening devices and glasses fully functioning
 - <u>Microphone</u>, <u>Telephone</u>, <u>OFF</u>, <u>Noise Suppression</u>
 - Trouble shooting assistive devices
 - \rightarrow Hearing aid battery life (M = 10-14 days @ 15-16 hrs./day)

Sensory (Cont'd)

Minimize 'noise' across all senses (cognitive considerations)

- Also consider multiple, integrated sensory stimulation
 - > Aromas, music, taste, massage, etc.

Environments (See Lubinski, 1991)

- Physical Considerations
 - Light
 - Temperature
 - > Floor
 - Carpets vs. tile vs. linoleum
 - 'Noise'/distractions
 - Distance from rooms
 - Location
 - Confidentiality
 - Furniture
 - Arrangement
 - Access
- Psychosocial Considerations
 - Create a 'culture of communication'
 - Communication is valued as important

Montessori-Based Programming: Hx

(Orsulic-Jeras et. al., 2001)

- Developed by Italian educator, Maria Montessori, in early 1900's
- Based on the belief that learning can occur by alternating the ways of experiencing the environment
- Results showed that problem behaviours decreased when structure and purposeful activities were introduced

Goal of Montessori-Based Interventions

(Mahendra, N. et al., 2006)

"To design interventions for persons with dementia...to provide these individuals with opportunities to be meaningfully stimulated, engaged, socially interactive and, involved in activities of daily living."

Montessori Principles

(Mahendra et al., 2006)

- 1. Design a prepared environment, adapted for persons with dementia, with intent of providing meaningful stimulation and purposeful activities
- 2. Progress from simple and concrete to complex and abstract activities
- Break down activities into component parts and train one component at a time using external cues to reduce errors and to minimize the risk of failure (EL)
- 4. Allow learning to progress sequentially (learn in stages through observation and recognition to recall and demonstration)
- 5. Use real-life, tangible materials that are functional and aesthetically pleasing
- Emphasizing auditory, visual and tactile discrimination through activities

Conversation Strategies (Sacks et al., 1978)

- Turn-Taking and Organization (i.e., turn length and order)
 - Not usually impaired until the late clinical stage (Causino Lamar, 1994; Ripich et al., 1991)
- Sequential Organization recurring patterns
 - Retained until the late stage

Conversation Strategies (Cont'd)

- 3. **Topic** (Acton et al., 1999, *N*=20)
 - Positive comments about family caregivers
 - Awareness of cognitive limitations
 - Humour
 - Repetitive ideas
 - Positive comments about the past
 - Spiritualism, religion and faith
 - Their own usefulness (caring for others and themselves)

Conversation Strategies (Cont'd)

- 3. Topic (Abbott & Orange, 2001; Garcia & Joanette, 1997; Mentis et al., 1995)
 - Autobiographical memories accessed (i.e., episodic memory)
 - Topics focused primarily on immediate context (Wilks & Ste. Pierre, 1995)
 - Open ended questions useful for conversation initiation (Tappen et al., 1995)
 - Topic introductions occurred at instances of communication misunderstandings (TSR sequences)
 - Initiators, extenders, and closers

Type and manner of topic introductions related to TSR sequences

- Introductions problematic for middle stage dyads
- Reintroductions problematic for <u>early</u> and <u>middle</u> stage dyads

Conversation Strategies (Cont'd)

- Communication Misunderstandings TSR (Orange et al., 1996, 1998; Small et al.,
 2000, Watson et al., 1999; Wilson et al., in press)
 - Use clear signals
 - Possible misunderstandings ("Do you mean ____?)
 - Requests for confirmation and specification
 - Avoid not so clear, non-specific terms ("Eh?", "What?", "Pardon me?", "Huh?")
 - Repair Processes
 - Repetition and paraphrasing (i.e., substitutions) more successful than elaborations (i.e., adding new information)
 - Use synonyms rather than adding new information to fix misunderstandings
 - Three signals and repairs then continue on same or different topic

Medications

Several classes (i.e., types) of medications well known to interfere with cognition, language and communication:

- Sedatives (i.e., sleeping pills -> drowsiness, less attentive, lethargy)
- Antidepressants (i.e., to elevate mood -> blurred vision)
- Anxiolytics (i.e., tranquilizers, to calm mood -> drowsiness, learning difficulty, sustained attention problems)
- Antipsychotics (i.e., to treat psychoses and obsessive compulsive disorders -> slurred speech (dysarthria), mental slowing, problems with sustained attention)

Medications (Cont'd)

- Anticoagulants (i.e., blood thinners -> increased drowsiness)
- Antihypertensives (i.e., lower blood pressure -> distractibility, irritability, problems with sustained attention)
- Narcotic based analgesics (i.e., strong pain killers such as morphine -> reduces attention span, distractibility, slurred speech, blurred vision)

Emotions

- Respond to <u>message</u> not <u>words</u>
 - Words may give one message (e.g., anger) but real meaning may be fear or frustration – consider Validation Therapy
 - Use calming communication after verbal outbursts; do not respond to words but potential underlying message
- Words can have multiple interpretations, especially if emotionally charged
 - For examples:
 - "I need to see my wife/husband/mother/father."
 - "You're not my wife/husband/daughter/son."
 - "I need to go home."

Emotions (Cont'd)

- Acknowledge/validate isolation, loneliness, and loss related to communication problems
- Use empathetic speech tone and inviting nonverbal gestures to acknowledge feelings of loneliness, anxiety, helplessness, and to acknowledge visual and auditory hallucinations
- Provide opportunities to express anxieties and frustrations

Emotions (Cont'd)

- Avoid saying information in the presence of the person which you do not want her/him to know
- Show an interest in what person says
- Thank her/him for talking with you; this expresses your appreciation for her/his willingness to talk
- Act as the "comforter" and not the "bad guy"; soothe rather than provoke

Gender (Tanner, 1990)

Men use direct questions vs. women who use indirect questions

Women use modals "would", "could", "should", etc.

Men use directives vs. women who use tag questions

FOCUSED program (Ripich et al., 1995, 1996)

- 6 modules
 - Introduction to AD and communication
 - Memory and depression
 - Importance of communication in AD
 - 4. Cultural aspects of communication
 - 5. The FOCUSED program
 - F = Face to face
 - O = Orientation to the topic, repeat key words
 - C = Continuity (stay on topic)
 - U = Unsticking (shared background knowledge), suggest words
 - S = Structured (give choices in questions)
 - E = Exchange (maintain interactions)
 - D = Direct statements, nouns vs. pronouns,
 - Implementing FOCUSED techniques at each stage of AD

- Training program for professional caregivers
- Designed to be implemented by speech-language pathologists or other professionals educated and trained in communication, aging and dementia

Goals of Program:

- increase knowledge about communication skills and deficits in this population
- improve communication between themselves and clients, family members, and each other
- > 12 modules, quizzes, overheads, etc.

(Santo Pietro & Ostuni, 2003)

TRACED program (Small et al., 2005; 2012)

Compensatory strategies

- 1. Using one-idea sentences
- 2. Asking questions that do not place demands on recent memory
- 3. Speaking at a normal rate without exaggerated intonation
- 4. Eliminating distractions
- 5. Redirecting with cueing cards for repetitions
- 6. Using specific cues to signal need for repair
- 7. Avoiding ambiguous reference
- 8. Not suddenly shifting the topic
- Repeating when necessary and according to whether the listener misunderstood vs. forgot what was said

TRACED program (cont'd)

Connecting strategies

- Encourage: making comments that support or facilitate the family member's participation in a conversation
- 2. <u>Invite</u>: making comments that suggest a place for the family member in the activity or conversation
- 3. <u>Assist</u>: supplying a possible answer when the family member has difficulty, but not to answer for her/him
- Support conversation: providing a context for apparently unconnected statements or by selecting and expanding a topic that is introduced out of context
- Link-up: partnering and making comments that indicate a caring, shared history
- 6. Expand: building on words or ideas shared by the family member
- 7. Positivism: using positive suggestions instead of directives

Other Considerations (Cont'd)

- Brain Storms 52 week, cognitive-communication stimulation program for individuals with dementia
- Music, pet, stuffed animals/dolls, massage, gardening, art therapies, poetry, etc.
- Student partnerships (conversation notebooks, dance, physical activity and exercise programming) (Arkin et al., 1991-2001)
- ADL based programming (e.g., Breakfast Clubs) (Boczko & Santo Pietro; Small et al., 2000)
- Computer-assisted cognitive interventions (See Mahendra et al., 2005)

Other Considerations (Cont'd)

- Computer-assisted cognitive interventions (See Mahendra et al., 2005)
- TANDEM Communication training for informal caregivers of people with dementia (Haberstroh et al, 2011)
- Cognitive Stimulation Therapy (CST) (Spector et al., 2010)