

Examining Rural Older Adults' Perceptions of Cognitive Health*

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RÉSUMÉ:

La littérature existante sur la santé cognitive se concentre sur les perspectives des personnes âgées atteintes de démence. Cependant, on sait peu de la façon dont les personnes âgées en bonne santé, sans démence, comprendre leur santé cognitive. Dans les communautés rurales, le diagnostic précoce de la démence peut être entravé par de nombreux facteurs, y compris le défi du transport, les obstacles culturels et l'accès inadéquat aux soins de santé et aux services de soutien.

Sur la base des observations des participants et de deux séquences de 42 entrevues semi-structurées, cette étude a examiné les perceptions de la santé cognitive des personnes agées en milieu rural. En fournissant une base théorique innovante, éclairée par la culture et les perspectives locales, les résultats révèlent une vision complexe et multidimensionnelle de la santé cognitive. Il est essentiel que les décideurs, les chefs communautaires et les chercheurs, dans la mesure où ils travaillent pour répondre aux besoins de santé cognitive d'une population vieillissante en milieu rural, écoutent les opinions des personnes âgées rurales.

ABSTRACT

Existing cognitive health literature focuses on the perspectives of older adults with dementia. However, little is known about the ways in which healthy older adults without dementia understand their cognitive health. In rural communities, early dementia diagnosis may be impeded by numerous factors including transportation challenges, cultural obstacles, and inadequate access to health and support services.

Based on participant observation and two waves of 42 semi-structured interviews, this study examined healthy, rural older adults' perceptions of cognitive health. By providing an innovative theoretical foundation informed by local perspectives and culture, findings reveal a complex and multidimensional view of cognitive health. Rural older adults described four key areas of cognitive health ranging from independence to social interaction. As policy makers, community leaders, and researchers work to address the cognitive health needs of the rural aging demographic, it is essential that they listen to the perspectives of rural older adults.

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To date, existing literature on rural cognitive health focuses predominantly on dementia care and health service delivery for those with dementia. Research on rural cognitive health addresses three main groups of people: older adults diagnosed with dementia (Beard, Fetterman, Wu, & Bryant, 2009; Blackstock, Innes, Cox, Smith, & Mason, 2006; Forbes, Morgan, & Janzen, 2006), family caregivers (Morgan, Semchuk, Stewart, & D'Arcy, 2002; Smale & Dupuis, 2004), and health care providers (Connell, Kole, Avey, Benedict, & Gilman, 1996; Hanson, Hughes, Routley, & Robinson, 2008; Meuser, Boise, & Morris, 2004; Pimlott et al., 2009; Teel, 2004). Among primary care providers, for instance, many rural studies address dementia-related understandings, knowledge, and confidence in diagnosis and treatment (Hansen, Hughes, Routle, & Robinson, 2008; Teel, 2004). Yet, with the exception of the Healthy Brain Study in the United States (Laditka et al., 2009), there is limited research on the perceptions of cognitive health among healthy older adults without dementia, especially within rural communities (Wu, Goins, Laditka, Ignatenko, & Goedereis, 2009). The study by Laditka et al. (2009), however, uses race and culture interchangeably, and does not address the importance of place in terms of geography, history, and diversity among groups.

There is growing acknowledgement that cognitive health should not be defined merely as the absence of dementia and related diseases (Centers for Disease Control and Prevention, 2007). Despite this recognition, a literature review in the United States found that most studies focused on dementia and Alzheimer's disease rather than on understanding the perceptions of cognitive health more generally (Anderson, Day, Beard, Reed, & Wu, 2009). The National Institute on Aging has stated that cognitive health refers to one's ability to think, communicate, learn, and remember; it is the basis for how we reason, judge, concentrate, plan, and organize (National Institute on Aging, 2013). Similar to mental health, a person's cognitive health is influenced by multiple factors such as life experiences; workplace (Canadian Mental Health Association, 2016); and social, economic, and environmental determinants (World Health Organization & Calouste Gulbenkian

Foundation, 2014). For example, increasing evidence suggests that social support, education (Hendrie et al., 2006), healthy diet (Bowman et al., 2012), and physical activity (Lautenschlager et al., 2008) may help to preserve cognitive health. Although literature addresses the determinants of mental health (CMHA, 2016; WHO & CGF, 2014), few studies have examined the social determinants of cognitive health (Public Health Agency of Canada, 2011; WHO, 2012).

Consequently, the purpose of the study we describe in this article was to examine cognitive health perceptions among older adults without dementia in rural Saskatchewan, Canada. Exploring perceptions of cognitive health among unique groups such as rural older adults can facilitate the development of appropriate programs and strategies to support dementia awareness and education.

Methods

Setting

We conducted this study in the rural, agriculturally based communities of Young and Watrous, Saskatchewan. In this study, rural communities are those with sparse populations spanning large distances, with populations of fewer than 10,000 people (Rothwell, Bollman, Tremblay, & Marshall, 2002). The rural village of Young, at the time of our study, had a population of 418 people of whom approximately 108 (26%) were aged 60 or older (Saskatchewan Ministry of Health, 2014). Similarly, the rural community of Watrous had a population of 2,126 people of whom approximately 584 (27%) were aged 60 or older (Saskatchewan Ministry of Health, 2014). Both of these rural communities had considerably higher percentages of older adults than the provincial average of older adults aged 60 or older (20%; Saskatchewan Ministry of Health, 2014).

Participant Recruitment

We conducted this study in collaboration with a community advisory committee that consisted of local partners such as a former mayor and seniors' centre board members. The community partners were local seniors who were involved in all aspects of the study and who helped to recruit potential participants by word of mouth with the aid of recruitment scripts. Inclusion and selection criteria for participants included three variables: (1) were aged 60 and older; (2) in voluntary, self-declared sound cognitive health; and (3) resided in the rural communities of Young or Watrous. Many of the rural older adults recruited in this study had also participated in a previous longitudinal study with the researcher (Bacsu et al., 2014a, 2014b).

Once potential respondents were identified, the community partners explained the purpose of the study using a recruitment script as a general guideline. The community partners asked whether rural seniors had interest in the study and whether they would like their names and phone numbers passed along to the researcher for follow-up. The researcher then contacted potential participants to ask whether they were interested in taking part in the study. Once initial acceptance was provided, the researcher arranged a meeting time to review the formal consent form and to provide more information about the study. This study was approved by the Behavioral Research Ethics Board at the University of Saskatchewan. Participants provided written and voluntary consent prior to any form of data collection.

Participants

A total of 42 rural older adults participated in the study including 28 women and 14 men. The participants' ages ranged from 60 to 87 years; the average age was 78. The majority of the participants had resided in the rural communities for most of their lives, and many had moved from their neighboring farms to be closer to the supports and services in Young and Watrous. It is noteworthy that these rural communities have cell phone coverage and internet access and which many of the rural seniors used. All of the participants were English speaking, literate, and Caucasian. A total of 28 participants lived in their own houses, 8 lived in private condominiums, and 6 lived in independent-level, public seniors' housing.

Rural Culture

In discussing the culture of rural older adults, it is important to recognize that rural communities are diverse (Eales et al., 2006; Keating & Phillips, 2008). Similar to the diversity found within northern communities, rural communities differ by geography, language, ethnicity, religion, socio-economic status, remoteness, climate, and access to services. Although rural aging is often viewed from an idyllic standpoint, O'Shea, Walsh, and Scharf (2012) noted that the reality is far more complex especially in terms of the diverse environments and heterogeneity among rural older adults.

Existing literature is limited regarding culture among older adults in rural Saskatchewan; however, there are some common themes on rural culture discussed within the broader Canadian context.

In Canada, literature on rural seniors' mental health suggests that cultural values of hardiness and independence can propagate stigma and act as a barrier to seeking mental health services (Caxia, 2016). Likewise, Forbes and Hawranik (2012) suggested that values of stoicism, independence, and self-reliance may contribute to health care underutilization among rural caregivers of seniors with dementia. Additional factors for health service underutilization in rural areas may include limited awareness, lack of privacy (Forbes & Hawranik, 2012), inadequate transportation, geographic distance, and a shortage of health providers (Forbes & Janzen, 2004). Cohen et al. (2016) suggested that factors such as geographic distance may contribute to the rural characteristics and values of self-sufficiency, autonomy, and stoicism.

Theoretical Framework

With its strong emphasis on the social determinants of health including culture, the World Health Organization (WHO, 2002) Determinants of Active Aging Framework was the theoretical framework we selected to guide this study. In the WHO's framework, culture is recognized as a cross-cutting and key determinant of healthy aging. *Culture* refers to the taken-for-granted perceptions, beliefs, norms, knowledge, and assumptions that people share with others and use to inform expectations, reasoning, and everyday tasks (Quinn, 2005). The WHO framework informed data collection and analysis while providing us a structure with which to visualize the overarching importance of rural culture and understand how it influences other social determinants of health.

Theory

This study combined *lay theory* (Furnham, 1988) and *cultural schema theory* (Quinn, 2005) as the means to accommodate and privilege rural older adults' local expertise and cultural understandings of cognitive health. We can broadly describe lay theory as the informal, common-sense explanations and mental constructions that people use to describe phenomena (Furnham, 1988). Lay theory provided us critical insight into how rural seniors think about different aspects of their cognitive health. For example, we used lay theory's notion of "mental health literacy" to examine rural seniors' perceptions of cognitive health by incorporating several elements into the data collection guides, such as examining rural seniors' perceptions of key areas or domains, preventive strategies, interventions, and

access to information on cognitive health (Jorm, 2000). In this article, we focus on the findings related to the perceptions and key areas of cognitive health that were described by the rural older adults.

Cultural schema theory examines the cultural meanings that underlie shared knowledge, experiences, and understandings. Cultural schemas are belief systems and largely unspoken assumptions that are used for comprehension, reasoning, and daily activities (Nishida, 1999). During the data analysis, we utilized cultural schema theory to examine the interview transcripts for cultural keywords, metaphors, and nonverbal cues that were documented in the field notes such as long silences, nervous laughter, or pauses (Quinn, 2005).

It is well recognized that lay theories of health and illness are developed on the basis of one's surroundings and culture (Blumhagen, 1980; Kleinman, 1986). For example, cultural schemas inform illness labeling, identification of symptoms, susceptibility explanations, and treatment options (Furnham, 1988). This interdependent process between lay perceptions and contextual experiences (Goins, Spencer, & Williams, 2011) is the reason why it is important for decision-makers to develop culturally appropriate strategies to support rural older adults' cognitive health.

Data Collection

Our use of ethnographic methodology (Quinn, 2005) in data collection included participant observation and semi-structured, open-ended interviews. Participant observation of five rural older adults was interspersed over a 7-month timeframe to observe their daily happenings, conversations, and activities related to their cognitive health. Semi-structured, open-ended interviews were conducted in two waves to observe seasonal changes in relation to participants' cognitive health perceptions and activities. The interview guides focused on two primary questions: (1) How do healthy older adults perceive cognitive health within rural Saskatchewan? (2) What do rural seniors identify as the key areas of cognitive health? The interview guides posed open-ended questions to the participants such as: What does cognitive/brain health mean to you? What do you think is important to maintaining your cognitive/brain health? How do you think people can keep their mind sharp as they age in rural communities? Do you partake in any activities to help keep your mind sharp?

The first wave of interviews was conducted in the winter and spring months of February to May 2014, with 42 participants including 28 women and 14 men. The second wave of interviews was conducted in the summer and fall months of July to September 2014,

with 37 participants including 25 women and 12 men. Five participants did not participate in the second wave due to illness or unavailability.

Semi-structured interview guides were used to facilitate the interview process, and the guides were pilot tested to ensure clarity of the interview questions. We developed the guide for the first wave by drawing on the WHO Active Aging Framework (WHO, 2002), and on a combination of lay theory (Furnham, 1988) and cultural schema theory (Quinn, 2005) to examine rural seniors' cognitive health perceptions in relation to the active aging determinants of health. For example, the WHO Active Aging Framework (2002) helped to guide the interview questions related to the social determinants of health, whereas we applied a combination of lay theory (Furnham, 1988) and cultural schema theory (Quinn, 2005) to inform questions focused on understanding rural seniors' perceptions, informal assumptions, and shared knowledge of cognitive health. The interview guide for the second wave was created by building on the first wave of interview findings.

Data Analysis

Thematic analysis enabled us to identify patterns and relationships within the data and, additionally, to analyse the participant observation notes and interview transcripts through the following four stages. In the first stage, we read the different data documents to become fully immersed in the information from the study (Fereday & Muir-Cochrane, 2006). Second, after completing the initial reading, we reread the documents to develop a more comprehensive understanding and immersion within the data (Gibbs, 2007). Subsequently, we developed codes informed by the Determinants of Active Aging Framework (WHO, 2002), cultural schema theory (Quinn, 2005), and lay theory (Furnham, 1988). For example, the WHO Framework informed the development of the codes related to the social determinants of health. We utilized cultural schema theory by focusing specific attention on cultural metaphors and non-verbal cues used by rural seniors in describing cognitive health. To ensure that nonverbal ethnographic data was not lost, we created a code to document nonverbal communication such as body language, silences, pauses, and laughter. In addition, lay theory's notion of "mental health literacy" let us identify information on rural seniors' interventions, preventive strategies, and access to information on cognitive health (Jorm, 2000).

In the third stage, we coded the data according to the code list with the help of the qualitative software Atlas. ti 7 (Atlas.ti GmbH, Berlin, Germany Version 7, 2013). With this coding, we then identified the relationships and patterns of the overarching themes. Averill (2015)

explained this coding process through an analogy of codes being representative of molecules in an atom; "codes are the smallest units of meaning that one begins to find in synthesizing data into conceptual units or ideas" (p. 4). The relationships between the codes are then used to determine the configuration between the larger units of meanings, which are referred to as themes (Averill, 2015). Finally, in the fourth stage, following our thematic analysis, community workshops were held to share findings and ensure that our interpretation of the data was accurate and resonated with the participants' experiences.

The following three measures from Creswell (2007) and Richardson (2000) ensured rigor throughout the research process. First, we applied prolonged immersion by conducting participant observation over seven months and spending time in the rural communities for an extended period of time. More specifically, this study built on a 5-year relationship that was established from other ongoing, related longitudinal research in these rural communities, and involved many of the same participants. The extensive time spent in the communities helped to establish trust and substantiate interpretations (Creswell, 2007). Our second measure was thick description – the process of focusing close attention to contextual detail (e.g., where, when, and who) in order to better understand social meanings and actions -through participant observation and semistructured interviews. Third, we used *member checking* through participants' review of their interview transcripts to confirm data accuracy. Member checking was also facilitated through community workshops, where the participants exchanged insight and verified the accuracy of the study's findings.

Findings

Rural older adults described four key areas in discussing cognitive health including memory and mental sharpness, social interaction, positive attitude, and independence. Although the four areas are discussed independently here for clarity, rural seniors emphasized the holism and interconnectedness among the different components. Drawing on the rural seniors' quotes and phrases, the four areas are discussed in more detail below.

Memory and Mental Sharpness

In describing cognitive health, rural seniors addressed the importance of memory and mental sharpness in terms of one's ability to remember while having mental clarity, awareness, comprehension, and mental stimulation. Many participants identified memory as a key component of cognitive health. For example, a participant stated, "It means memory, and being able to think clearly." Another participant noted, "I think the first thing that you think about is memory; you want to keep your memory as long as you can." Participants highlighted that the ability to remember names, tasks, and people was of central importance. One man said, "It means next week if I see you downtown I'm going to remember who you are."

In discussing what cognitive health signified to them, respondents emphasized the importance of mental sharpness and comprehension. One woman noted the importance of "being able to think clearly, no fog" while another participant responded that it meant "having a mind that is sharp and clear." Many people highlighted the necessity of thinking clearly in regards to comprehension. A participant commented, "Well, I think that's the ability to still be able to read, to do mathematics, to do thinking, analysing things and being on top and remembering any type of thing." Another said that cognitive health meant "So I can comprehend what I hear and what I read."

Several participants discussed mental awareness and keeping informed of current events in describing cognitive health. One woman stated, "It means keeping up and knowing what's going on in the world; I read a lot and I try to keep my memory sharp." Another individual stated, "It means being informed, know what's going on and handling difficulties that come up."

Many of the respondents discussed the importance of mental stimulation. One participant commented, "I think a person should stay as active as you can; exercise and try to stay mentally active." Another noted, "I like to keep myself active in the line of reading, and I like reading." Through observation, the researcher saw various activities ranging from puzzle construction to reading the newspaper that seniors used to support their mental stimulation.

Mental stimulation through continuous learning was viewed as essential to cognitive health. One respondent commented, "If something new comes up, I like to be brain healthy enough to delve into it and learn." A woman stated, "I suppose anything that you have to really work at to learn is probably a good thing, like me trying to play piano by ear." Accordingly, many rural older adults felt that continuous learning provided them with opportunities to enhance and sustain their intellectual capacity in old age.

Social Interaction

In discussing cognitive health, rural older adults identified the importance of social interaction. Social interaction was often described in terms of socializing and communicating with others. A woman stated, "I feel a lot of brain health is due to mingling with other people

... You're socializing, but you've also got to get out of your home." One man commented, "Just getting out and about, visiting with people and talking, that social kind of thing." Another participant stated, "I think you have to be involved because if you sit at home by yourself I think you would just go downhill."

Communication and conversing with others was articulated in describing cognitive health. For example, a participant observed, "I think it's really important to communicate with others and be active." A woman asserted, "If you're just going to sit in your own little space and not communicate with other people, then I think you're going to go bonkers." Another adult commented," I think the key to having good brain health is if you're healthy and you're active and you read and hold conversations."

Several participants discussed keeping socially active and involved in the community. For example, a participant noted, "I think you've got to keep active and involved; I go to coffee six days a week, I think it stimulates your brain when you are talking to different people. ..." Rural older adults also used local cultural metaphors and idioms (Quinn, 2005) in expressing cognitive health. For example, a rural senior commented, "I think to keep your brain in motion, be active. If you sit at home like a vegetable, you're not going to interact with anybody." In this quotation, vegetable implies no activity.

Participants identified challenges to supporting social interaction within the local rural context. In discussing the influence of social isolation and geographic distance, a participant noted, "Snow was four feet high, minus 30 [degrees Celsius]; it's not good for the brain especially on a farm, when you don't see people." Study participants also identified local challenges as barriers to maintaining social health: limited public transportation, inadequate seniors' housing without social gathering spaces, and extreme winter weather and dangerous road conditions. During participant observation, the researcher witnessed many of these rural challenges first-hand, such as the dangerous seasonal driving conditions and the isolating effects of winter weather.

Positive Attitude

Study participants described having a positive attitude as being significant to cognitive health. A positive attitude was often described by participants in terms of being happy and having an optimistic outlook on life. One participant stated, "I think a lot of it depends upon a person's attitude and whether you're happy and whether you're a glass-half-full type of person." Another senior acknowledged, "I think thinking positively helps a lot to support your brain health."

Rural older adults discussed being "young at heart" and feeling younger than one's age. One woman shared a story of her mother who, when she was in her mid-70s, had refused to go to the seniors' centre because she viewed it as a place for old people. The participant further commented, "My mom lived until she was 96; she still didn't believe she was old and she never gave up being young." Another participant highlighted that age should not determine your abilities, and she asserted, "Don't say 'well I'm 79, I can't do that anymore.""

Respondents emphasized the importance of not feeling sorry for oneself and gaining perspective on one's own challenges within the context of others' adversity. A participant stated, "I think one of the most important things is positive thinking; you can't feel sorry for yourself ... All you need to do is go to a nursing home and look around and see people your age or younger and know how lucky you are." Another adult noted, "When I feel sorry for myself I just think of other people in this world; I just put on the news and I see these people and children at war ... we are fortunate to have freedom."

Depression was identified as a challenge to maintaining a positive outlook on life. One senior stated, "I feel if you're not happy, you're really not healthy because you don't tend to eat properly ... And the less you do, the less you want to do." Additional challenges to being positive included stress, poor personal or spousal health, mobility challenges, cold winter months, death of a spouse or friends, poor finances, inadequate transportation, limited seniors' housing, and spouses who are separated from each other by having to be moved outside of their community for long-term care.

Participants often described their ability to remain positive in relation to their spirituality. Rural seniors discussed spirituality in terms of having a sense of purpose, self-acceptance, and meaningfulness in their lives. Respondents described having an interest in spirituality given their age and wondering what happens in the afterlife. For example, one woman commented, "Spirituality, that's another interesting thing because I think when a person gets older you begin to think about 'what is life'? What is it all about? It's a journey." In describing spirituality, some participants emphasized the importance of aging and embracing one's identity through self-acceptance. One senior noted, "I think that by the time we get to this age we understand ourselves a lot better ... I guess when we get to this age we think, 'well, I am just going to be me and if that isn't good enough, then that's too bad.""

Independence

Independence was discussed as another key area of cognitive health. In describing cognitive health, participants

emphasized the importance of personal freedom, autonomy, and daily decision-making. One man stated, "It's about looking after your own financial affairs and the day-to-day decisions and just basically being able to manage on your own without depending on someone else." Another participant commented, "It really gives you freedom because then you can make your own choices; all your life you've done things for yourself ... It's probably the most important area we deal with." Similarly, in describing cognitive health, a participant stated that "it means whether you're still able to make your own decisions and whether your judgment is still good."

Many older adults emphasized the necessity of independence in relation to maintaining their activities of daily living. For instance, a respondent noted, "I think you need a healthy brain to function, to be able to do things that are going to affect your day-to-day life." Another replied, "I guess [cognitive health means] just being able to get along with your daily affairs and with all the things you have to remember." In describing cognitive health, a participant stated, "I guess [it means] how you function with your brain and how active you are with everyday stuff – you've got to keep up with that."

Several participants made reference to physical health and physical activity in discussing one's ability to be independent. For instance, a senior responded, "I'm thinking if you keep physically active, then hopefully that helps to keep your brain active as well, and I suppose diet and all those kinds of things contribute."

Limitations

Although this study provides knowledge on rural older adults' perceptions of cognitive health, this research has limitations. Our study was conducted in two communities in rural Saskatchewan and may not be representative of other communities. Rural older adults' perceptions of cognitive health may be different in communities with ethnically and linguistically diverse populations, or differ among rural communities of high and low socio-economic status. For example, all of the participants in this study had access to technology such as the internet and computers either in their homes or at the public libraries. Seniors in communities without access to technological resources may have different knowledge and perceptions of cognitive health. Thus, research is needed to examine cognitive health perceptions in geographically northern and remote communities, and especially among Aboriginal older adults. Aboriginal peoples currently comprise 11 per cent of Saskatchewan's total population (Statistics Canada, 2011a), yet there is a paucity of literature on healthy aging among Aboriginal older adults,

especially in terms of cognitive health (Lanting, Crossley, Morgan, & Cammer, 2011). A recent study in Alberta found that dementia is more prevalent among First Nations people than non-First Nations people and that dementia was diagnosed at younger ages (Jacklin, Walker, & Shawnde, 2013). Further research among different groups will provide more in-depth understanding and insight towards cultural variations in older adults' perceptions of cognitive health, which is timely given the projected increase in the number of seniors both in Canada (Statistics Canada, 2015) and worldwide (Pew Research Centre, 2014).

Discussion

The anticipated increase of an aging rural demographic (Statistics Canada, 2011b; 2015) presages the growing issue of dementia in rural communities (Alzheimer Society Canada, 2010). Herbert et al. (2013) suggested that strategies are urgently needed to support and maintain cognitive health. Local knowledge and community context are crucial to developing culturally appropriate strategies and interventions within rural communities. This study is the first to have examined how rural seniors without dementia perceive cognitive health within the context of two rural communities in Saskatchewan.

The predominant focus on pathology in the current literature fails to recognize that cognitive health is more than the absence of disease. Although dementia is an important aspect of cognitive health, this study's findings suggest that it should not provide the foundation for understanding older adults' cognitive health. In discussing cognitive health, the study participants described four key areas: memory and mental sharpness, social interaction, positive attitude, and independence. Despite our having reported on the four areas independently for clarity in this article, the rural seniors described a sense of holism, interconnectedness, and the multidimensional nature of cognitive health.

Popay (2006) asserted that investigations into health should not be restricted to the realm of researchers and that the inclusion of marginalized voices has much to offer health research. In this study, lay theory (Furnham, 1988) and cultural schema theory (Quinn, 2005) provided a powerful means to accommodate and privilege the rural older adults' understandings of cognitive health. For example, lay theory addressed the importance of rural seniors' knowledge and understandings (Bergstrom, Holmes, & Pecchioni, 2000), whereas cultural schema theory recognized the importance of cultural values (Strauss, 2005). Given the paucity of research on rural seniors' cognitive health perceptions, this study provides preliminary insight and a unique contribution to the existing cognitive health literature.

We found that the participants' cognitive health perceptions were influenced by the rural context and local cultural values. Throughout the research, rural seniors made reference to the supports and barriers of cognitive health within a rural context. For example, participants identified challenges to supporting cognitive health in their rural communities such as limited public transportation, geographic distance, social isolation, and dangerous winter road conditions.

In contrast to existing research on cognitive health perceptions (Anderson et al., 2009; Hosking, Sargent-Cox, & Anstey, 2015; Laditka et al., 2009), in this study we found that participants emphasized the value of independence rather than physical health. For example, the rural seniors emphasized values of self-reliance, autonomous decision-making, and ability to function in dayto-day tasks as having utmost importance. Participants discussed physical health as a means of sub-support to facilitate their independence. This finding is consistent with data from a systematic review of the literature on rural perceptions of health and which has found that rural populations tend to emphasize cultural values of independence in defining health, especially in relation to self-sufficiency and autonomy (Gessert et al., 2015). These values are corroborated by existing literatures that describe a general, rural culture in North America in terms of independence, self-reliance, and autonomy (Averill, 2012; Goins et al., 2011). Slama (2004) asserted that "independence and self-reliance are survival values when you live at distances from services and supports" (Slama, 2004, p. 10).

To support cognitive health in rural communities, it is essential for care providers and policy makers to listen to the perspectives of rural older adults. There is growing awareness that health research needs to become more democratic and collaborative with "the groups who are the target of the research and whose voices are rarely if ever heard" (Popay, 2012, p. 60). Existing policies have often employed an urban-focused perspective (Kirby & LeBreton, 2002), but such a focus overlooks the cognitive health needs of rural older adults and leaves many without critical supports and services. An understanding of rural older adults' perceptions of cognitive health can facilitate the development of appropriate programs and strategies to support early dementia diagnosis, education, and awareness in rural communities.

Conclusion

This study's findings identify rural older adults' perspectives of cognitive health. By providing an innovative theoretical foundation informed by local knowledge and a rural community context, this study advances geriatric knowledge through a unique

contribution and preliminary insight of rural seniors' perspectives to the current cognitive health literature. Rural older adults identified four key areas of cognitive health including memory and mental sharpness, social interaction, positive attitude, and independence. An understanding of the cognitive health perceptions articulated by rural older adults will support the development of appropriate programs and strategies to support dementia awareness, education, and services in rural communities. As policy makers, community leaders, and researchers work to address the cognitive health needs of the rural aging demographic, it is essential that they listen to the perspectives of rural older adults.

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