

Are Changes Needed for Therapeutic Recreation Undergraduate Curricula? Perceived Competencies of Therapeutic Recreationists and Recreation Staff Working with Seniors in Long Term Care Homes

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RÉSUMÉ

L'objectif de cette étude était d'identifier les lacunes dans les compétences gérontologiques auto-perçues par le personnel en loisir dans les centres de soins de longue durée en Ontario. Deux séries de compétences gérontologiques ont été présentées dans un sondage en ligne qui a été distribué à du personnel en loisir œuvrant dans 500 centres de soins de longue durée. Parmi eux, 487 membres du personnel ont répondu au sondage. Ce sondage comportait des questions concernant les compétences actuelles du personnel et les compétences dont ils avaient eu connaissance avant d'entrer sur le marché du travail. Les facteurs perçus comme favorables à une plus grande confiance en ces compétences gérontologiques étaient l'expérience, la formation continue et les sessions de formation en cours d'emploi. Une meilleure compréhension des lacunes dans les compétences gérontologiques est nécessaire pour améliorer la formation en loisirs thérapeutiques, dont la formation continue dans ce domaine.

ABSTRACT

The purpose of the study was to identify self-perceived gaps in gerontological competencies among recreation staff in long-term care homes in Ontario. Two sets of gerontological competencies, in an online survey, were distributed to recreation staff working in 500 long-term care homes. There were 487 recreation staff members who completed the questionnaire. The questionnaire contained questions regarding staff's current competencies and competencies that they recalled learning prior to entering the workforce. Factors that were perceived to contribute to confidence in gerontological competencies were experience, continuing education, in-service training sessions, and education. Understanding the gaps in gerontological competencies is required for enhancing therapeutic recreation education and continuing education.

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In North America, persons 65 years of age and older represent about 14 per cent of the population, with the number of older adults predicted to double in the next 45–50 years (Statistics Canada, 2016; U.S. Department of Health and Human Services, 2016). As the population ages, more individuals will require care, including care provided by long-term care (LTC) homes. Therapeutic recreation (TR) is a beneficial element of LTC. It supports resident engagement in social and recreational activities and meaningful relationships, thus enhancing well-being (Björk et al., 2017; Lood et al., 2017). Recreation professionals must have gerontological knowledge, skills, and abilities to provide TR in LTC. However, the extent to which gerontological competencies are achieved through entry-to-practice education and continuing education is not well understood. This research examined the perspectives of TR staff about their competencies for working with older persons in LTC homes in Ontario, Canada.

According to the Canadian Institute for Health Information (Canadian Institute of Health Information, 2013), over 150,000 Canadians live in LTC homes. The average age of LTC home residents is 85 years (Canadian Institute of Health Information, 2013). Frailty, multiple health problems, and functional limitations are common (Canadian Institute of Health Information, 2013). At least 60 per cent of residents have a diagnosis of dementia (Canadian Institute of Health Information, 2013). Furthermore, almost half of the residents have limited or no social engagement and approximately one third have signs of depression (Canadian Institute of Health Information, 2013). This has significant consequences for quality of life of residents. Quality of life of LTC home residents is enhanced through person-centred care approaches, including meaningful engagement in activities, authentic respectful relationships, and creation of a supportive community (Fazio, Pace, Flinner, & Kallmyer, 2018). Thriving and mental well-being of LTC home residents are associated with engaging in everyday activities and recreation and activity programs (Björk et al., 2017; Edvardsson, Petersson, Sjogren, Lindkvist, & Sandman, 2013; Lood et al., 2017). TR in LTC enhances resident engagement in these activities.

TR is the “systematic and planned use of recreation and other activity interventions and a helping relationship in an environment of support with the intent of effecting change in a client’s attitudes, beliefs, behaviours and skills necessary for psychosocial adaptation, health, and well-being” (Shank & Coyle, 2002, p. 54). TR professionals work with individuals across the lifespan, including those receiving geriatric or behavioural/mental health care, and persons living with developmental disabilities or physical disabilities (National Council for Therapeutic Recreation

Certification, 2015). In LTC homes, TR professionals use leisure as a means to help develop friendships, maintain health, and promote inclusion (Carter, Van Andel, & Robb, 2003). They provide residents with the opportunity to self-explore, increase their life satisfaction, and alleviate depression (Sullivan & Sharpe, 2005). Therapeutic recreation includes group programs and one-on-one programs designed to meet resident needs. Interventions can include activities to promote social interaction, agency, and self-expression (Buettner, 2001). Residents can exhibit social interaction, agency, and self-expression when participating in activities such as art, horticulture, and other activities that bring meaning to the resident in LTC (Iwasaki, 2017; Rodrigues, 2016). Therapeutic recreationists support the quality of life and well-being of LTC residents and TR activities can make important contributions to residents’ maintaining health and achieving rehabilitation goals (Sullivan & Sharpe, 2005). Furthermore, TR can prevent further decline in functioning, stimulate sensory awareness, enhance the living environment, improve social involvement, and help residents and caregivers cope with dying (Carter et al., 2003).

The provision of TR in LTC homes has changed over time, with an increased emphasis on provision of services by staff with recreation education. For example, in Ontario, prior to 2010 there were no requirements for the educational preparation of recreation staff. As of 2010, the Long Term Care Home Act specified that staff in recreation departments have a diploma or degree in recreation and leisure, TR, or a related field (Government of Ontario, 2011). Depending on how the term *related field* is interpreted and the extent to which LTC homes continue to employ staff who were hired before 2010, recreation staff may or may not have formal education in recreation and leisure and TR. However, the trend is towards hiring staff with recreation education. A significant number of recreation therapists are employed in LTC settings. In the United States and Canada, 29 per cent of certified therapeutic recreation specialists work in LTC homes (National Council for Therapeutic Recreation Certification, 2015). Therefore, ensuring that therapeutic recreation graduates are adequately prepared for work in LTC homes is important.

Calls have been made to ensure that health professionals, including recreation therapists, are educationally prepared and have competencies required to work with older persons (Boscart, McCleary, Huson, Sheiban, & Harvey, 2017; Richeson & Sardina, 2016; Sinha, 2012). The extent to which therapeutic recreation professionals achieve competencies for LTC through entry-to-practice education and work experience has not been well examined. A needs assessment of health professionals’ gerontological competence

in Ontario, Canada, highlighted competencies that practice settings expect of new graduates and gaps in competencies in the current workforce (McCleary Luinstra-Toohey, Hoogeveen, Boscart, & Donahue, 2014). Supervisors and experts in LTC identified gaps in competencies across professions in LTC. For therapeutic recreation, questions were raised about assessment skills, setting client goals and planning necessary interventions to meet these goals, dementia specific approaches, understanding documentation software and writing care plans, and understanding of the Resident Assessment Instrument-Minimum Data Set (RAI-MDS). However, the informants for this survey did not include TR professionals and assessing TR was not the main objective of that study that focussed on nursing staff, rehabilitation, physicians, and social workers (McCleary et al., 2014).

There is scant literature about how gerontology competencies are being achieved in TR education. A survey of therapeutic recreation education programs in the United States found that half of the programs offered an undergraduate aging course and one in five TR educators identified as having an interest in aging (Beland & Kapes, 2003). There is a trend for using intergenerational service learning to achieve gerontology-related competencies (Dupuis, 2002; Genoe, Crosbie, Johnson, Sutherland, & Goldberg, 2013; Krout et al., 2010). There is little information on leisure and aging in TR textbooks and journal articles (Rod-Welch, 2010). This has implications for achieving gerontological competencies through TR education. The lack of teaching material could contribute to the unpreparedness of TR professionals for gerontological practice.

There is increased interest in gerontological competencies in the TR profession. Recently, a set of competencies for TR with older adults was developed by the American Therapeutic Recreation Association Geriatric Treatment Network (Richeson & Sardina, 2016). The competencies include health prevention and promotion; knowledge of and ability to assess and plan therapeutic interventions for persons with geriatric syndromes, chronic illnesses, and common illness, knowledge of health care settings and health systems, understanding of the roles of recreation therapists in geriatric settings, and ability to communicate and advocate with other health professionals. These competencies are consistent with interprofessional competencies published in Canada (National Initiative for the Care of the Elderly, n.d.) and the United States (Partnership for Health in Aging, 2010).

Purpose and Research Questions

There is little research on the gerontological aspect of curricula and gerontological competencies in TR curricula. It is important to examine recreation professionals'

perspectives on their gerontological competencies relevant to working in LTC homes. Information from recreation staff about their current competencies and their competencies when they entered the workforce is needed to plan for enhancing TR education and continuing education. This research addresses this gap in understanding the perspectives of recreation staff working in LTC homes. The purpose of this study was to explore the self-perceived gerontological competencies of recreation staff working in LTC homes in Ontario, Canada and factors that may be associated with these perceived competencies.

The research questions for this study were:

1. Do recreation staff who work in LTC homes perceive that they have the competencies needed to work with residents in LTC homes?
2. Do recreation staff who work in LTC homes perceive that they possessed the competencies needed to work with residents in LTC homes when they graduated?
3. To what extent are type of education, work experience, and continuing education, associated with perceptions about current gerontological competencies?
4. Among recent recreation therapy graduates, to what extent are type of entry-to-practice education, inclusion of gerontological courses, and practice experience associated with perceptions about their competencies on graduation?

Methods

This study used a descriptive cross-sectional survey method based on Dillman's Tailored Design Method (2007). An Internet-based, self-report survey was administered, with recruitment through telephone and e-mail. The target sample was recreation staff (including those in TR) who worked in LTC homes in Ontario, Canada and provided recreational services. There is no existing list of recreation staff working in LTC homes in Ontario; therefore, the sampling frame included: (1) a list of all Ontario LTC homes compiled from the Ontario Ministry of Health and Long Term Care's website; and (2) Therapeutic Recreation Ontario's (TRO's) membership directory.

One sampling method was contacting recreation managers from the list of Ontario LTC homes, which is published online by the Province of Ontario. To focus on TR in LTC homes, LTC homes that were attached to hospitals or retirement homes were excluded, leaving 500 stand-alone LTC homes. The researcher contacted stand-alone homes to avoid recruiting recreation staff who may have had split job responsibilities in areas other than LTC, such as retirement homes, continuing care, and acute care. Restricting the sample to stand-alone homes ensured that all participants would be answering questions from the perspective of LTC. A notice informing recreation managers about the

study was sent to the LTC homes by mail. One week later, a phone call was made to each LTC home. Three attempts were made to reach the manager before removal from the list ($n = 210$ homes). When the recreation manager was reached by phone, the study was explained and a request was made to complete the questionnaire and send it to that manager's recreation staff. There were 290 managers who agreed to share the survey with their staff (58.4% of eligible LTC homes). There were recreation staff from at least one LTC home in each of the 14 health regions in Ontario. The exact number of recreation staff is not known, but if there were three recreation staff at each home there would be approximately 1,500 potential participants.

The second sampling method involved contacting recreation staff directly through TRO, the voluntary professional organization of TR in Ontario; by publicizing on the Facebook page and the blog of the organization, and by contacting members by email. The organization gave the researchers permission to contact members who indicated that they worked in LTC. There were 125 such members. An e-mail invitation was sent to each of these members, followed by two reminder e-mails 2 weeks apart.

Ethics

The study was approved by Brock University's Research Ethics Board. Participation was anonymous, with consent implied by completing the questionnaire.

Survey Questionnaire

Dillman's Tailored Design Method (2007) was used to construct and test the questionnaire. The questionnaire consisted of closed questions. It was pre-tested through (1) completion by experts in the field, (2) interviews to evaluate cognitive and motivational qualities, (3) pilot testing, and (4) a final check. The cognitive interviews and pilot testing were conducted with potential respondents of the survey: three recreation staff, two educators, and two recreation managers.

Two sets of competencies were used. One, based on the Canadian National Initiative of Care for the Elderly (NICE) *Core Interprofessional Competencies* (National Initiative for the Care of the Elderly, n.d.), had 17 items (NICE Interprofessional Competencies, see Table 1). Seven items measure perceived competence to "perform and refine assessment of the older adult" in particular domains; for example, functional ability, cognitive ability and mental health, and spirituality. The remaining 10 items are about application of research evidence, knowledge, and theory in practice. The interprofessional competencies are relevant to TR in LTC but they do not include specific competencies unique to TR.

There were no published TR gerontological competencies at the time of this study. Therefore, a second set of competencies with a specific focus on TR was developed. The second set of competencies, adapted for TR from a survey of health educators (McCleary et al., 2014), included 13 items (LTC TR Competencies, see Table 2). Nine of the items refer to developing, implementing, and evaluating programs for three common conditions in LTC homes (responsive behaviours, physical disabilities, and dementia). One item pertains to distinguishing between normal aging and disease processes. The remaining items pertain to documentation. There are many gerontological competencies that could have been assessed within this study; however, in order to avoid respondent burden, two sets were used (Dillman, 2007).

Likert scaling was used for competency items. The scale ranged from 1 to 5; 1 being *not confident* and 5 being *very confident*. All participants were asked about their current perceived competencies and, in order to address the fourth research question, participants who had graduated within the previous 5 years from a therapeutic recreation education program were asked about their recollections of their perceived competencies when they graduated. Summary scores were calculated for each set of competencies (NICE and LTC TR) for current and recalled competencies. Each summary score is the mean of the individual's responses to items in the set of competencies. Internal consistency of the competencies was high, with a Cronbach's α of .94 and .97 for current and recalled NICE interprofessional competencies, respectively, and a Cronbach's α of .93 and .96 for current and recalled LTC TR competencies, respectively.

Data Analysis

The data were imported into IBM SPSS software (IBM Analytics, 2018) from Fluid Surveys. Differences between current and recalled post-graduation competencies were tested using t-tests. Analysis of variance (ANOVA) and t-tests were used to test for associations between summary competency scores and categorical variables. The following variables were categorized for analysis: years working in LTC, number of in-service training sessions attended, and number of continuing education courses attended while working in LTC. Correlations were computed to test associations between summary competency scores and continuous variables. According to Fox-Wasylyshyn and El-Masri (2005), case mean substitution assumes that for any case the data point is closely related to scores on the remaining data points. Furthermore, Fox-Wasylyshyn and El-Masri (2005) suggest that case mean substitution is applicable to self-report measures because all

Table 1: Perceived confidence in NICE interprofessional competencies

Competency Item	Current (<i>n</i> = 487) <i>M</i> (<i>SD</i>)	Recalled (<i>n</i> = 76) ^a <i>M</i> (<i>SD</i>)
1. Perform and refine assessment of the older adult in the domain of:		
a. Physical health and illness conditions	3.80 (.92)	3.30 (.97)
b. Functional ability	3.85 (.91)	3.39 (.99)
c. Cognitive ability and mental health	3.90 (.89)	3.43 (.97)
d. Psychosocial function including social support system and life course changes	3.89 (.90)	3.39 (.98)
e. Spirituality	3.86 (.98)	3.17 (1.05)
f. Socio-environmental situation	3.96 (.89)	3.34 (.97)
g. Safety and security	4.04 (.85)	3.42 (1.05)
2. Apply evidence-based standards/best practice guidelines to promote healthy activities in older adults	4.25 (.78)	3.86 (1.02)
3. Involve older adults and their families in developing expected outcomes	4.21 (.79)	3.67 (.97)
4. Recognize that all behaviour has meaning and view challenging behaviour of older adults as an attempt at communication based on need	4.53 (.66)	3.89 (.92)
5. Identify that older adults may be at risk in relation to their right to information and privacy of information	4.47 (.71)	3.92 (.86)
6. Form partnerships with older adults, their families and communities, to achieve mutually agreed upon health outcomes	4.42 (.72)	3.78 (.92)
7. Inform and support older adults and their families while they are making decisions about their health care	4.27 (.79)	3.68 (.97)
8. Respect and promote older adults' rights to dignity and self-determination within the context of the law and safety concerns	4.55 (.70)	3.91 (.96)
9. Apply ethical principles to decisions on behalf of all older adults with special attention to those with limited decision capacity	4.38 (.75)	3.83 (.94)
10. Provide care that demonstrates sensitivity to older adults' cultural and spiritual diversity	4.47 (.69)	3.83 (.99)
11. Identify and assess one's own values and biases regarding aging	4.47 (.67)	4.05 (.91)

Note. ^a The sample for recalled competencies consists of participants with recreation therapy education who graduated within the past 5 years.

Among the current competency items, Tukey post-hoc pairwise comparisons, with Bonferroni correction, indicated differences at the $p = .05$ level for the following pairs for each of items a–g compared with items 2–11 and, additionally, between item 2 and items 4 and 8; between item 3 and items 4, 5, and 8; and between items 4 and 7. Among the recalled competency items, Tukey post-hoc pairwise comparisons, with Bonferroni correction, indicated differences at the $p = .05$ level between item 1a and items 2, 4, 5, 6, 8, 9, and 11; between item 1b and items 2, 4, 5, and 11; between item 1c and items 2, 4, 5, and 11; between item 1d and items 2, 4, 5, 8, 9, and 11; between item 1e and items 2–11; between item 1f and items 2, 4, 5, 6, 8, 9, 10, and 11; and between item 1g and items 2–5 and 11.

items are indicators of a specific concept and are assumed to be closely correlated. Cases were deleted if they were missing more than half of the items. One case was deleted. The other 27 cases that were missing data for some items were recoded, using imputed means of other respondents' responses.

Results

Sample Description

The survey was completed by 487 recreation staff. Most had attended post-secondary school ($n = 473$, 97.3%). A minority of participants had graduated from TR education programs ($n = 130$, 26.7%). Most had other education such as in gerontology, or in social work and gerontology ($n = 357$, 73.3%). Approximately one third of the all participants had graduated within the previous 5 years ($n = 174$, 35.7%) and over half of those with TR education had graduated within the previous 5 years ($n = 76$, 58.4%). Mean years of experience

working in LTC was 12.18 ($SD = 9.61$). TR graduates had fewer years of experience (8.14, $SD = 8.30$) than those with other education (13.63, $SD = 9.64$, $t(482) = -5.73$, $p = .001$).

Current Perceived Confidence in Gerontological Competencies

The mean current summary scores were 4.19 ($SD = .59$) for the NICE interprofessional competencies and 4.39 ($SD = .57$) for the LTC TR competencies. Tables 1 and 2 present means for individual NICE interprofessional and LTC TR competencies. Spirituality was the item that was most often rated as "not confident" ($n = 46$, 9.4%). The 13 LTC TR competencies were compared with one another using repeated measures ANOVA ($F[12,5832] = 18.387$, $p < .001$). The 17 NICE competencies were also compared with one another using repeated measures ANOVA ($F[16, 2064] = 32.828$, $p < .001$). Post-hoc pairwise comparisons of means within each set of competencies, using the Bonferroni

Table 2: Perceived confidence in LTC TR competencies

	Current ($n = 487$) M (SD)	Recalled ($n = 76$) ^a M (SD)
1. Develop programs for responsive behaviours	4.28 (.74)	3.50 (.94)
2. Implement programs for responsive behaviours	4.34 (.72)	3.55 (.96)
3. Evaluate programs for responsive behaviours	4.29 (.78)	3.55 (.94)
4. Develop programs for physical disabilities	4.43 (.73)	3.80 (.83)
5. Implement programs for physical disabilities	4.47 (.71)	3.82 (.83)
6. Evaluate programs for physical disabilities	4.41 (.76)	3.79 (.85)
7. Develop programs for dementia	4.47 (.71)	3.81 (1.03)
8. Implement programs for dementia	4.54 (.69)	3.93 (.93)
9. Evaluate programs for dementia	4.46 (.75)	3.83 (1.01)
10. Know the difference between normal aging and disease processes	4.35 (.74)	3.83 (.97)
11. Understand the purpose of RAI-MDS	4.30 (.88)	2.89 (1.40)
12. Write effective care plans in LTC	4.15 (.94)	3.07 (1.28)
13. Write effective progress notes for residents' chart in LTC	4.35 (.83)	3.29 (1.26)

Note. ^a The sample for recalled competencies consists of participants with recreation therapy education who graduated within the past 5 years.

Among the current competency items, Tukey post-hoc pairwise comparisons, with Bonferroni correction, indicated differences at the $p = .05$ level between the following: item 1 and items 4–9; item 2 and items 5, 7, 8, 9, and 12; item 3 and items 4–9; item 4 and items 8 and 12; item 5 and items 11 and 12; item 6 and items 8 and 12; item 7 and items 8, 11, 12 and 13; item 8 and items 9–13; item 9 and items 11–13; items 10 and 12; items 11 and 12; and items 12 and 13. Among the recalled competency items, Tukey post-hoc pairwise comparisons, with Bonferroni correction, indicated differences at the $p = .05$ level between the following: item 1 and items 11, 12, and 13; item 2 and items 4, 5, 6, 11, 12, and 13; item 3 and items 11, 12, and 13; item 4 and item 11; item 5 and item 11; item 6 and items 11 and 12; each of items 7, 8, 9, 10, and items 11 and 12; and item 10 and item 13.

correction, indicated that all LTC TR and NICE competency items had significant differences with at least one other competency item.

Recalled Levels of Confidence in LTC TR and NICE Competencies on Graduation

Recalled levels of confidence in competencies on graduation for participants who graduated from a recreation therapy education program within the past 5 years are presented in Tables 1 and 2. The mean recalled NICE interprofessional competencies summary score was 4.19 ($SD = .59$) and the mean was 4.39 ($SD = .57$) for the recalled LTC TR competencies summary score (Table 3). The 13 LTC TR recalled competencies were compared with one another using repeated measures ANOVA ($F[12, 5832] = 18.387$, $p < .001$). The 17 NICE recalled competencies were also compared with one another using repeated measures ANOVA ($F[16, 2064] = 32.828$, $p < .001$). Post-hoc pairwise comparisons of means within each set of competencies, using the Bonferroni correction, indicated that all recalled LTC TR and NICE competency items had significant differences with at least one other competency item.

Differences between Current and Recalled Competence

Paired samples t-tests were conducted to test the differences in perceived confidence between current and recalled competency items. There were statistically significant differences between current and recalled perceived competence for every LTC TR and NICE competency item (results not shown). Mean perceived competence was higher for current compared with recalled competence.

Factors Associated with Current Perceived Competence

Associations between current perceived competence and each of type of education, years working in LTC, and continuing education was tested using the complete sample. Mean current NICE interprofessional competence was 4.3 ($SD = .47$) for participants with TR education ($n = 130$) and 4.3 ($SD = .62$) for participants with other education ($n = 357$, ns). Means of current LTC TR competence were 4.5 ($SD = .47$) and 4.4 ($SD = .62$) for participants with TR education ($n = 130$) and other education ($n = 357$), respectively (ns). Mean years working in LTC was 12.18 ($SD = 9.61$, $n = 485$). There was a positive correlation between years working in LTC and current LTC TR competencies

Table 3: Competency summary scores of recent TR graduates

	Current summary score M (SD)	Recalled summary score M (SD)	Statistical significance
NICE interprofessional competencies ($n = 76$)	4.16 (.51)	3.64 (.71)	$t(75) = 7.56$, $p < .001$
LTC TR Competencies ($n = 75$)	4.37 (.52)	3.59 (.74)	$t(74) = 9.61$, $p < .001$

($r[483] = .16, p < .001$). Mean competency scores by number of in-service training sessions attended and number of continuing education courses attended while working in LTC are presented in Tables 4 and 5. Of those who reported having attended more continuing education courses, means for LTC TR competence were higher among participants who reported having attended more in-service training sessions.

Factors Associated with Recalled Competence on Graduation

Among participants who had completed TR education in the past 5 years, recalled competencies were not significantly associated with college versus university TR education (Table 6) or practicum experience in LTC (Table 7). Recalled competency scores were higher for participants who reported that Minimum Data Set (MDS) and care planning was included in their education ($M = 3.77, SD = .73; M = 3.82, SD = .66$), respectively, $t[57.94] = 2.42, p = .02$. Recalled competence was not significantly associated with recollection of having other aging topics included in entry-to-practice education (dementia, delirium, depression, physical aging) (Table 8).

Discussion

This study is the first to examine the perspectives of LTC recreation staff and recreation therapists on their gerontological competencies. Methods to enhance response rate were successful in achieving a large sample, with representation from all geographic areas of Ontario. The findings have implications for supporting TR practice in LTC and for TR education and education in other relevant fields, such as social work/gerontology and gerontology.

Results revealed that perceived current competencies were higher currently than were recalled at the time of graduation, suggesting that confidence in participants'

knowledge, skills, and abilities for working with older persons improved over time. This improvement could be a function of the opportunity to develop expertise through experience and on-the-job learning. This is consistent with a study of expertise among pediatric rehabilitation therapists, including recreation therapists; over time and with experience, therapists became more confident in their knowledge and with the therapy process (King et al., 2007). Formalizing opportunities for newly hired recreation therapists to receive mentorship or peer support from experienced therapists in LTC settings may be important, especially as many students do not have experience in LTC as part of their entry-to-practice education. Ideally, mentorship of new graduates should continue for 6–9 months (Rush, Adamack, Gordon, Lilly, & Janke, 2013). However, the feasibility of formal mentorship programs may be limited, given low levels of funding for TR in LTC. Perhaps related to limited staffing funds, supervisors in the LTC sector are more likely than in the community or acute health care sector to expect new graduates to be fully competent to work with older persons (McCleary, et al. 2014).

The association between years of work experience and perceived competence may be related to opportunities for continuing education. Participants with higher levels of current perceived competencies also reported having attended more continuing education and in-service education sessions. In Ontario, LTC homes must provide all staff with additional training related to abuse recognition and prevention, minimizing restraining of residents, and responsive behaviours (Government of Ontario, 2011). The term *responsive behaviour* refers to behavioural and psychological symptoms of dementia or other behaviours that are responsive to the environment (Gutmanis, Snyder, Harvey, Hillier, & Le Clair, 2015). Other continuing education is not mandatory. Our findings support the value of continuing education, beyond

Table 4: Current competency scores by in-service training sessions

	None	1–5	6–10	11–30	≥ 31
	<i>n</i> = 20	<i>n</i> = 98	<i>n</i> = 90	<i>n</i> = 88	<i>n</i> = 59
Number of In-service Training Sessions	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)
NICE Interprofessional Competency ^a	3.84 (.60)	4.06 (.56)	4.18 (.68)	4.23 (.52)	4.26 (.54)
LTC TR Competency ^b	3.74 (.76)	4.25 (.59)	4.39 (.69)	4.49 (.42)	4.50 (.50)

Note. ^a $F(4, 105) = 7.24, p < .001$, ^b $F(4, 105) = 12.10, p < .001$

There were significant differences amongst both NICE and LTC TR competencies; therefore, post-hoc tests were conducted. For NICE competencies, the following pairs of groups of in-service training sessions that were found to be statistically significant were "None" with "6–10", and "≥31", as well as "1–5", with "6–10" and "≥31". For LTC TR competencies, the following pairs of groups of in-service training sessions that were found to be statistically significant were "None" with "1–5", "6–10", "11–30", and "≥31", as well as "1–5" with "6–10" and "≥31".

Table 5: Current competency and attending continuing education courses

	None	1–2	3–5	6–10	11–20
	<i>n</i> = 89	<i>n</i> = 100	<i>n</i> = 122	<i>n</i> = 68	<i>n</i> = 47
Number of Courses Attended	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)	<i>M</i> (<i>SD</i>)
NICE Interprofessional Competency ^a	4.06 (.57)	4.06 (.58)	4.22 (.59)	4.27 (.61)	4.30 (.52)
LTC TR Competency ^b	4.21 (.63)	4.28 (.59)	4.41 (.57)	4.52 (.55)	4.52 (.45)

Note. ^a ($F[4, 118] = 3.18, p = .02$), ^b ($F[4, 118] = 2.96, p < .05$)

mandatory training, for the development of gerontological competencies.

In this study, having received more continuing education may, however, have been confounded with years of experience. Participants had less confidence in competencies related to responsive behaviours, a topic included in mandatory training of LTC staff in Ontario. This is consistent with previous research indicating gaps in health care providers’ competencies related to dementia care (McCleary et al., 2014; Richeson & Sardina, 2016). Variability in quality of training received by our participants may partially explain the finding that despite having had mandatory training about responsive behaviours, their confidence was relatively low (Spector, Revolta, & Orrell, 2016). This finding is also consistent with previous research findings that continuing education training may be sufficient for relatively straightforward issues such as restraint use, whereas achieving competencies related to complex issues such as responsive behaviours may require more intensive education and support (Anderson, Bird, MacPherson, & Blair, 2016). Therefore, like other LTC staff, recreation staff may benefit from support to implement what they learn about dementia and responsive behaviours in their practice.

Participants also rated their confidence using the RAI-MDS, with documentation being significantly lower than other competencies, both as recalled after graduation and currently. The RAI-MDS is a system that is

used to collect information on residents’ health status using standardized assessment tools (Murray, Smith Higuchi, Edwards, Greenough, & Hoogeveen, 2011). The RAI-MDS was implemented in Ontario in the early 2000s (Murray et al., 2011). Therefore, participants who completed their education before this time would not have learned about the RAI-MDS. This may partially explain findings of low recalled confidence for these items on the questionnaire. According to Dellefield and Corazzini (2015), there are currently no requirements for interdisciplinary staff members to have RAI education. Perhaps including the RAI-MDS in the curricula and continuing education can assist staff in better understanding how to use the RAI-MDS to meet resident needs in LTC. Including the RAI-MDS in curricula prior to graduates’ entering the workforce could assist in their understanding of how to use the tool properly. Although the RAI-MDS is increasingly being used across Canada, it is not used in all jurisdictions, so students may not have the opportunity to apply learning about it in the field. Therefore, on-the-job training may also be required. Continuing education focusing on the RAI-MDS offered to staff while in the workforce can assist in maintaining their understanding of the program as well as in their learning about new additions or updates to the program.

The care plan is a communication tool that assists in coordinating services with the interdisciplinary team (Dellefield & Corazzini, 2015). These interdisciplinary services aid residents in maintaining their physical,

Table 6: Recall competency scores by type of education

	Type of Education	Number of Respondents in each Type of Education (<i>n</i>)	<i>M</i>	<i>SD</i>
Recall LTC TR Competencies	University degree	34	3.59	.71
	College diploma	17	3.52	.83
	Certificate in TR	25	3.64	.76
	Total	76	3.59	.75
Recall NICE Competencies	University degree	34	3.71	.56
	College diploma	17	3.43	.80
	Certificate in TR	25	3.68	.83
	Total	76	3.64	.71

Table 7: Recall competency scores by number of LTC placement hours

	Number of Hours in Placement	Number of Respondents (n)	M	SD
Recall LTC TR competencies	< 100 hours	7	3.07	.82
	100-200	10	3.61	.79
	201-300	9	3.45	.65
	301-400	7	3.46	.84
	401-500	17	3.77	.93
	≥ 501	15	3.77	.57
	Total	65	3.59	.78
Recall NICE competencies	< 100 hours	7	3.35	.57
	100-200	10	3.31	.75
	201-300	9	3.54	.70
	301-400	7	3.77	.78
	401-500	17	3.88	.80
	≥ 501	15	3.78	.63
	Total	65	3.65	.72

mental, and psychosocial well-being in LTC (Dellefield & Corazzini, 2015). Care activities that are included in the care plan must be based on the professional's standards of practice tailored to meet residents' needs (Dellefield & Corazzini, 2015). According to Murray et al. (2011), using documentation as a way to foster communication was viewed positively by staff in LTC. Recreation therapists' collaborating with interdisciplinary team members to develop care plans is one of the essential competencies listed by Richeson and Sardina (2016). Murray et al. (2011) also revealed that LTC staff reported a lack of experience in monitoring the processes of care. Ineffective communication and failure to respond to the changing needs of residents has been linked to errors, dissatisfaction from residents, and poor outcomes (Murray et al., 2011). Ghogomu et al. (2017) reviewed literature on individual care plans in LTC homes and created a chart discussing challenges and solutions for writing sufficient care plans. Ghogomu et al. (2017) reported a lack of knowledge about writing care plans and suggested increased training to address service gaps. Another challenge reported was inconsistent documentation, which could be solved by writing concise plans with consistent terminology and keeping them in a central location where all staff have access (Ghogomu et al., 2017). Our findings indicate a need for education and training in RAI-MDS and documentation for both entry-to-practice education and practicing recreation staff.

Our findings have implications for educators. According to Beland and Kapes (2003), one in five TR educators identified having an interest in aging. Therefore, there should be capacity to enhance curricula. When calls are made to enhance gerontology content in entry-to-practice education in the health professions, the problem of a crowded curriculum is often raised.

Table 8: Recall competency scores by topics covered in courses

	Topics Covered in Course	Number of Respondents (n = 76)	M (SD)
NICE interprofessional competency	Dementia		
	Yes	68	3.66 (.70)
	No	8	3.44 (.86)
	Delirium		
	Yes	32	3.79 (.65)
	No	44	3.53 (.74)
	Depression		
	Yes	51	3.71 (.67)
	No	25	3.49 (.78)
	Physical aging		
	Yes	63	3.68 (.74)
	No	13	3.45 (.57)
	RAI-MDS		
	Yes	25	3.79 (.77)
No	51	3.57 (.68)	
LTC TR Competency	Care planning		
	Yes	29	3.83 (.72)
	No	47	3.52 (.69)
	Dementia		
	Yes	68	3.62 (.72)
	No	8	3.28 (.90)
	Delirium		
	Yes	32	3.75 (.62)
	No	44	3.47 (.82)
	Depression		
	Yes	51	3.67 (.74)
	No	25	3.42 (.73)
	Physical aging		
	Yes	63	3.63 (.76)
No	13	3.41 (.66)	
RAI-MDS			
Yes	25	3.77 (.73)	
No	51	3.50 (.74)	
Care planning			
Yes	29	3.82 (.66)	
No	47	3.44 (.77)	

Note. The inclusion of aging topics in courses in the curriculum was significantly associated with recalled confidence in competencies ($n = 76$, $M = 3.53$, $SD = 1.66$; effect size, $d = .44$). There was a low positive correlation between number of aging topics covered in undergraduate education and recalled NICE competencies ($r[74] = .25$, $p = .03$). Number of aging topics covered in undergraduate education was positively correlated with recalled LTC TR competencies ($r[74] = .28$, $p = .02$).

That is, there are many important competencies to achieve and content to include in entry-to-practice education beyond gerontology, with limited opportunity to remove something from curricula to make way for more gerontology learning. However, 27 per cent of participants who completed our survey were TR graduates working in LTC. According to Richeson and Sardina (2016), 28 per cent of certified therapeutic recreation specialists are working in geriatrics and

therefore need to modify their practice to work with the aging population. Recreation therapists need to modify their practice in order to keep pace with demographic shifts, the anticipated shortage of health care workers, and the growth of TR (Richeson & Sardina, 2016). Additionally, TR has not kept pace in developing and implementing occupation-specific competencies; that is, gerontological competencies (Richeson & Sardina, 2016). Currently, there is not a requirement to obtain gerontological competencies for recreation therapists working with older adults. However, there is a requirement for these competencies among some other health care workers, such as health care aides in Ontario (Ministry of Training, Colleges and Universities, 2014) and physiotherapists (Council of Canadian Physiotherapy University Programs, 2009). Other allied health profession organizations, such as those for nursing (Canadian Association of Schools of Nursing, 2017), have developed recommended competencies, similar to those developed for TR (Richeson & Sardina, 2016).

The National Council of Therapeutic Recreation Certification has created an optional specialization certification in geriatrics for recreation therapists working in gerontological settings (Richeson & Sardina, 2016). Specialty certification is available to certified TR specialists who have at least 480 hours of TR professional experience in a gerontological setting within a 5 year time frame and who complete relevant continuing education (National Council for Therapeutic Recreation Certification, 2018).

Our findings about recalled competencies among recent graduates indicate that developing, implementing, and evaluating programs related to physical disabilities and dementia are relative strengths in entry-to-practice education. Priorities for enhancing curricula include responsive behaviours, the RAI-MDS, and documentation. According to Richeson and Sardina (2016), the Partnership for Health in Aging developed occupational competencies necessary to work with older adults. Some of these competencies are congruent with our findings of competencies (responsive behaviours, the RAI-MDS and documentation) that should be added to curricula: (1) choosing a reliable tool to properly assess and evaluate older adults' cognition, mood, physical functioning, nutrition, and pain, such as the RAI-MDS; (2) writing and updating care plans that are based on older adults' preferences and care goals and their physical, social and psychological needs; and (3) developing treatment plans that are based on evidence, person-centred approaches, and care goals, for example, being able to incorporate interventions for responsive behaviours.

Potential limitations of this study relate to the cross-sectional design, particularly with reporting of

recalled competencies. Social desirability bias is always a possibility with survey research. This study attempted to limit this bias through neutral wording of the responses and anonymity of participants, and by providing respondents with a choice of opting out of questions. Nonetheless, it is possible that current competencies were overestimated. The study attempted to limit recall bias by limiting the sample for items about competence at the time of graduation to respondents who had completed TR education within the past 5 years. Generalizability of the findings beyond Ontario may be limited, particularly in settings where TR education is less common among therapeutic recreation staff.

Conclusion

Much of the existing research on the gerontological competencies of health professionals focuses on professions other than TR, such as nursing, medicine, social work, and rehabilitation (Boscart et al., 2017; McCleary et al., 2014; Murray et al., 2011; Partnership for Health in Aging, 2010). With some notable exceptions (Kemeny, Hutchins, & Cooke, 2016; Richeson & Sardina, 2016), there is limited attention to this issue in the TR literature and limited attention to TR competencies within the gerontology literature. Our findings have implications for educators, employers, and recreation staff. The findings suggest that the gerontological competencies of recreation staff in LTC homes can be enhanced through adjustments to entry-to-practice education and through mentorship and continuing education in the workplace. Future research could include testing the effects of continuing education, training, and mentoring on competencies of recreation staff working in LTC. These interventions could include courses covering competencies that recreation staff reported having low confidence in performing, such as the RAI-MDS and writing care plans. Additionally, TR educators could include evaluating the extent to which the curriculum addresses competencies in which there was low confidence.

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